Enterprise Products

ENTERPRISE PRODUCTS PARTNERS L.P.
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ENTERPRISE PRODUCTS OPERATING LLC

July 17, 2012

Return Receipt Requested
7010 1870 0001 2945 4726

Mr. Jim Griswold, Senior Hydrologist
Environmental Bureau
ENMRD/Oil Conservation Division
1220 South St. Francis Drive
Santa Fe, NM 87505

RE: ***Supplemental Site Investigation & Quarterly Groundwater Monitoring Report (April 2012 Event)*** **- Largo Compressor Station**
Enterprise Field Services, LLC
OCD GW Discharge Permit Number: GW-211
Rio Arriba County, New Mexico

Attn: Leonard Lowe

Dear Mr. Griswold,

Enterprise Field Services, LLC (Enterprise) is submitting two (2) copies of the enclosed *Supplemental Site Investigation & Quarterly Groundwater Monitoring Report (April 2012 Event)*, dated June 31, 2012, for the above-referenced facility. This report documents the results of a Supplemental Site Investigation (SSI) performed at the facility during March 2012. The SSI was performed in accordance with the proposed SSI Work Plan, submitted to the New Mexico Oil Conservation Commission (NMOCD) in correspondence dated March 2, 2012.

The enclosed report also provides the results of the April 2012 quarterly groundwater monitoring event conducted at the facility. Groundwater conditions are monitored at four primary investigation areas, Area 1 (Condensate Storage Tank Area), Area 2 (Valve Box Area), Area 3 (Retention Pond Area), and Area 4 (Compression and Dehydration Area).

Based on the results of the SSI, and the current groundwater monitoring results, additional investigations will be required to complete the delineation of dissolved-phase constituents of concern (COCs) downgradient of monitor well MW-48 (located downgradient of the former facility storm water retention pond). In addition, following the removal of the former facility condensate storage tanks (located in Area 1), additional investigations of underlying soils will be performed to determine corrective action requirements. Downgradient monitor well MW-47, also located in Area 1, will be evaluated after the next monitoring event to determine if additional investigation of dissolved-phase groundwater constituents downgradient of this location will be required.

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Previously submitted reports for this facility also include the *Interim Remedial Investigation Report* dated May 15, 2010, the *Proposed Facility-Wide Soil and Groundwater Investigation and Remedial Activities* report dated June 10, 2010, and the *Environmental Site Investigation – Largo Compressor Station (GW-211) dated March 24, 2011.* In addition, the results of a pilot *insitu* treatment program to treat affected soils located near the former facility condensate storage tanks was submitted on October 19, 2011. These condensate tanks are now inactive, and should be removed from the site during July 2012 to allow investigation and further remedial actions of any underlying soils affected by the historical operation of these tanks.

If you have any questions, or require additional information, please do not hesitate to contact me at (713) 381-2286, or via email at: drsmith@eprod.com.

Sincerely,

David R. Smith, P.G.
Sr. Environmental Scientist

Rodney M. Sartor, REM
Manager, Remediation

/dep
Enclosures - Supplemental Site Investigation & Quarterly Groundwater Monitoring Report (April 2012 Event)

cc: Brandon Powell, New Mexico Oil Conservation Division, 1000 Rio Brazos Road, Aztec, NM 87410
H. C. Berry, P.O. Box 579, Dexter, NM 88230

ec: Chris Mitchell, Southwest Geoscience
Kyle Summers, Southwest Geoscience

SUPPLEMENTAL SITE INVESTIGATION &
QUARTERLY GROUNDWATER MONITORING REPORT
(April 2012 Event)

GROUNDWATER DISCHARGE PLAN GW-211

Property:

LARGO COMPRESSOR STATION
Section 15, Township 26N, Range 7W
Rio Arriba County, New Mexico
SWG Project No. 0410002
June 31, 2012

Prepared for:
Enterprise Field Services, LLC
1100 Louisiana Street
Houston, Texas 77002
Attention: Mr. David R. Smith, P.G.

PREPARED BY:

Kyle Summers, C.P.G.
Senior Geologist/
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QUARTERLY GROUNDWATER MONITORING REPORT
(April 2012 Event)

GROUNDWATER DISCHARGE PLAN GW-211

LARGO COMPRESSOR STATION
Section 15, Township 26N, Range 7W
Rio Arriba County, New Mexico

SWG Project No. 0410002

1.0 EXECUTIVE SUMMARY

This Supplemental Site Investigation (SSI) & Quarterly Groundwater Monitoring Report (QGMR) has been prepared in accordance with the SSI Work Plan dated January 12, 2012, as submitted to the New Mexico Energy, Minerals, and Natural Resources Department (EMNRD), Oil Conservation Division (OCD) in correspondence dated March 2, 2012. The primary objective of the supplemental site investigation activities was to further evaluate the extent of COCs in soil and/or groundwater within Area 3 and Area 4. In addition, the objective of groundwater monitoring activities was to further evaluate the magnitude and extent of COCs in groundwater across the Site overtime.

During the completion of the SSI, six (6) soil borings (MW-40R, MW-48, MW-49, MW-50, MW-51, and MW-52) were advanced at the Site. Boring MW-40R was advanced to provide a deeper replacement well for monitoring well MW-40, which was plugged and abandoned in accordance with applicable state regulations. Borings MW-48 and MW-49 were advanced north of CR-379, hydrogeologically downgradient of the retention pond area (Area 3). Borings MW-50 and MW-51 were advanced hydrogeologically downgradient of previously installed monitoring well MW-39, and boring MW-52 was advanced upgradient of MW-39 (Area 4). Subsequent to advancement, each of the soil borings were converted to permanent groundwater monitoring wells.

Each of the recently installed monitoring wells was sampled as part of the quarterly groundwater monitoring program. Prior to sample collection for laboratory analysis, each monitoring well which did not exhibited measurable light non-aqueous phase liquid (LNAPL) was micro-purged utilizing low-flow sampling techniques.

The soil samples collected from soil borings MW-48 through MW-52 did not exhibit total petroleum hydrocarbon (TPH), benzene or total benzene, toluene, ethylbenzene or xylenes (BTEX) concentrations above the OCD's *Remediation Action Levels*.

A LNAPL hydrocarbon sheen has been identified in association with the initial groundwater-bearing unit in monitoring wells MW-33, MW-35, and MW-37 during the completion of previous gauging activities.

The groundwater samples collected from monitoring wells MW-3R, MW-7, MW-11, MW-12, MW-15, MW-16, MW-39, MW-47, MW-48, and MW-51 exhibited TPH gasoline range organics (GRO) concentrations ranging from 0.14 mg/L to 25 mg/L, and TPH diesel range organics (DRO) concentrations ranging from <1.0 mg/L to 112 mg/L. The highest

GRO concentration identified during the April 2012 sampling event was observed in association with the groundwater sample collected from monitoring well MW-48 (25 mg/L) and the highest DRO concentration was observed in association with the sample collected from monitoring well MW-39 (112 mg/L).

The groundwater samples collected from monitoring wells MW-7, MW-11, MW-12, MW-15, MW-16, MW-39, MW-47, MW-48, and MW-51 exhibited benzene concentrations ranging from 11 µg/L to 4,300 µg/L, which exceed the WQCC *Groundwater Quality Standard* of 10 µg/L.

The groundwater samples collected from monitoring wells MW-48 and MW-51 exhibited toluene concentrations of 3,200 µg/L and 3,600 µg/L respectively, which exceed the WQCC *Groundwater Quality Standard* of 750 µg/L.

The groundwater samples collected from monitoring wells MW-12, MW-39, MW-48, and MW-51 exhibited total xylene concentrations ranging from 860 µg/L to 5,000 µg/L, which exceed the WQCC *Groundwater Quality Standard* of 620 µg/L.

Based on the results of this supplemental investigation and groundwater monitoring activities, SWG has the following recommendations:

- Report the results of this investigation to the OCD;
- Conduct additional investigation activities to further evaluate the extent of COCs in groundwater within Areas 1 and 3.
- Prepare and submit a Corrective Action Work Plan (RAP) to the OCD detailing potential corrective action alternatives to address LNAPL and/or COCs identified in soil and groundwater at the Site; and

2.0 INTRODUCTION

2.1 SITE LOCATION AND HISTORY

The Largo Compressor Station is located off of County Road (CR) 379 in Section 15, Township 26N, Range 7W in Rio Arriba County, New Mexico, referred to hereinafter as the "Site" or "subject Site". The Site is a natural gas compressor station utilized to dehydrate and compress natural gas collected from production wells in the area for transportation via pipeline. The Site was constructed in the mid-1960s and currently includes two (2) compressor engines, a dehydration unit and related treater, one (1) bullet storage tank, an out-of-service condensate storage tank battery, which includes six (6) condensate storage tanks and two (2) below-grade drain tanks, a new condensate storage tank battery, which includes seven (7) new condensate storage tanks, inlet scrubbers, a control room, and an office/shop building.

The Site is subject to regulatory oversight by the New Mexico Energy, Minerals, and Natural Resources Department (EMNRD), Oil Conservation Division (OCD). To address activities related to crude oil/condensate related releases, the New Mexico EMNRD OCD utilizes the *Guidelines for Remediation of Leaks, Spills and Releases* as guidance, in addition to the EMNRD/OCD rules, specifically New Mexico Administrative Code (NMAC) 19.15.30 Remediation. These guidance documents establish investigation and abatement action requirements for sites subject to reporting and/or corrective action.

The Site location is depicted on Figure 1 of Appendix A which was reproduced from a portion of the United States Geological Survey (USGS) 7.5-minute series topographic map. A Site vicinity map, created from an aerial photograph, is provided as Figure 2 of Appendix A.

The areas of known or suspected impact at the Site have been previously identified as Areas 1 through 4 in OCD correspondence. Each of the areas is depicted on Figure 3 in relation to pertinent Site features and general Site boundaries. These areas are briefly described below:

Area 1(Condensate Storage Tank Area)

Area 1 is defined as the northwestern portion of the Site and includes the out-of-service condensate storage tank battery associated with on-going investigation and/or corrective actions since a release from a condensate storage tank valve was reported to the OCD in January of 2008. Additional detail regarding the investigative and corrective activities at Area 1 are provided in the *Environmental Site Investigation – Largo Compressor Station (GW-211) (SWG - March 24, 2011)*, and the *Corrective Action Pilot Study Report (SWG – October 10, 2011)*.

Area 2 (Valve Box Area)

Area 2 includes the new condensate storage tank battery and the immediately surrounding areas. This area is in the north central portion of the Site, immediately south of CR 379. During the construction of the new tank battery in June 2009, petroleum hydrocarbon impacted soils and groundwater were encountered in association with a former valve box and related appurtenances. Additional detail regarding the investigative and corrective activities at Area 2 are provided in the

Environmental Site Investigation – Largo Compressor Station (GW-211) (SWG - March 24, 2011).

Area 3 (Retention Pond Area)

Area 3 encompasses the northeast portion of the Site including the storm-water retention pond. Historical petroleum hydrocarbon affected soil and groundwater were identified during the construction of the retention pond in July of 2009, which apparently originated from historic oil and contact water treatment and storage in the area of the current retention pond. Additional detail regarding the investigative and corrective activities at Area 3 are provided in the *Environmental Site Investigation – Largo Compressor Station (GW-211) (SWG - March 24, 2011).*

Area 4 (Compression & Dehydration Area)

Area 4 includes the remainder of the Site, which includes the active compression and treatment area comprised of two (2) compressor engines, a dehydration unit and related treated and inlet scrubbers. Soil and groundwater investigation activities pertaining to Area 4 are provided in the *Environmental Site Investigation – Largo Compressor Station (GW-211) (SWG - March 24, 2011).*

2.2 CHRONOLOGY OF EVENTS

Significant events and related activities associated with the Site, including the results of Site investigation activities and corrective action completed prior to the current SSI, are provided in the following summary:

January 4, 2008	Area 1: Release was discovered resulting from frozen valve failure on a condensate storage tank. The release flowed into the below-grade drain tanks, which subsequently overflowed to surrounding containment. The release was subsequently reported to the OCD.
March/April 2008	Area 1: *Geoprobe Investigation at Largo Compressor Station (Lodestar – May 16, 2008)*: Initial field investigation activities were performed by Lodestar Services, LLC (Lodestar) during March and April of 2008. Nineteen (19) soil borings (B-1 through B-19) were advanced at the Site with total depths ranging from 14.5 feet bgs to 21 feet bgs. Subsurface soils were identified as Quaternary alluvium consisting of unconsolidated silts, sands, and clays. Groundwater was reported in each of the soil borings with static levels ranging from 13.15 to 19.5 feet bgs. Five (5) of the 19 soil borings were subsequently converted to 1-inch piezometers (P-1 though P-5) with screened intervals ranging from 9.5 feet bgs to 21 feet bgs. Based on the depth to groundwater and proximity to a surface water body, the Site was classified with a total ranking score greater than 19. Lodestar collected twenty nine (29) soil samples from the nineteen (19) soil borings and submitted the samples to Hall Environmental Analytical Laboratory (HEAL) in Albuquerque, NM for TPH GRO/DRO and BTEX analysis utilizing EPA method SW-846 #8015M and #8021B, respectively. In addition, five (5) groundwater samples collected from the piezometers were submitted for TPH GRO/DRO and BTEX analysis. Based on the laboratory analytical results, soil samples collected from soil borings B-1 at 4 feet bgs, B-2 at 12.5 feet bgs, B-5 at 17.5 feet bgs, and B-14 at 17.5 feet bgs exhibited TPH GRO/DRO concentrations above the OCD *Remediation*

	Action Level. The groundwater samples collected from piezometers P-1, P-2, and P-3 exhibited benzene, toluene, and/or total xylene concentrations above the WQCC *Groundwater Quality Standards*.
August/September 2008	Area 1: Enterprise submits notice that the condensate storage tank system is scheduled to be upgraded/replaced. Enterprise intends to update the Groundwater Discharge Plan upon completion of these activities.
September/October 2008	Areas 1 through 4: The OCD approves the planned storage tank modification from Enterprise with the condition that Enterprise files an appropriate closure plan for the old tank battery.
June/July 2009	Area 2: An area of concern is discovered during construction activities at the new condensate storage tank battery. Source of impact presumed to be valve box from a storage tank formerly utilized at this location. SMA assisted with the assessment activities and Foutz & Bursum (F&B) performed the excavation activities. Prior to fully excavating the affected soils, exploratory "potholes" were advanced to investigate the extent of subsurface contamination. Groundwater was encountered at approximately 13 feet bgs during these activities. On June 26, 2009, SMA collected one soil confirmation sample from pothole #6 (PH# 6), and submitted it for analysis of TPH GRO/DRO. Based on the laboratory analytical data, the soil confirmation sample PH# 6 did not exhibit TPH GRO/DRO concentrations in exceeding the OCD *Remediation Action Levels*. SMA also collected a groundwater sample from pothole# 1 (PH# 1). Based on the laboratory analytical data, a benzene concentration was identified in excess of the WQCC *Water Quality Standards*. Based on field observations, soil screening data, and laboratory analytical data, F&B excavated the visually impacted soils at which the final excavation was reported to be approximately 100 feet long by 30 feet wide and 13 feet deep. SMA collected a total of four (4) soil confirmation samples on July 1, 2009 from the sidewalls of the Area 2 excavation and one (1) soil confirmation sample from the excavated soils and submitted them for analysis of TPH GRO/DRO. The confirmation soil samples did not exhibit COC concentrations above the OCD *Remediation Action Levels*. SWG subsequently collected groundwater samples from this approximate area (TSW-44 and TSW-45) and no groundwater impacts were observed (*Environmental Site Investigation (SWG – March 24, 2011)*). The excavated soils were transported off-site and disposed of at the Evirotech landfarm near Angel Peak, New Mexico. In addition, a vacuum truck was utilized to remove approximately 2,000 barrels of groundwater from the excavation prior to backfill. The Area 2 excavation was backfilled in July of 2009 with unaffected soil and gravel.
July 2009	Area 1: *Inspection Report – NMOCD (July 9, 2009)*: Onsite inspection by NMOCD requires tank integrity testing, improvement on leak detection monitoring, liner repair, soil and groundwater remediation, system repair or replacement.
July 2009	Area 1: *Response to Inspection Report – Enterprise (July 23, 2009)*: Enterprise submits a workplan to perform additional investigation activities at the Site.
July/August 2009	Area 3: Historical petroleum hydrocarbon impact is discovered during the construction of a storm-water retention pond at the facility. SMA was retained to sample the excavation. Initial Form C-141 was submitted to OCD on July 6, 2009.

On July 15, 2009, a cement tank containing water (apparently an old cistern) was unearthed in the vicinity of the planned storm-water retention pond. SMA collected a water sample from the tank, and subsequent BTEX analyses indicate the tank water did not exhibit BTEX concentration in excess of the WQCC *Groundwater Quality Standards (GQSs)*. Soil confirmation samples were collected below the water table (BWT) on the north side of the retention pond excavation and on the northeast wall (NE Wall) of the retention pond excavation. Analytical results indicate the soil confirmation samples BWT and NE Wall contain TPH GRO/DRO, benzene, and/or total BTEX concentrations in excess of the OCD *Remediation Action Levels*. Groundwater which was present at the BWT soil sample location was collected (GE) and submitted for analysis of BTEX. Based on the laboratory analytical results, the GE groundwater sample exhibited benzene, toluene and xylene concentrations in excess of the WQCC *GQSs*.

On July 16, 2009, SMA evaluated a total of four (4) test pits, each with a total depth of approximately 13 feet bgs, to the north and east of the retention pond excavation. Groundwater was encountered in each of the test pits at approximately 13 feet bgs. SMA collected one (1) soil sample just above the water table in each of the test pits to field screen for the presence of volatile organic compounds (VOCs). Based on visual observations within the test pits and the field screening results of the collected soils samples, it was concluded that "soil impacts likely extended beyond a reasonable area for excavation" within Area 3. The decision was made to stop extending the excavation and to remove any visibly contaminated soil remaining in the existing excavation of Area 3. SMA subsequently collected a groundwater sample from the southwest corner of the retention pond excavation (SWCRP) and submitted it for analysis of BTEX. Based on the laboratory analytical results, the SWCRP groundwater sample exhibited benzene and xylene concentrations above the WQCC *GQSs*.

The excavated soils, approximately 1,701 cubic yards in total (one source indicates 3,000 cubic yards), were transported off-site and disposed of at the Evirotech land farm near Angel Peak, New Mexico. In addition, a vacuum truck was utilized to remove approximately 1,120 barrels of hydrocarbon impacted groundwater from the excavation prior to backfill. The excavation was backfilled with approximately 1,360 cubic yards of unaffected material, leaving a four (4) to five (5) foot depression to utilize as the storm-water retention pond.

August 2009

Area 1: *Report of Subsurface Investigation at Largo Compressor Station (Lodestar – November 30, 2009:* During August 2009, Lodestar performed a supplemental subsurface field investigation at the Site. Ten (10) additional soil borings (B-21 through B-30) were advanced at the Site with total depths ranging from 22 to 42 feet bgs. In addition, two (2) hand auger borings (HA-1 and HA-2) were advanced within the containment berm with total depths ranging from 8 to 17 feet bgs. Groundwater was reported in each of the soil borings with static levels ranging from 17.5 to 20.5 feet bgs. Four (4) of the ten (10) soil borings were subsequently converted to permanent 2-inch groundwater monitoring wells (MW-6 through MW-9) with screened intervals ranging from 12 to 25 feet bgs.

Lodestar collected nineteen (19) soil samples from the ten (10) soil borings and hand auger borings and submitted them for TPH GRO/DRO and BTEX analysis. In addition, nine (9) groundwater samples were collected from the previously installed piezometers (P-1 through P-5) and the newly installed monitoring wells (MW-6 through MW-9) and submitted for TPH GRO/DRO

and BTEX analysis. Based on the laboratory analytical results, soil samples collected from soil borings B-22 at 15 feet bgs, B-23 at 15 feet bgs, B-24 at 15 feet bgs, B-29 at 18 feet bgs, and Hand Auger-1 at 14 feet bgs exhibited total BTEX and/or TPH GRO/DRO concentrations above the NMOCD *Remediation Action Level*. The groundwater samples collected from piezometers P-2 and P-3 and monitoring well MW-7 exhibited benzene, toluene, and/or total xylene concentrations above the WQCC *Groundwater Quality Standards*. In addition, NAPL was present in piezometer P-1.

Lodestar concluded that soil and groundwater impact was limited to the bermed area and slightly outside of the bermed area in the down gradient (northwest) direction. Furthermore, the dissolved-phase contamination of the groundwater underlying the Site was migrating slightly to the north-northwest.

November 2009/February 2010

Area 1: *November 2009 Groundwater Sampling (Lodestar – December 17, 2009), Quarterly Groundwater Monitoring Report (Lodestar – April 20, 2010):* Quarterly groundwater monitoring events were performed in November of 2009 and February of 2010. Groundwater samples were collected from each of the monitoring wells at the Site and submitted for BTEX analysis. Based on the laboratory analytical results, the groundwater samples collected from the groundwater monitoring wells MW-7 and MW-11 exhibited benzene and/or total xylene concentrations above the WQCC *Groundwater Quality Standards*. However, the concentrations of COCs appeared to be decreasing in some areas between these monitoring events. NAPL was present in piezometer P-1 during each of these two groundwater monitoring events.

January 2010

Area 1: *Largo Compressor Station Work Plan for Groundwater Remediation GW-211 (Lodestar – December 31, 2009):* Enterprise submits a groundwater remediation work plan for the Site detailing the proposed injection of Oxygen Release Compound (ORC) and utilization of sorbent socks to the OCD.

February 2010

Area 1: The OCD approves the December 31, 2009 work plan with the following conditions:

"1. Enterprise will continue to conduct quarterly groundwater monitoring events at the facility including and episode of groundwater sampling once the new recovery well is installed and prior to the introduction of the oxygen release compound."

"2. After installation and proper development of the 4-inch recovery well to replace existing well P-1, Enterprise will allow approximately 48 hrs for the apparent thickness of non-aqueous phase liquid to stabilize before its thickness is measured. If that apparent thickness is 10 inches or greater, then a condensate baildown/recovery test will be undertaken to better understand the thickness of condensate in-situ as well as determine what the yield of condensate might be. Only after such testing, shall the proposed oil-adsorbent sock(s) be placed in the well."

"3. On at least a one-monthly basis thereafter (rather that the once-quarterly schedule proposed in the workplan), the adsorbent sock(s) shall be removed from the well and the apparent product thickness again be allowed to stabilize and measured. If the apparent thickness remains 10 inches or greater, another baildown/recovery test will be undertaken. Some method should be implemented to determine the volume of condensate retained by the adsorbent socks."

"4. Analysis of all water samples will be undertaken by a qualified laboratory using either Methods 8260 (VOCs) or 8021 (BTEX), and 8015 (GRO/DRO)."

"5. All unearthed soils, development water, water purged prior to sampling, and recovered condensate shall be properly handled, contained, transported, and disposed."
"6. All reports concerning implementation of the workplan, condensate recovery and testing, and quarterly monitoring shall be provided to the OCD no more than 45 days after completion of any field activities."

March/April 2010

Area 1: *Interim Remedial Investigation Report (LTE – May 15, 2010):* During March of 2010, LT Environmental, Inc. (LTE), formerly known as Lodestar, advanced two (2) additional soil borings at the Site with total depths ranging from approximately 31 to 32 feet bgs. Groundwater was encountered in both soil borings with static levels ranging from 20 to 22 feet bgs. The two (2) soil borings were subsequently converted to 2-inch groundwater monitoring wells (MW-15 and MW-16). LTE also replaced piezometer P-1 with a 4-inch groundwater monitoring well (MW-12) which was proposed to be utilized in recovering NAPL by introducing adsorbent socks via the well casing. Piezometers P-2, P-3, P-4, and P-5 were also replaced with 2-inch groundwater monitoring wells MW-11, MW3R, MW-14, and MW-13, respectively.

Area 1: During April 2010, LTE collected eleven (11) groundwater samples from the on-site groundwater monitoring wells for TPH GRO/DRO and BTEX analysis. Based on the laboratory analytical results, the groundwater samples collected from groundwater monitoring wells MW-7 and MW-12 exhibited benzene, toluene, and/or xylenes concentrations above the WQCC *Water Quality Standards*. However, concentrations of COCs appeared to be decreasing from the previous monitoring event in February 2010.

May 2010

Area 1: A final C-141 was submitted to the OCD, indicating the need for additional studies.

Areas 1 through 4: On May 27, 2010, Enterprise submits an extension request to the OCD pertaining to investigation activities at the Largo Compressor Station, citing a planned facility-wide investigation.

June 2010

Area 1: The OCD requests clarifications on the *Interim Remedial Investigation Report dated May 15, 2010.*

Areas 1 through 4: *Proposed Facility-Wide Soil and Groundwater Investigation (LTE – June 8, 2010):* Enterprise submits a work plan to provide a Site-wide assessment of the Largo Compressor Station.

Areas 1 through 4: The OCD approves the proposed work plan submitted on June 10, 2010 with conditions.

June/July 2010

Area 1: *Groundwater Sampling Report (LTE – September 10, 2010):* During June of 2010, LTE advanced ten (10) 4-inch boreholes utilizing hollow stem augers to a total depth of approximately 20 feet bgs. The boreholes were advanced to the north and north-northwest of the containment berm. A slurry of 65% ORC solids and water was poured directly into the hollow stem at each borehole (approximately 30 pounds of ORC per borehole) to create a plug of ORC covering approximately five vertical feet throughout the smear zone. A 2-foot thick bentonite seal was installed above the ORC slurry and the remainder of the borehole was backfilled with clean soil. LTE applied the ORC slurry to assist in biodegradation of COCs in groundwater and with the intention of limiting further down-gradient migration of the groundwater plume.

Area 1: During July 2010, LTE collected eleven (11) groundwater samples from the on-site groundwater monitoring wells and submitted them for TPH GRO/DRO and BTEX analysis. Based on the laboratory analytical results, the groundwater samples collected from groundwater monitoring wells MW-3R, MW-7, MW-11, MW-12, MW-15, and MW-16 exhibited benzene and/or xylenes concentrations above the WQCC *Water Quality Standards*. Contrary to the prior analytical trend indicating decreasing COC concentrations, the concentrations of COCs now appeared to be rebounding. Elevated benzene concentrations were detected in monitoring wells MW-15 and MW-16 for the first time.

November 2010

Areas 1 through 4: During November 2010, SWG advanced seventeen (17) soil borings across the facility as part of the facility-wide Site investigation. Four (4) of these soil borings were completed as temporary sampling wells to allow the collection of a single groundwater sample prior to plugging and abandonment. The remaining thirteen (13) soil borings were completed as permanent monitoring wells.

February/March 2011

Area 1: *Corrective Action Work Plan (SWG – February 18, 2011)*: Enterprise proposes an in-situ chemical oxidation (ISCO) pilot study at the condensate storage tank area.

Areas 1 through 4: *Environmental Site Investigation (SWG – March 24, 2011)*: Enterprise submits a report to the OCD documenting the facility-wide investigation findings and subsequent groundwater monitoring results. Analytical results from the investigation confirm the presence of hydrocarbon affected soil and groundwater in the vicinity of the retention pond (Area 3). Additionally, benzene is identified at concentrations above the WQCC GQSs in groundwater from monitoring well MW-39, in the vicinity of the current compressors (Area 4).

The groundwater sample collected from monitoring well MW-42, which is located on the hydrogeologically up-gradient boundary of the Site, exhibited a total dissolved solids (TDS) concentration of 75,400 mg/L. Based on the absence of beneficial use of the initial groundwater-bearing unit in the Site vicinity and the identified TDS concentration, the initial groundwater-bearing unit would not be considered an "Underground Source of Drinking Water" in accordance with 19.15.30 NMAC *Remediation*.

May 2011

Area 1: Enterprise performs "pilot study" ISCO activities at the condensate storage tank release area. Approximately 3,500 gallons of injectate were introduced to the substrate near monitoring well MW-12.

October 2011

Area 1: *Corrective Action Pilot Study Report (SWG – October 10, 2012)*: Enterprise submits a report to the OCD documenting the "pilot study" implementation. Field observations during ISCO activities indicate remaining historically impacted soils.

March 2012

Areas 3 and 4: *SSI Work Plan (SWG January 12, 2012)*: Enterprise proposes additional field activities to further delineate dissolve-phase groundwater impact in Areas 3 and 4.

2.3 CONSTITUENTS OF CONCERN

The Site is a natural gas compressor station utilized to dehydrate and compress natural gas collected from production wells in the area for transportation via pipeline. Therefore, COCs targeted from investigation and subsequent corrective action were limited to petroleum hydrocarbon constituents (TPH GRO/DRO and BTEX). In accordance with NMOCD guidelines and general industry practice, the soil and groundwater samples collected during previous completed investigation and corrective action activities were analyzed for TPH GRO/DRO utilizing EPA method SW-846 #8015M and BTEX using EPA SW-846 method #8021B.

Summary of Historical Soil Exceedances

- Based on the laboratory analytical results, TPH GRO/DRO concentrations were identified in soil samples collected from borings B-1(4'), B-2(12.5'), B-5 (17.5'), B-14(17.5') (*Geoprobe Investigation at Largo Compressor Station, Lodestar - May 16, 2009*); B-22(15.0'), B-23(15.0'), B-24(15.0'), B-29(18.0'), hand auger-2(14.0') (*Report of Subsurface Investigation at Largo Compressor Station, Lodestar - November 30, 2009*); MW-33(7.5'), MW-35(9.5'), MW-37(11.5'); and Area 3 excavation samples "BWT" and "NE Wall" (*General Report EPCO Largo Station Summary, SMA - 2009*) above the OCD *Remediation Action Level* of 100 mg/Kg.

- Based on the laboratory analytical results, benzene concentrations were identified in soil samples collected from borings MW-35(9.5') and excavation sample "BWT" (see *General Report EPCO Largo Station Summary, SMA - 2009*) above the OCD *Remediation Action Level* of 10 mg/Kg.

- Based on the laboratory analytical results, the total BTEX concentrations identified in soil samples collected from borings B-22(15.0'), B-23(15.0') (*Report of Subsurface Investigation at Largo Compressor Station, Lodestar - November 30, 2009*); MW-33(7.5'), MW-35(9.5'), MW-37(11.5'); and excavation samples "BWT" and "NE Wall" (see *General Report EPCO Largo Station Summary, SMA - 2009*) were above the OCD *Remediation Action Level* of 50 mg/Kg.

January 2012 Groundwater Exceedances

- Based on the laboratory analytical results from the January 2012 groundwater sampling event, benzene concentrations were identified in groundwater samples collected from monitoring wells MW-7, MW-11, MW-12, MW-15, MW-16, and MW-39 above the NMWQCC *Water Quality Standard* of 10 µg/L.

- Based on the laboratory analytical results from the January 2012 groundwater sampling event, a xylene concentration of 1,500 µg/L was identified in the groundwater sample collected from monitoring well MW-12, which is above the NMWQCC *Water Quality Standard* of 620 µg/L.

Figure 3 indicates the approximate locations of the borings/ monitoring wells completed at the Site in relation to pertinent Site features and general Site boundaries. Figures 5 and 6 detail the OCD *Remediation Action Level* Exceedance Zone in soil and NMWQCC *Groundwater Quality Standard* Exceedance Zone in groundwater (based on April 2012

data), respectively. Comprehensive soil and groundwater analytical results for the site are included in Tables 1 and 2 (Appendix B), respectively.

2.4 OBJECTIVES OF SUPPLEMENTAL SITE INVESTIGATION & QUARTERLY GROUNDWATER MONITORING

The primary objective of the supplemental site investigation activities was to further evaluate the extent of COCs in soil and/or groundwater within Area 3 and Area 4 in accordance with the SSI Work Plan dated January 12, 2012, as submitted to the New Mexico EMNRD OCD in correspondence dated March 2, 2012. In addition, the objective of groundwater monitoring activities was to further evaluate the magnitude and extent of COCs in groundwater across the Site overtime.

3.0 SITE CHARACTERIZATION

3.1 GEOLOGY & HYDROGEOLOGY

According to the New Mexico Bureau of Geology and Mineral Resource (Geologic Map of New Mexico 2003), the Site overlies the upper Nacimiento or lower San Jose geologic formation. The Nacimiento geologic formation is a heterogeneous non-marine formation composed of sandstone, siltstone, and shale, comprised of sediment eroded from the San Juan and Brazos-Sangre de Cristo uplifts. The Paleocene-age Nacimiento Group includes the Puerco and Torrejon Formations. The Eocene age San Jose geologic formation contains a mixture of clastic sedimentary rocks varying from siltstone to conglomerate, dominated by rocks containing sand-sized particles. The lithology encountered at the Site during boring activities were composed of Quaternary alluvial deposits derived from erosion of the parent sandstones and siltstones which comprise the canyon walls. Based on the data collected during the completion of soil borings, the alluvia generally consist of tan silty sands and silty clays from the ground surface to at least 20 feet below ground surface (bgs).

The lithology observed during the advancement of soil boring MW-51 at the Site included a tan silty sand from the surface to approximately 16.0 feet bgs. The silty sand stratum was underlain by a tan brown silty clay from 16.0 feet bgs to 24.0 feet bgs. A tan sand was encountered from 24.0 feet bgs to the terminus depth of 28.0 feet bgs. The lithologies observed in the remaining soil borings at the Site were generally similar to soil boring MW-51, with slightly varying sequences of silty sands and silty clays. Detailed lithologic descriptions are presented on the soil borings logs included in Appendix C.

The major aquifer underlying the Site vicinity is listed as the Colorado Plateaus Aquifer, which is made up of four smaller aquifers, the Uinta-Animas, the Mesa Verde, the Dakota-Glen, and the Coconino-De Chelly. The Uinta-Animas is the shallowest of these aquifers, and is present in the San Juan Basin. The general composition of the aquifers is moderately to well-consolidated sedimentary rocks of an age ranging from Permian to Tertiary. Each aquifer is separated from the others by an impermeable confining unit. Two of the confining units are completely impermeable and cover the entire area of the aquifers. The other two confining units are less extensive and are thinner. These units allow water to flow between the principal aquifers. There are countless streams, rivers, and lakes that overlay the Colorado Plateaus Aquifers. The surface water bodies in this

region provide a place for the aquifers to discharge. Some of the high altitude rivers and lakes may also provide recharge.

The initial groundwater-bearing unit (GWBU) at the Site was encountered at depths ranging from 10.5 to 25 feet bgs during the supplemental investigation activities.

3.2.1 GROUNDWATER FLOW

The previously installed monitoring wells were historically surveyed for top-of-casing (TOC) elevations. The monitoring wells installed during this SSI have not yet been surveyed, however, they will be surveyed and included in future groundwater elevation and flow determinations. Prior to sample collection, SWG gauged the depth to fluids in each monitoring well. The groundwater flow direction at the Site is generally towards the northwest, with an average gradient of 0.0035 ft/ft.

Groundwater measurements collected during the most recent gauging event in April 2012 are presented with TOC elevations in Table 3, Appendix B. A groundwater gradient map for the April 2012 event is included as Figure 4 (Appendix A).

3.2.2 GROUNDWATER CLASSIFICATION

In accordance with 19.15.30 NMAC *Remediation*, a groundwater-bearing unit is classified as an "Underground Source of Drinking Water" provided the groundwater-bearing unit is capable of producing water for human consumption or that contains ground water having a total dissolved solids (TDS) concentration of 10,000 mg/l or less and that is not an exempted aquifer".

Based on the TDS analysis from upgradient monitoring well MW-42 (75,400 mg/L), the local GWBU may not qualify as an "Underground Source of Drinking Water".

3.3 LAND USE & CLASSIFICATION

Due to the absence of land use classification guidelines in the OCD *Guidelines for Remediation of Leaks, Spills and Releases* and/or NMAC 19.15.30 *Remediation*, land use was determined by comparison of existing land use of the Site to the definitions for residential and non-residential land use published in the available New Mexico Environment Department (NMED) regulatory guidance. Based on the available NMED guidance, non-residential land use encompasses all commercial and industrial land uses.

The Site is an active compressor station, while adjacent, and surrounding (beyond adjacent) properties, are currently utilized as undeveloped agricultural rangeland with occasional oil and gas gathering facilities. A ranch house is located approximately 1,800 feet west of the site, across Palluche Canyon. Based on SWG's review of the available information and visual inspection of the Site and vicinity, the Site appears to meet the non-residential land use classification.

3.4 SITE RANKING & PROPOSED CLEANUP GOALS

The Site is subject to regulatory oversight by the New Mexico EMNRD OCD. To address activities related to condensate releases, the New Mexico EMNRD OCD utilizes the *Guidelines for Remediation of Leaks, Spills and Releases* as guidance, in addition to the

OCD rules, specifically NMAC 19.15.30 *Remediation*. These guidance documents establish investigation and abatement action requirements for sites subject to reporting and/or corrective action.

In accordance with the OCD's *Guidelines for Remediation of Leaks, Spills and Releases*, SWG utilized the general site characteristics to determine the appropriate "ranking" for the Site. The ranking criteria and associated scoring are provided in the following table:

Ranking Criteria			Ranking Score
Depth to Groundwater	<50 feet	20	20
	50 to 99 feet	10	
	>100 feet	0	
Wellhead Protection Area • <1,000 feet from a water source, or; <200 feet from private domestic water source.	Yes	20	0
	No	0	
Distance to Surface Water Body	<200 feet	20	10
	200 to 1,000 feet	10	
	>1,000 feet	0	
Total Ranking Score			30

Based on SWG's evaluation of the scoring criteria, the Site would have a Total Ranking Score of 30. This ranking is based on the following:

- The depth to the initial groundwater-bearing zone is <50 feet at the Site.
- Nearby drinking water sources were not identified within 1,000 feet of the Site.
- Largo wash, which is approximate 425 feet north of the Site, is the nearest surface water feature.

Based on a Total Ranking Score of 30, cleanup goals for soil located at the Site include: 10 mg/Kg for benzene, 50 mg/Kg for total BTEX and 100 mg/Kg for TPH GRO/DRO.

In addition, cleanup goals for groundwater located at the Site include the NMWQCC *Water Quality Standards* of: 10 µg/L for benzene, 750 µg/L for toluene, 750 µg/L for ethylbenzene, and 620 µg/L for xylenes. However, the New Mexico WQCC *Groundwater Quality Standards* may not be applicable since the initial groundwater-bearing unit would not be considered an "Underground Source of Drinking Water" in accordance with 19.15.30 NMAC *Remediation* (The TDS analysis from upgradient monitoring well MW-42 (75,400 mg/L) exceeds the 10,000 mg/L drinking water requirement). Additional TDS analyses will be performed to determine ultimate applicability.

4.0 SUPPLEMENTAL SITE INVESTIGATION

4.1 SOIL BORINGS & MONITORING WELLS

In accordance with the SSI Work Plan dated January 12, 2012, as submitted to the New Mexico EMNRD, OCD in correspondence dated March 2, 2012, six (6) soil borings (MW-

40R, MW-48, MW-49, MW-50, MW-51, and MW-52) were advanced at the site. Boring MW-40R was advanced to provide a deeper replacement well for monitoring well MW-40, which was plugged and abandoned in general accordance with NMAC 19.27.4.30 *RULES AND REGULATIONS GOVERNING WELL DRILLER LICENSING; CONSTRUCTION, REPAIR AND PLUGGING OF WELLS*. Borings MW-48 and MW-49 were advanced north of CR-379, hydrogeologically downgradient of the retention pond area (Area 3). Borings MW-50 and MW-51 were advanced hydrogeologically downgradient of previously installed monitoring well MW-39, and boring MW-52 was advanced upgradient of MW-39 (Area 4).

Figure 3 of Appendix A is a Site Map which depicts the location of the soil boring in relation to pertinent land features.

Soil samples were collected continuously, utilizing four-foot core barrel samplers to the termination depth of each soil boring. Soil samples were observed to document soil lithology, color, moisture content, and visual and olfactory evidence of petroleum hydrocarbons. Field headspace analysis was conducted by placing the portion of the soil sample designated for field screening into a plastic Ziplock® bag. The plastic bag was sealed, and the sample allowed to volatilize. The air above the sample, the headspace, was then evaluated using a photoionization detector (PID) capable of detecting volatile organic compounds (VOCs). The PID was calibrated utilizing an isobutylene standard prior to use in the field.

During the completion of each soil boring, an on-Site geoscientist documented the lithology encountered and constructed a continuous profile of the soil column from the surface to the boring terminus. Soil samples from each boring location were visually inspected and classified in the field. The lithology observed during the advancement of soil boring MW-51 at the Site included a tan silty sand from the surface to approximately 16.0 feet bgs. The silty sand stratum was underlain by a tan silty clay from 16.0 feet bgs to 24.0 feet bgs. A tan sand was encountered from 24.0 feet bgs to the terminus depth of 28.0 feet bgs. The lithologies observed in the remaining soil borings at the Site were generally similar to soil boring MW-51, with slightly varying sequences of silty sands and silty clays. Detailed lithologic descriptions are presented on the soil borings logs included in Appendix C.

PID readings were not identified above the instrument detection limit in the soils screened from borings MW-49, MW-50, and MW-52. PID readings ranged from below instrument detection to 373 part per million (ppm) in the soils screened from borings MW-48 (high of 9 ppm) and MW-51 (high of 373 ppm). The PID readings identified in association with soils screened from boring MW-48 were confined to the capillary fringe zone, while PID readings > 0 ppm were observed in soils screened from boring MW-51 at depths between 8 and 20 feet bgs, and again at the capillary fringe (23 feet bgs). The highest PID reading from soil boring MW-51 was recorded between 12 and 13 feet bgs. Field screening results are presented on the soil boring logs included in Appendix C.

Subsequent to advancement, each of the soil borings were converted to permanent groundwater monitoring wells. The monitoring wells were completed using the following methodology:

- Installation of 10 feet of 2-inch inside diameter, 0.010-inch machine slotted PVC well screen with a threaded bottom cap;

- Installation of 2-inch inside diameter, threaded flush joint PVC riser pipe to the ground surface;
- Addition of a pre-sieved 10/20 grade annular silica sand pack from the bottom of the soil boring to 2-feet above the top of the well screen;
- Addition of a hydrated bentonite seal above the sand pack filter zone;
- Addition of grout to the surface; and,
- Installation of a locking well cap and circular, bolt-down, flush mount well cover or above-grade "stick up" steel cover.

Monitoring well construction details are presented on the monitoring well logs included in Appendix C.

4.2 INVESTIGATION SAMPLING PROGRAM

4.2.1 SOIL SAMPLING PROGRAM

SWG's soil sampling program involved submitting one (1) soil sample from each soil boring for laboratory analysis, with the exception of soil boring MW-40R which was a replacement well. Soil samples were collected from the zone exhibiting the highest PID reading, from a change in lithology, or from the bottom of the boring, based on the field professional's judgment.

Soil sample intervals are presented with the soil sample analytical results (Table 1) in Appendix B and are provided on the boring logs included in Appendix C.

4.2.2 GROUNDWATER SAMPLING PROGRAM

Each of the newly installed monitoring wells was sampled as part of the quarterly groundwater monitoring program. Prior to sample collection, each monitoring well was micro-purged utilizing low-flow sampling techniques. Low-flow refers to the velocity with which groundwater enters the pump intake and that is imparted to the formation pore water in the immediate vicinity of the well screen. It does not necessarily refer to the flow rate of water discharged at the surface which can be affected by flow regulators or restrictions. Water level drawdown provides the best indication of the stress imparted by a given flow-rate for a given hydrological situation. The objective was to pump in a manner that minimizes stress (drawdown) to the system to the extent practical taking into account established site sampling objectives. Flow rates on the order of 0.1 to 0.5 L/min were maintained during the sampling activities using dedicated sampling equipment.

The utilization of low-flow minimal drawdown techniques enables the isolation of the screened interval groundwater from the overlying stagnant casing water. The pump intake is placed within the screened interval such that the groundwater recovered is drawn in directly from the formation with little mixing of casing water or disturbance to the sampling zone.

The monitoring wells were purged until produced groundwater was consistent in color, clarity, pH, dissolved oxygen (DO), oxidation/reduction potential (ORP), temperature, and conductivity.

4.3 LABORATORY ANALYTICAL PROGRAM

The soil and groundwater samples were analyzed for TPH GRO/DRO using EPA method SW-846 #8015B and BTEX using EPA method SW-846 method #8021B.

Laboratory results are summarized in the tables included in Appendix B. The executed chain-of-custody form and laboratory data sheets are provided in Appendix D.

4.4 QUALITY ASSURANCE/QUALITY CONTROL (QA/QC)

All non-disposable sampling equipment was cleaned using an Alconox® wash and potable water rinse prior to the beginning of the project and before the collection of each sample.

Soil and groundwater samples were collected and placed in laboratory prepared glassware, sealed with custody tape and placed on ice in a cooler, which was secured with a custody seal. The sample coolers and completed chain-of-custody forms were relinquished to Hall Environmental Analysis Laboratory (HEAL) in Albuquerque, New Mexico for standard turnaround.

HEAL performed the analyses of samples under an adequate and documented quality assurance program to meet the project and data quality objectives. The laboratory's quality assurance program is generally consistent the quality standards outlined in the National Environmental Laboratory Accreditation Program, as amended. In addition, the data generated by HEAL meet the intra-laboratory performance standards for the selected analytical method and the performance standards are sufficient to meet the bias, precision, sensitivity, representativeness, comparability, and completeness, as specified in the project data quality objectives.

4.5 DATA EVALUATION

The Site is subject to regulatory oversight by the New Mexico EMNRD OCD. To address activities related to crude oil/condensate related releases, the New Mexico EMNRD OCD utilizes the *Guidelines for Remediation of Leaks, Spills and Releases* as guidance, in addition to the EMNRD/OCD rules, specifically New Mexico Administrative Code (NMAC) 19.15.30 *Remediation*. These guidance documents establish investigation and abatement action requirements for sites subject to reporting and/or corrective action.

4.5.1 Soil Samples

SWG compared the TPH GRO/DRO and BTEX concentrations or laboratory reporting limits (RLs) associated with the soil samples collected from soil borings MW-48 through MW-52 to the OCD *Remediation Action Levels*.

TPH GRO/DRO

Soil samples collected from soil borings MW-48 through MW-52 did not exhibit TPH GRO/DRO concentrations above the laboratory RLs, which are below the OCD's *Remediation Action Level* of 100 mg/Kg.

Benzene

The soil samples collected from soil borings MW-48 through MW-52 exhibited benzene concentrations ranging from below the laboratory RLs to 0.056 mg/Kg, which are below the OCD's *Remediation Action Level* of 10 mg/Kg.

Total BTEX

The soil samples collected from soil borings MW-48 through MW-52 exhibited total BTEX concentrations from below the laboratory RLs to 0.456 mg/Kg, which are below the OCD's *Remediation Action Level* of 50 mg/Kg.

The results of the soil sample analyses are summarized in Table 1 of Appendix B. Figure 5 (Appendix A) presents the *Remediation Action Level* Exceedance Zone in Soil based on the cumulative soil analytical data.

4.5.2 Groundwater Samples

SWG compared BTEX concentrations or laboratory RLs associated with the groundwater samples collected from monitoring wells during the April 2012 sampling event to the New Mexico WQCC *Groundwater Quality Standards;* however, the New Mexico WQCC *Groundwater Quality Standards* may not be applicable since the initial groundwater-bearing unit would not be considered an "Underground Source of Drinking Water" in accordance with 19.15.30 NMAC *Remediation.*

TPH GRO/DRO

The groundwater samples collected from monitoring wells MW-3R, MW-7, MW-11, MW-12, MW-15, MW-16, MW-39, MW-47, MW-48, and MW-51 exhibited TPH GRO concentrations ranging from 0.14 mg/L to 25 mg/L, and TPH DRO concentrations ranging from <1.0 mg/L to 112 mg/L. The highest GRO concentration identified during the April 2012 sampling event was observed in association with the groundwater sample collected from monitoring well MW-48 (25 mg/L) and the highest DRO concentration was observed in association with the sample collected from monitoring well MW-39 (112 mg/L).

The groundwater samples collected from the remaining monitoring wells did not exhibit TPH GRO or DRO concentrations above the laboratory RLs during the January 2012 sampling event.

Benzene, Toluene, Ethylbenzene, and Xylenes

Due to the presence of LNAPL hydrocarbons in association with the initial groundwater-bearing unit, monitoring wells MW-33, MW-35, and MW-37 were not sampled during the completion of field activities.

The groundwater samples collected from monitoring wells MW-7, MW-11, MW-12, MW-15, MW-16, MW-39, MW-47, MW-48, and MW-51 exhibited benzene concentrations ranging from 11 µg/L to 4,300 µg/L, which exceed the WQCC *Groundwater Quality Standard* of 10 µg/L.

The groundwater samples collected from the remaining monitoring wells did not exhibit benzene concentrations above the laboratory RLs, which are below the WQCC *Groundwater Quality Standard* of 10 µg/L.

The groundwater samples collected from monitoring wells MW-48 and MW-51 exhibited toluene concentrations of 3,200 µg/L and 3,600 µg/L respectively, which exceed the WQCC *Groundwater Quality Standard* of 750 µg/L.

The groundwater samples collected from the remaining monitoring wells exhibited toluene concentrations ranging from below the laboratory RLs to 620 µg/L, which are below the WQCC *Groundwater Quality Standard* of 750 µg/L.

The groundwater samples collected from the monitoring wells during the April 2012 sampling event exhibited ethylbenzene concentrations ranging from below the laboratory RLs to 360 µg/L which are below the WQCC *Groundwater Quality Standard* of 750 µg/L.

The groundwater samples collected from monitoring wells MW-12, MW-39, MW-48, and MW-51 exhibited total xylene concentrations ranging from 860 µg/L to 5,000 µg/L, which exceed the WQCC *Groundwater Quality Standard* of 620 µg/L.

The groundwater samples collected from the remaining monitoring wells exhibited xylene concentrations ranging from below the laboratory RLs to 38 µg/L, which are below the WQCC *Groundwater Quality Standard* of 620 µg/L.

The results of the groundwater sample analyses are summarized in Table 2 of Appendix B. Figure 6 (Appendix A) presents the *Groundwater Quality Standard* Exceedance Zone for Benzene based on the April 2012 groundwater analytical data.

5.0 FINDINGS AND RECOMMENDATIONS

The primary objective of the supplemental site investigation activities was to further evaluate the extent of COCs in soil and/or groundwater within Area 3 and Area 4. In addition, the objective of groundwater monitoring activities was to further evaluate the magnitude and extent of COCs in groundwater across the Site overtime.

Area 1(Condensate Storage Tank Area)
The northeastern portion of the Site includes the condensate storage tank battery which has been under investigation since January 2008, when a release from a frozen value was discovered and reported to the OCD. A "Pilot Study" (*Corrective Action Pilot Study Report, SWG October 2011*) was performed in 2011 to evaluate the effectiveness of in-situ chemical oxidation (ISCO) at reducing the level of VOCs in the source area substrate. Additional ISCO may be utilized at Area 1 once the storage tanks and soils beneath the tanks have been removed. Tank cleaning and removal are scheduled for June/July of 2012.

As part of the quarterly groundwater monitoring program, groundwater samples were collected from the twelve (12) existing monitoring wells in this area. COC concentrations in Area 1 groundwater generally decreased during the April 2012 groundwater sampling event, with the exception of monitoring well MW-47. Benzene was detected in the sample from MW-47 at a concentration of 11 µg/L, which exceeds the WQCC *Groundwater Quality Standard* of 10 µg/L. If this result is verified during the subsequent quarterly sampling event, additional delineation may be required. With the exception of the exceedance at MW-47, the dissolve-phase distribution of COCs appears to remain delineated by the current monitoring well network.

The groundwater samples collected from monitoring wells MW-7, MW-11, MW-12, MW-15, MW-16, and MW-47 exhibited benzene concentrations ranging from 11 µg/L to 4,300 µg/L, which exceed the WQCC *Groundwater Quality Standard* of 10 µg/L.

The groundwater sample collected from monitoring well MW-12 exhibited a total xylene concentration 930 µg/L, which exceed the WQCC *Groundwater Quality Standard* of 620 µg/L.

Enterprise is currently evaluating supplemental corrective action alternatives to further reduce the identified COC concentrations in soil and groundwater in Area 1.

Area 2 (Valve Box Area)

Based on the results of historic corrective actions and subsequent investigation activities (TSW-44), *Remediation Action Level Exceedance Zone(s)* and/or WQCC *Groundwater Quality Standard Zone(s)* are not associated with Area 2.

Area 3 (Retention Pond Area)

Historic soil and groundwater impact was reported during the excavation of a storm-water retention pond at the Site in June of 2009. Approximately 1,700 cubic yards of petroleum hydrocarbon affected soils were excavated from the area and disposed off-site, and approximately 1,120 barrels of hydrocarbon affected groundwater was removed from the resulting excavation and disposed off-site.

NAPL is present in association with the initial groundwater-bearing unit in monitoring wells MW-33, MW-35, and MW-37. Inadvertently, these wells were not gauged during the April 2012 groundwater monitoring event, but will be gauged during the future events.

Satellite imagery and topographic maps suggest a former drainage channel traverses the Site from south to north through the retention pond area, resulting in the identified distribution of COC in the initial groundwater-bearing zone in Area 3. Two (2) monitoring wells, MW-48 and MW-49, were advanced downgradient of monitoring well MW-37 during the supplemental site investigation.

The groundwater sample collected from monitoring well MW-48 exhibited benzene, toluene, and total xylenes at concentrations which exceed the WQCC *Groundwater Quality Standards*.

Partial delineation of the dissolve-phase COC plume is provided by the existing monitoring well network, but additional investigation would be required to further evaluate the extent of COCs in groundwater to the north, hydrogeologically down-gradient of monitoring well MW-48.

Area 4 (Compression & Dehydration Area)

Hydrocarbon affected soil and groundwater were identified north, hydrogeologically down-gradient from the current natural gas compressors at monitoring well MW-39. Three (3) additional soil borings/monitoring wells (MW-50, MW-51, and MW-52) were installed during the supplemental site investigation in the vicinity of the current compressors and related appurtenances.

Laboratory analytical results did not identify COC concentrations in soil in exceedance of the OCD ***Remediation Action Levels***.

The groundwater samples collected from monitoring wells MW-39 and MW-51 exhibited benzene concentrations ranging of 1,500 µg/L and 1,200 µg/L, respectfully, which exceed the WQCC *Groundwater Quality Standard* of 10 µg/L.

The groundwater sample collected from monitoring well MW-51 exhibited a toluene concentration of 3,600 µg/L, which exceeds the WQCC *Groundwater Quality Standard* of 750 µg/L.

The groundwater samples collected from monitoring wells MW-39 and MW-51 exhibited total xylene concentrations ranging from 860 µg/L to 1,400 µg/L, which exceeds the WQCC *Groundwater Quality Standard* of 620 µg/L.

Based on the results of the supplemental site investigation and subsequent quarterly groundwater monitoring, the dissolve-phase COC groundwater plume in the vicinity of the compressors and glycol unit appears to be defined within the current monitoring well network.

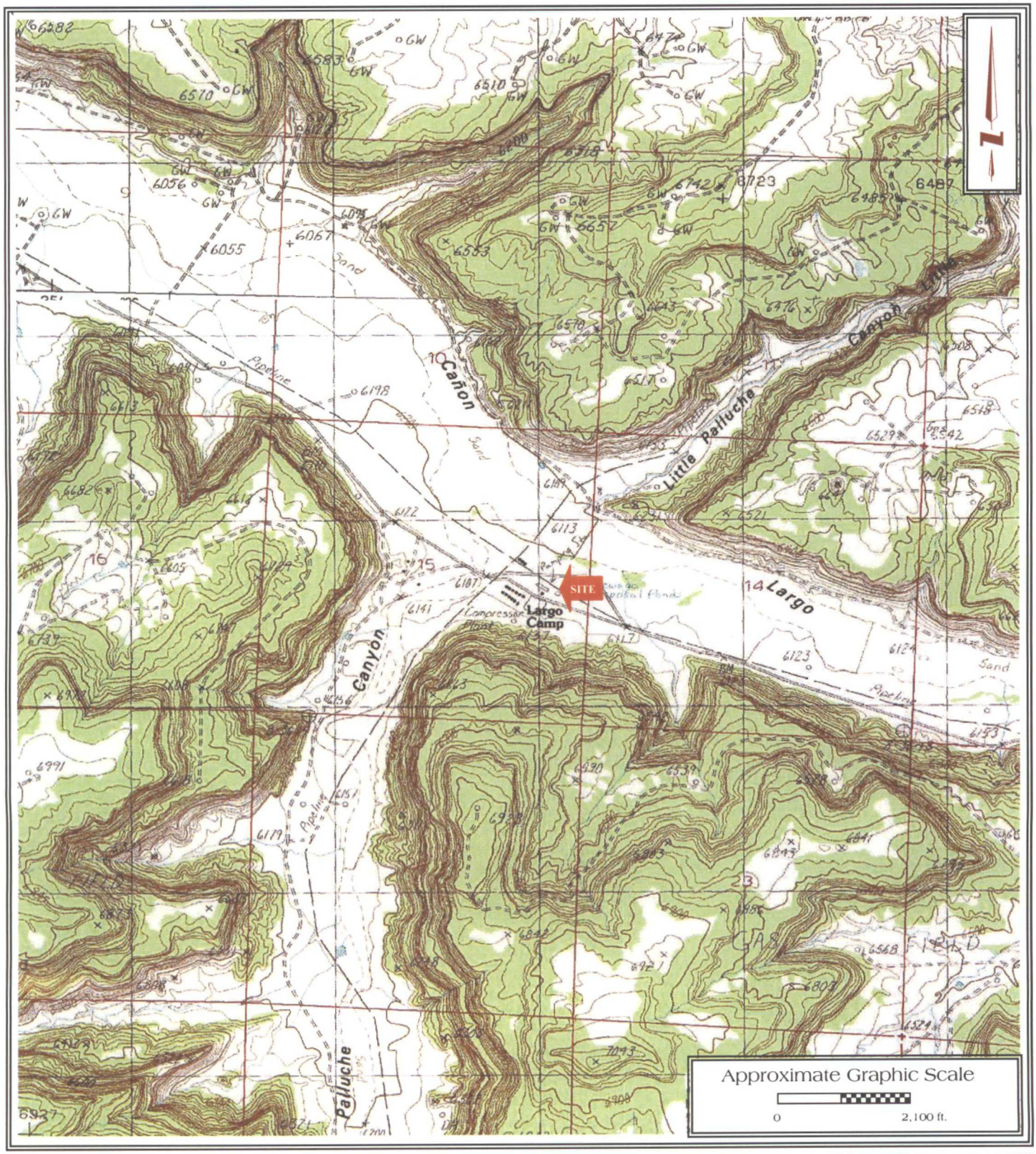
Based on the results of this supplemental investigation and groundwater monitoring activities, SWG has the following recommendations:

- Report the results of this investigation to the OCD;
- Conduct additional investigation activities to further evaluate the extent of COCs in groundwater within Areas 1 and 3.
- Prepare and submit a Corrective Action Work Plan (RAP) to the OCD detailing potential corrective action alternatives to address LNAPL and/or COCs identified in soil and groundwater at the Site; and

Southwest GEOSCIENCE

APPENDIX A

Figures



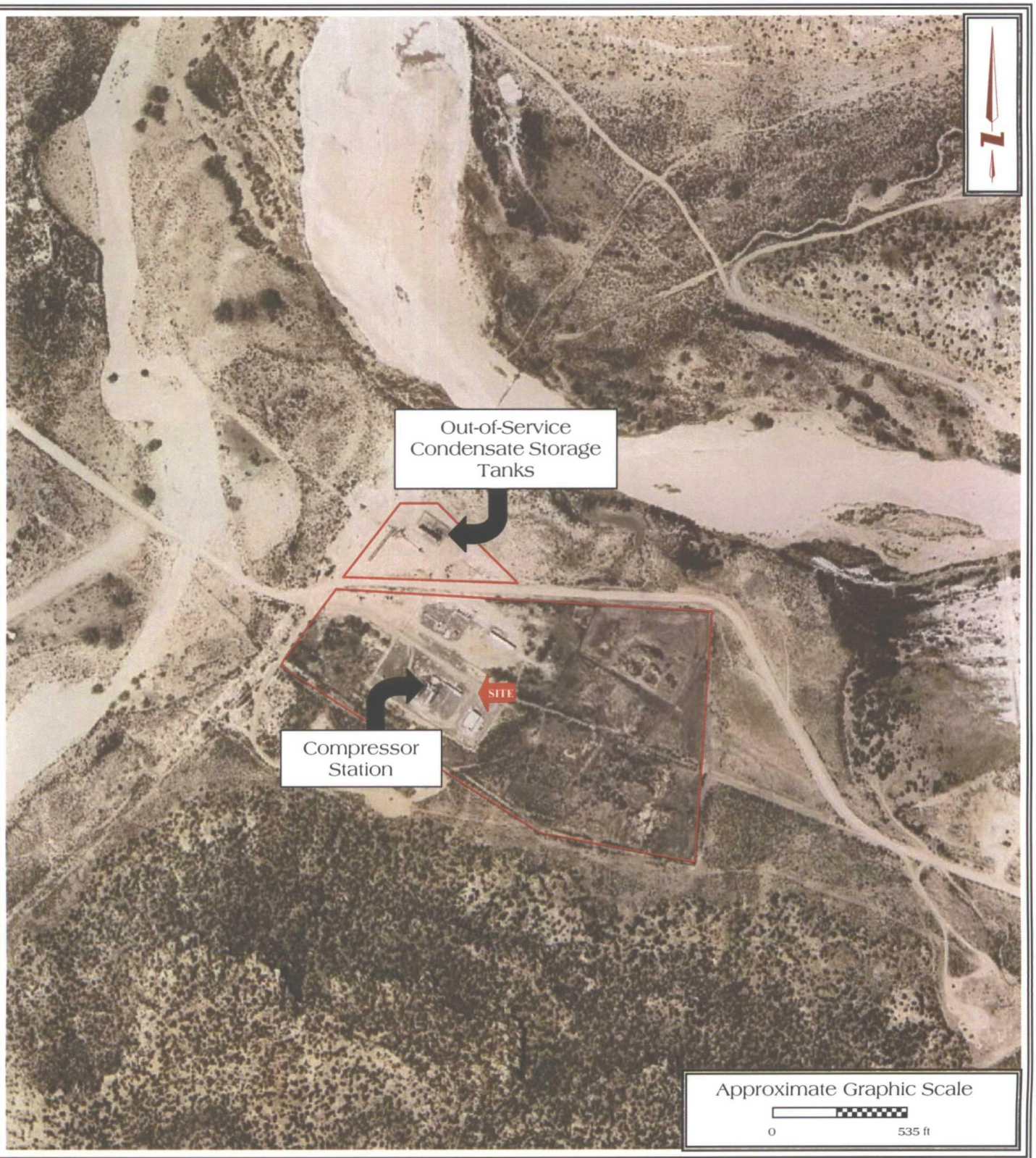
Largo Compressor Station
SE1/4 of NE1/4, S15 T26N R7W
Rio Arriba Co., New Mexico
N36° 29' 12.63"; W107° 33' 27.79"

SWG Project No. 0410002

Southwest GEOSCIENCE

FIGURE 1

Topographic Map
Smouse Mesa & Gould Pass, NM Quadrangle
Contour Interval – 20 Feet
1985



Largo Compressor Station
SE1/4 of NE1/4, S15 T26N R7W
Rio Arriba Co., New Mexico
N36° 29' 12.63"; W107° 33' 27.79"

SWG Project No. 0410002

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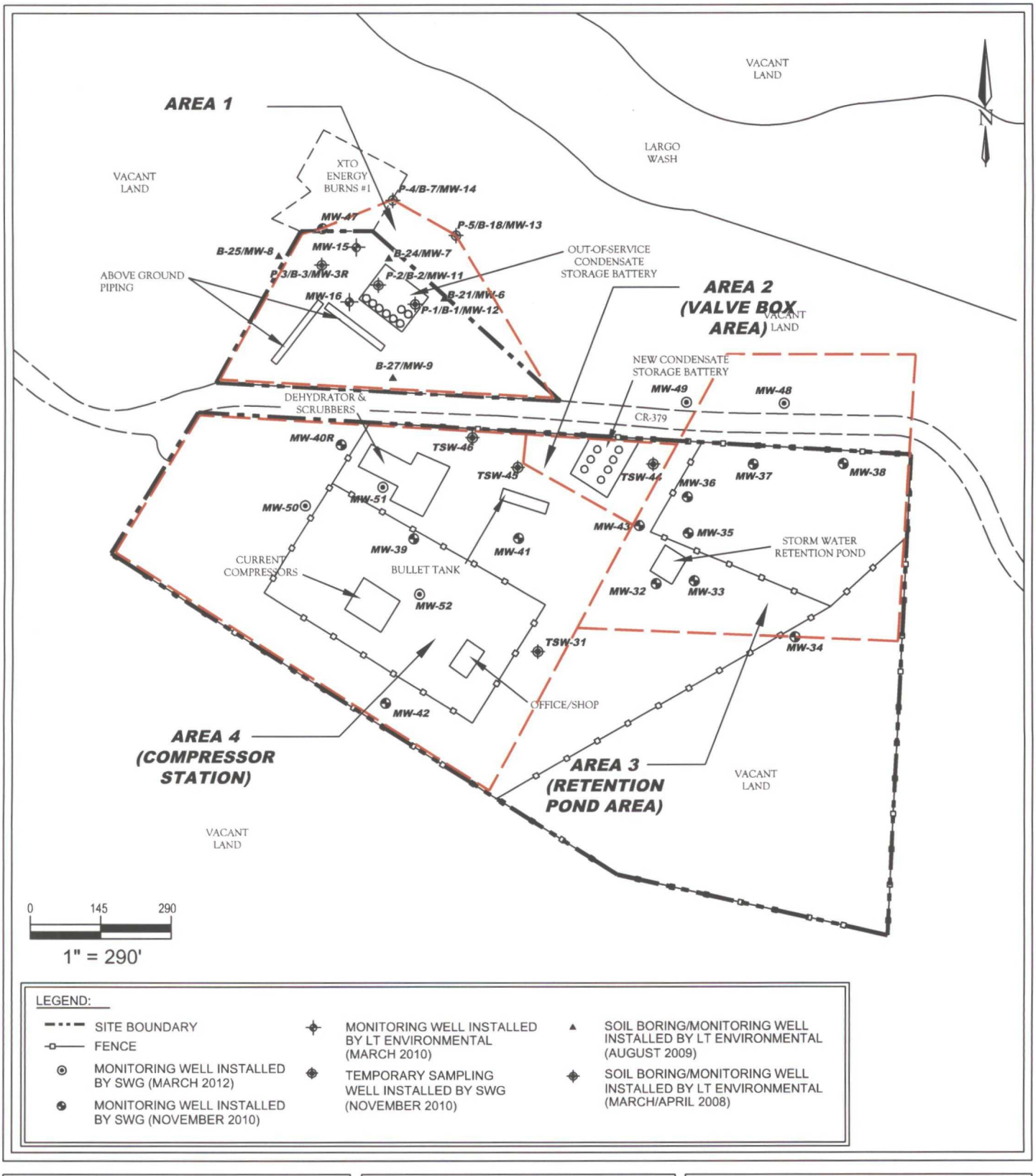
FIGURE 2
Site Vicinity Map
2010 Google Earth



Largo Compressor Station
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Rio Arriba Co., New Mexico
N36° 29' 12.63"; W107° 33' 27.79"

SWG Project No. 0410002

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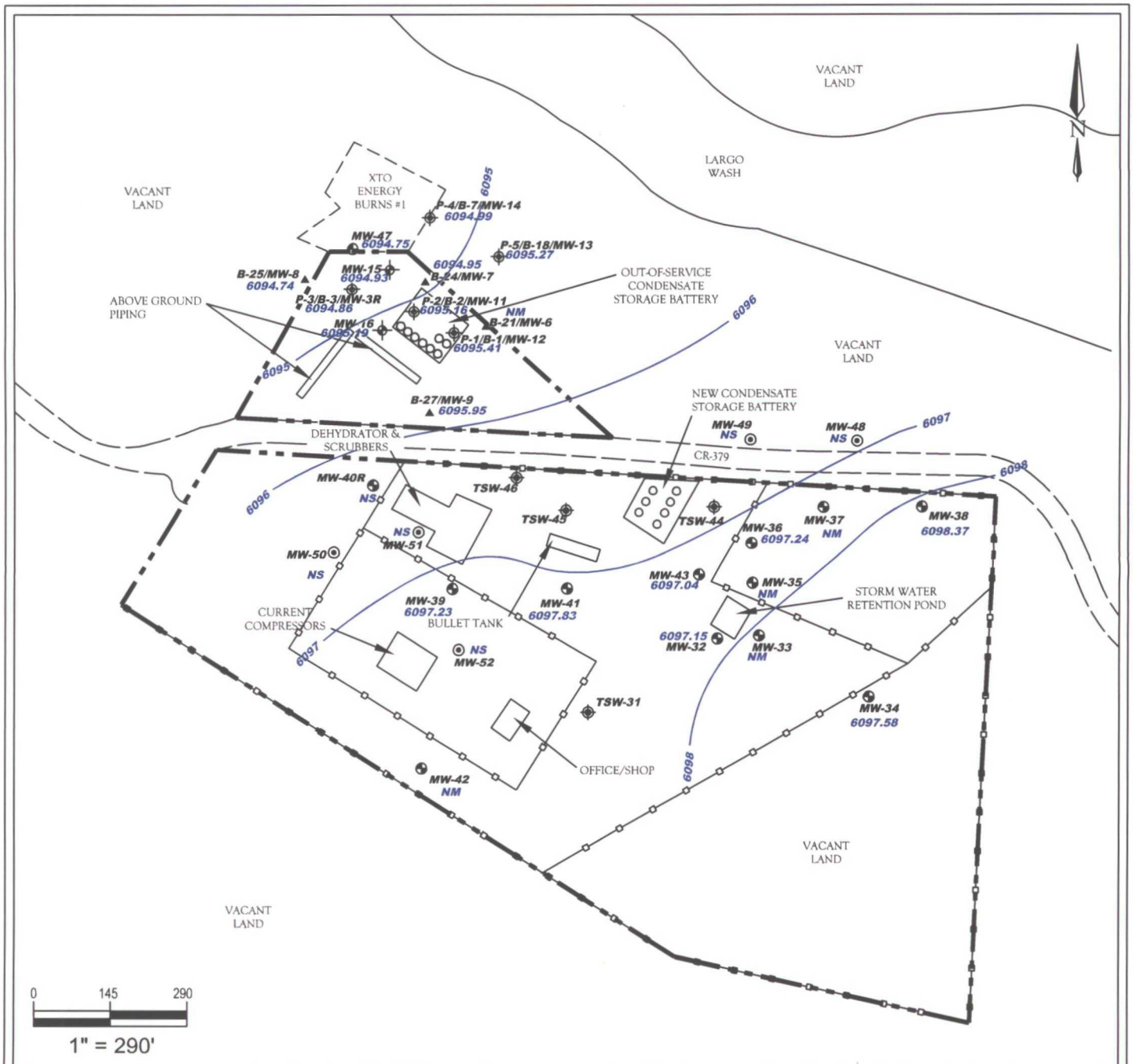
FIGURE 3

SITE MAP



LEGEND:

- SITE BOUNDARY
- FENCE
- NM — NOT MEASURED
- NS — NOT SURVEYED
- 6098.42 — GROUNDWATER ELEVATION (FEET AMSL)
- MONITORING WELL INSTALLED BY SWG (MARCH 2012)
- MONITORING WELL INSTALLED BY SWG (NOVEMBER 2010)
- TEMPORARY SAMPLING WELL INSTALLED BY SWG (NOVEMBER 2010)
- MONITORING WELL INSTALLED BY LT ENVIRONMENTAL (MARCH 2010)
- SOIL BORING/MONITORING WELL INSTALLED BY LT ENVIRONMENTAL (AUGUST 2009)
- SOIL BORING/MONITORING WELL INSTALLED BY LT ENVIRONMENTAL (MARCH/APRIL 2008)
- 6095 — GROUNDWATER ELEVATION CONTOUR (FEET AMSL) (CONTOUR INTERVAL = 1 FT)

Largo Compressor Station
SE1/4 of NE1/4, S15 T26N R7W
Rio Arriba Co., New Mexico
N36° 29' 12.63"; W107° 33' 27.79"

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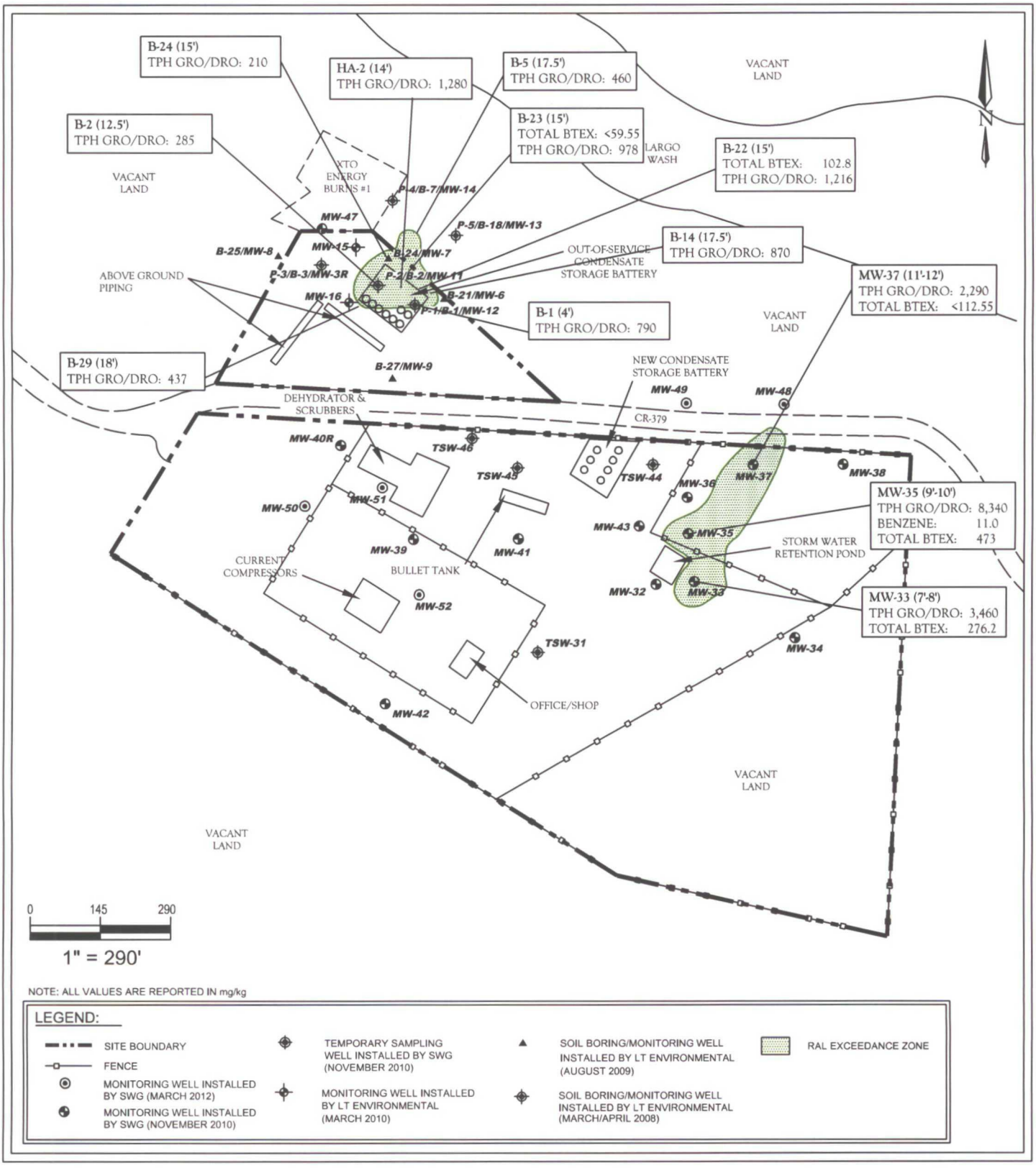
FIGURE 4

GROUNDWATER GRADIENT MAP

APRIL 2012



Largo Compressor Station
SE1/4 of NE1/4, S15 T26N R7W
Rio Arriba Co., New Mexico
N36° 29' 12.63"; W107° 33' 27.79"

SWG Project No. 0410002

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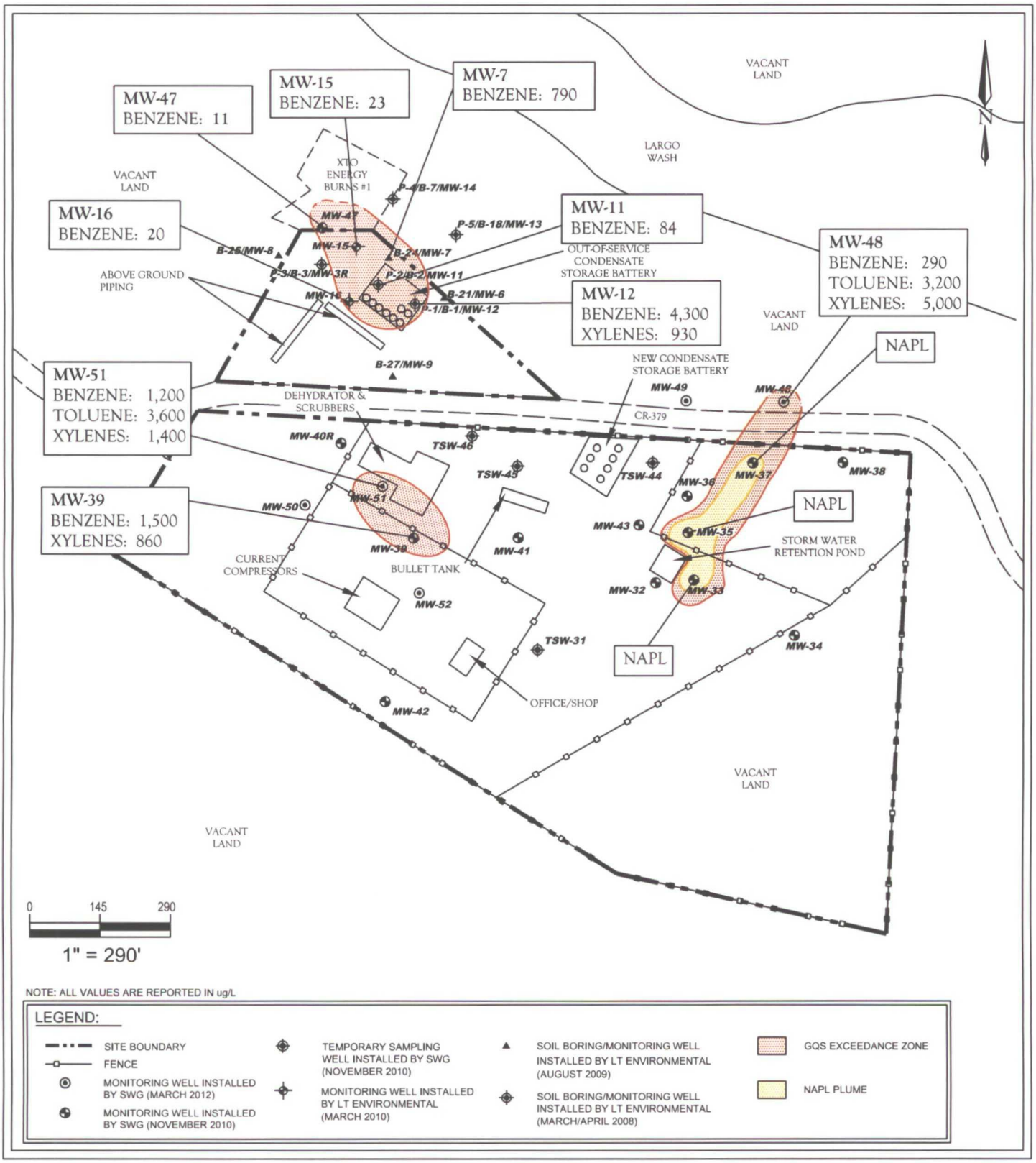
FIGURE 5

REMEDIATION ACTION LEVEL (RAL) EXCEEDANCE ZONE IN SOIL



Largo Compressor Station
SE1/4 of NE1/4, S15 T26N R7W
Rio Arriba Co., New Mexico
N36° 29' 12.63"; W107° 33' 27.79"

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FIGURE 6

GROUNDWATER (GQS) EXCEEDANCE ZONE IN GROUNDWATER

APRIL 2012

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APPENDIX B

Tables

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TABLE 1
Largo Compressor Station
SOIL ANALYTICAL SUMMARY

Sample I.D.	Date	Sample Depth (feet)	Benzene (mg/kg)	Toluene (mg/kg)	Ethylbenzene (mg/kg)	Xylenes (mg/kg)	Total BTEX (mg/kg)	TPH GRO (mg/kg)	TPH DRO (mg/kg)
New Mexico Energy, Mineral & Natural Resources Department, Oil Conservation Division, Remediation Action Level			10	NE	NE	NE	50	100	
Soil Boring Advanced by Lodestar/LTE									
B-1	3.31.08	4.0	<0.5	<0.5	1.5	44	<46.5	**550**	**240**
B-1	3.31.08	14.5	1.8	<0.05	0.12	0.25	<2.22	6.7	<10
B-2	3.31.08	12.5	<0.5	1.4	0.82	13	<15.72	**240**	**45**
B-2	3.31.08	21.0	1.5	<0.05	<0.05	0.23	<1.83	7.5	<10
B-3	3.31.08	21.0	<0.05	<0.05	<0.05	<0.1	<0.16	<5.0	<10
B-4	3.31.08	23.0	0.64	<0.05	0.19	0.12	<1	<5.0	<10
B-5	4.01.08	17.5	1.2	<0.1	1.7	17	<20	**400**	**60**
B-6	4.01.08	18.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-7	4.01.08	18.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-8	4.01.08	18.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-9	4.01.08	21.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-10	4.01.08	10.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-10	4.01.08	20.0	0.06	<0.05	0.16	2.3	<2.57	55	<10
B-11	4.01.08	20.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-12	4.02.08	18.5	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-12	4.02.08	20.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-13	4.02.08	10.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-13	4.02.08	12.5	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-13	4.02.08	20.0	0.092	<0.05	<0.05	<0.1	<0.292	9.8	<10
B-14	4.02.08	5.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-14	4.02.08	17.5	6.2	5.5	1.8	18	31.5	**870**	**<10**
B-14	4.02.08	22.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-15	4.02.08	17.5	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-15	4.02.08	20.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-16	4.02.08	20.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-17	4.02.08	17.5	0.47	<0.05	<0.05	<0.1	<0.67	<5.0	<10
B-17	4.02.08	20.0	0.069	<0.05	<0.05	<0.1	<0.269	<5.0	<10
B-18	4.02.08	20.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-19	4.02.08	20.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-21	8.04.09	20.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-22	8.04.09	15.0	10	25	5.8	62	**102.8**	**1200**	**16**
B-22	8.04.09	20.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-23	8.04.09	15.0	<0.25	9.3	4	46	**<59.55**	**960**	**18**
B-23	8.04.09	20.0	0.28	<0.05	<0.05	<0.1	<0.48	<5.0	<10
B-24	8.04.09	15.0	<0.25	<0.25	0.63	7.9	<9.03	**200**	**10**
B-24	8.04.09	22.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-25	8.04.09	20.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-26	8.04.09	20.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-27	8.04.09	20.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-28	8.07.09	15.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-28	8.07.09	20.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-29	8.07.09	15.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-29	8.07.09	20.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-29	8.07.09	18.0	<1.0	<1.0	1.7	18	<21.7	**420**	**17**
B-30	8.07.09	15.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
B-30	8.07.09	20.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
Hand Auger -1	8.07.09	5.0	<0.05	<0.05	<0.05	<0.1	<0.25	<5.0	<10
Hand Auger -2	8.07.09	14.0	<1.0	<1.0	<1.0	<3.0	<6.0	**980**	**300**

Note: Concentrations in **bold** and yellow exceed the applicable OCD Remediation Action Level

NA = Not Analyzed

NE = Not Established

NAPL = Non-aqueous phase liquid

* = piezometer well was replaced with associated monitoring well

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TABLE 1
Largo Compressor Station
SOIL ANALYTICAL SUMMARY

Sample I.D.	Date	Sample Depth (feet)	Benzene (mg/kg)	Toluene (mg/kg)	Ethylbenzene (mg/kg)	Xylenes (mg/kg)	Total BTEX (mg/kg)	TPH GRO (mg/kg)	TPH DRO (mg/kg)
New Mexico Energy, Mineral & Natural Resources Department, Oil Conservation Division, Remediation Action Level			10	NE	NE	NE	50	100	
Soil Samples Collected by Souder, Miller and Associates									
Area 2 (Valve Box Area)									
Riser Wall (South)	7.01.09	5 - 10	NA	NA	NA	NA	NA	<5.0	28
South Wall (East)	7.01.11	5 - 10	NA	NA	NA	NA	NA	<5.0	17
North Wall (West)	7.01.11	5 - 10	NA	NA	NA	NA	NA	<5.0	<10
Road Wall (North)	7.09.11	13	<0.050	<0.050	<0.050	<0.10	ND	<5.0	<10
Area 3 (Retention Pond Area)									
PH-6	6.26.09	Not Avail.	NA	NA	NA	NA	NA	<10	<10
RPE	7.14.09	13.0	0.5	1.8	0.25	2.6	5.15	28	13
RPES	7.14.09	0.0	<0.050	1.2	0.07	8.4	9.72	**130**	**40**
BWT	7.15.09	20.0	**14**	210	45	460	**729**	**7,200**	**540**
NE Wall	7.15.09	Not Avail.	9.7	67	31	230	111	**4,000**	**360**
Soil Borings Advanced by Southwest Geoscience									
TSW-31	11.16.10	12.0 - 14.0	<0.05	<0.05	<0.05	<0.10	<0.25	<5.0	<10
MW-32	11.16.10	13.0 -14.0	<0.05	<0.05	<0.05	<0.10	<0.25	<5.0	<10
MW-33	11.16.10	7.0 - 8.0	7.2	82	17	170	**276.2**	**3,300**	**160**
MW-34	11.16.10	16.0 - 17.0	<0.05	<0.05	<0.05	<0.10	<0.25	<5.0	<10
MW-35	11.17.10	9.0 - 10.0	11	130	32	300	**473**	**7,900**	**440**
MW-36	11.17.10	12.0 - 13.0	<0.05	<0.05	<0.05	<0.10	<0.25	<5.0	<10
MW-37	11.17.10	11.0 - 12.0	<0.05	14	9.5	89	**<112.55**	**2,000**	**290**
MW-38	11.17.10	9.0 - 10.0	<0.05	<0.05	<0.05	<0.10	<0.25	<5.0	<10
MW-39	11.17.10	15.0 - 16.0	<0.05	<0.05	<0.05	<0.10	<0.25	<5.0	<10
MW-40	11.17.10	16.0 - 17.0	<0.05	<0.05	<0.05	<0.10	<0.25	<5.0	<10
MW-41	11.17.10	13.0 - 14.0	<0.05	<0.05	<0.05	<0.10	<0.25	<5.0	<10
MW-42	11.17.10	19.0 - 20.0	<0.05	<0.05	<0.05	<0.10	<0.25	<5.0	<10
MW-43	11.17.10	15.0 - 16.0	<0.05	<0.05	<0.05	<0.10	<0.25	<5.0	<10
TSW-44	11.17.10	15.0 - 16.0	<0.05	<0.05	<0.05	<0.10	<0.25	<5.0	<10
TSW-45	11.17.10	14.0 - 15.0	<0.05	<0.05	<0.05	<0.10	<0.25	<5.0	<10
TSW-46	11.17.10	12.0 - 13.0	<0.05	<0.05	<0.05	<0.10	<0.25	<5.0	<10
MW-47	11.22.10	16.0 - 18.0	<0.05	<0.05	<0.05	<0.10	<0.25	<5.0	<10
MW-48	3.20.12	11.0 -12.0	0.056	<0.049	<0.049	0.40	0.456	<4.9	<9.9
MW-49	3.20.12	10.0 - 11.0	<0.050	<0.050	<0.050	<0.099	<0.249	<5.0	<9.8
MW-50	3.20.12	20.0 - 21.0	<0.050	<0.050	<0.050	<0.10	<0.25	<5.0	<10.0
MW-51	3.20.12	12.0 - 13.0	0.049	0.16	<0.047	0.13	0.339	<4.7	<10.0
MW-52	3.20.12	16.0 - 17.0	<0.048	<0.048	<0.048	<0.097	<0.241	<4.8	<10

Note: Concentrations in **bold** and yellow exceed the applicable OCD Remediation Action Level
NA = Not Analyzed
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NAPL = Non-aqueous phase liquid
* = piezometer well was replaced with associated monitoring well

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TABLE 2
Largo Compressor Station
GROUNDWATER ANALYTICAL SUMMARY

Sample I.D.	Date	Total Dissolved Solids (mg/L)	Benzene (µg/L)	Toluene (µg/L)	Ethylbenzene (µg/L)	Xylenes (µg/L)	TPH GRO (mg/L)	TPH DRO (mg/L)
New Mexico Water Quality Control Commission Groundwater Quality Standards		NE	10	750	750	620	NE	NE
Monitoring Wells Installed by Lodestar								
P-1	4.04.08	NA	5,700	2,200	310	5,500	53	<1.0
P-1	8.10.09	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
P-1	11.24.09	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
P-1	2.25.10	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-12 (P-1*)	4.05.10	NA	1,300	1,600	110	2,200	20	1.2
MW-12 (P-1*)	5.27.10	NA	3,300	1,800	180	3,200	NA	NA
MW-12 (P-1*)	7.13.10	NA	2,900	330	140	1,700	22	1.0
MW-12 (P-1*)	8.26.10	NA	1,200	420	70	1,300	13	<1.0
MW-12 (P-1*)	11.18.10	NA	1,100	69	61	720	6.3	<1.0
MW-12 (P-1*)	2.4.11	NA	5,900	<50	470	1,600	24	<1.0
MW-12 (P-1*)	4.19.11	NA	4,200	190	<100	330	14	<1.0
MW-12 (P-1*)	5.19.11	NA	1,000	520	36	660	13	15
MW-12 (P-1*)	7.28.11	NA	12,000	2,300	320	3,200	54	3.9
MW-12 (P-1*)	10.28.11	NA	4,900	59	130	3,300	29	7.3
MW-12 (P-1*)	1.31.12	NA	4,400	62	110	1,500	18	11
MW-12 (P-1*)	4.19.12	NA	4,300	53	150	930	22	5.8
P-2	4.04.08	NA	15,000	2,100	380	4,600	120	6.8
P-2	8.10.09	NA	9,800	110	170	1,400	NA	NA
P-2	11.24.09	NA	21,000	360	460	2,700	NA	NA
P-2	2.25.10	NA	19,000	380	380	2,800	NA	NA
MW-11 (P-2*)	4.05.10	NA	<1.0	<1.7	<1.0	3.3	0.22	<1.0
MW-11 (P-2*)	5.27.10	NA	4.4	<1.0	<1.0	<2.0	NA	NA
MW-11 (P-2*)	7.13.10	NA	700	4.5	11	56	3.6	1.2
MW-11 (P-2*)	8.26.10	NA	86	<1.0	1.3	4.9	0.4	<1.0
MW-11 (P-2*)	11.18.10	NA	<1.0	<1.0	<1.0	<2.0	0.14	<1.0
MW-11 (P-2*)	2.4.11	NA	21	<1.0	<1.0	<1.0	0.075	<1.0
MW-11 (P-2*)	4.19.11	NA	96	12	1.2	27	0.39	<1.0
MW-11 (P-2*)	7.28.11	NA	46	<1.0	38	76	11	1.7
MW-11 (P-2*)	10.28.11	NA	1,600	<10	31	37	4.6	2.2
MW-11 (P-2*)	1.31.12	NA	470	<10	12	<20	1.3	<1.0
MW-11 (P-2*)	4.19.12	NA	84	<1.0	3.2	<2.0	0.43	<1.0
P-3	4.04.08	NA	780	13	81	20	4.2	<1.0
P-3	8.10.09	NA	35	<1.0	3.8	<2.0	NA	NA
P-3	11.24.09	NA	1.4	<1.0	1.5	<2.0	NA	NA
P-3	2.25.10	NA	3.6	10	2	24	NA	NA
MW-3R (P-3*)	4.05.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-3R (P-3*)	5.27.10	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-3R (P-3*)	7.13.10	NA	13	<1.0	1.3	6.4	1.4	1
MW-3R (P-3*)	8.26.10	NA	5.0	<1.0	<1.0	2.3	0.46	<1.0
MW-3R (P-3*)	11.18.10	NA	3.9	<1.0	<1.0	<2.0	0.47	<1.0
MW-3R (P-3*)	2.1.11	NA	2.0	<1.0	<1.0	<2.0	0.16	<1.0
MW-3R (P-3*)	4.18.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-3R (P-3*)	7.28.11	NA	1.5	<1.0	<1.0	7.1	1.50	<1.0
MW-3R (P-3*)	10.27.11	NA	1.1	<1.0	<1.0	<2.0	0.57	<1.0
MW-3R (P-3*)	1.30.12	NA	<1.0	<1.0	<1.0	<2.0	0.16	<1.0
MW-3R (P-3*)	4.19.12	NA	<1.0	<1.0	<1.0	<2.0	0.16	<1.0
P-4	4.04.08	NA	<1.0	<1.0	<1.0	<2.0	0.42	<1.0
P-4	8.10.09	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
P-4	11.24.09	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
P-4	2.25.10	NA	2.5	7.5	<1.0	14	NA	NA
MW-14 (P-4*)	4.05.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-14 (P-4*)	5.27.10	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-14 (P-4*)	7.13.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-14 (P-4*)	8.26.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-14 (P-4*)	11.18.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-14 (P-4*)	2.1.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-14 (P-4*)	4.19.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-14 (P-4*)	7.28.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-14 (P-4*)	10.27.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-14 (P-4*)	1.30.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-14 (P-4*)	4.19.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0

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Sample I.D.	Date	Total Dissolved Solids (mg/L)	Benzene (µg/L)	Toluene (µg/L)	Ethylbenzene (µg/L)	Xylenes (µg/L)	TPH GRO (mg/L)	TPH DRO (mg/L)
New Mexico Water Quality Control Commmission Groundwater Quality Standards		NE	10	750	750	620	NE	NE
P-5	4.04.08	NA	<1.0	<1.0	<1.0	<2.0	0.1	<1.0
P-5	8.10.09	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
P-5	11.24.09	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
P-5	2.25.10	NA	1.8	6.1	<1.0	11	NA	NA
MW-13 (P-5*)	4.05.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-13 (P-5*)	5.27.10	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-13 (P-5*)	7.13.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-13 (P-5*)	8.26.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-13 (P-5*)	11.18.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-13 (P-5*)	2.3.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-13 (P-5*)	4.19.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-13 (P-5*)	7.28.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-13 (P-5*)	10.27.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-13 (P-5*)	1.30.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-13 (P-5*)	4.19.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-6	8.10.09	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-6	11.24.09	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-6	2.25.10	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-6	4.05.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-6	5.27.10	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-6	7.13.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-6	8.26.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-6	11.18.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-6	1.31.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-6	4.19.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-6	7.28.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-6	10.27.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-6	1.27.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-6	4.19.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-7	8.10.09	NA	**15,000**	<100	380	310	NA	NA
MW-7	11.24.09	NA	**13,000**	<100	150	<200	NA	NA
MW-7	2.25.10	NA	**3,000**	<10	40	31	NA	NA
MW-7	4.05.10	NA	**940**	<10	<10	<20	4.2	1.3
MW-7	5.27.10	NA	**700**	<10	11	<20	NA	NA
MW-7	7.13.10	NA	**15,000**	<10	130	25	51	4.6
MW-7	8.26.10	NA	**5,300**	<20	35	<40	18	1.7
MW-7	11.18.10	NA	**3,700**	<20	62	<40	11	1.2
MW-7	2.1.11	NA	**1,800**	<1.0	10	4.6	2.2	<1.0
MW-7	4.19.11	NA	**250**	<1.0	2.9	2.4	0.75	<1.0
MW-7	5.19.11	NA	**1,400**	<5.0	15.0	<10	4.0	<1.0
MW-7	7.28.11	NA	**75**	<5.0	200	62.0	45	2.7
MW-7	10.28.11	NA	**1,300**	<10	140	<20	32	6.1
MW-7	1.31.12	NA	**9,000**	<10	110	<20	21	4.5
MW-7	4.19.12	NA	**790**	<10	15	<20	2.7	<1.0
MW-8	8.10.09	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-8	11.24.09	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-8	2.25.10	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-8	4.05.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-8	5.27.10	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-8	7.13.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-8	8.26.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-8	11.18.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-8	1.31.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-8	4.18.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-8	7.28.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-8	10.27.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-8	1.27.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-8	4.19.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-9	8.10.09	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-9	11.24.09	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-9	2.25.10	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-9	4.05.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-9	5.27.10	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-9	7.13.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-9	8.26.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-9	11.18.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-9	1.31.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-9	4.19.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-9	7.29.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-9	10.27.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-9	1.27.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-9	4.19.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0

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TABLE 2
Largo Compressor Station
GROUNDWATER ANALYTICAL SUMMARY

Sample I.D.	Date	Total Dissolved Solids (mg/L)	Benzene (µg/L)	Toluene (µg/L)	Ethylbenzene (µg/L)	Xylenes (µg/L)	TPH GRO (mg/L)	TPH DRO (mg/L)
New Mexico Water Quality Control Commmission Groundwater Quality Standards		NE	10	750	750	620	NE	NE
MW-15	4.05.10	NA	1.1	<1.0	<1.0	<2.0	<0.05	<1.0
MW-15	5.27.10	NA	<1.0	<1.0	<1.0	<2.0	<0.05	<1.0
MW-15	7.13.10	NA	490	2.2	7.2	15	3.2	<1.0
MW-15	8.26.10	NA	20	<1.0	<1.0	<2.0	0.095	<1.0
MW-15	11.18.10	NA	8.9	<1.0	<1.0	<2.0	0.19	<1.0
MW-15	2.1.11	NA	16	<1.0	<1.0	<2.0	0.06	<1.0
MW-15	4.18.11	NA	13	<1.0	<1.0	<2.0	0.14	<1.0
MW-15	7.28.11	NA	1500	<1.0	19	20	6.7	<1.0
MW-15	10.28.11	NA	810	<10	<10	<20	2.2	1.0
MW-15	1.30.12	NA	150	<10	<10	<20	0.51	<1.0
MW-15	4.18.12	NA	23	<1.0	1.4	<2.0	0.21	<1.0
MW-16	4.05.10	NA	3.8	1.5	1.4	11	0.36	<1.0
MW-16	5.27.10	NA	<1.0	<1.0	<1.0	<2.0	NA	NA
MW-16	7.13.10	NA	47	<1.0	<1.0	<2.0	0.3	<1.0
MW-16	8.26.10	NA	16	<1.0	<1.0	<2.0	0.095	<1.0
MW-16	11.18.10	NA	3.4	<1.0	<1.0	<2.0	0.11	<1.0
MW-16	2.1.11	NA	61	<1.0	1.3	2.1	0.20	<1.0
MW-16	4.18.11	NA	34	<1.0	3.7	4.4	0.16	<1.0
MW-16	7.28.11	NA	43	<1.0	1.9	<2.0	0.29	<1.0
MW-16	10.27.11	NA	21	<1.0	<1.0	<2.0	0.19	<1.0
MW-16	1.30.12	NA	10	<1.0	<1.0	<2.0	0.096	<1.0
MW-16	4.18.12	NA	20	<1.0	1.0	<2.0	0.14	<1.0
TSW-31	11.23.10	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-32	1.28.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-32	4.19.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-32	7.29.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-32	10.26.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-32	1.27.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-32	4.18.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-33	1.28.11	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-33	4.20.11	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-33	7.28.11	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-33	10.26.11	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-33	1.27.12	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-33	4.18.12	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-34	1.28.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-34	4.19.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-34	7.29.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-34	10.26.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-34	1.27.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-34	4.18.12	NA	<1.0	>1.0	<1.0	<2.0	<0.050	<1.0
MW-35	1.28.11	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-35	4.20.11	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-35	7.28.11	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-35	10.26.11	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-35	1.27.12	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-35	4.18.12	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-36	1.31.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-36	4.20.11	NA	<1.0	2.1	<1.0	<2.0	<0.050	<1.0
MW-36	7.29.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-36	10.27.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-36	1.27.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-36	4.18.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-37	2.4.11	NA	3,100	6,200	700	7,000	38	3.9
MW-37	4.20.11	NA	2,500	3,600	500	5,100	34	4.2
MW-37	7.28.11	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-37	10.26.11	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-37	1.27.12	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-37	4.18.12	NA	NAPL	NAPL	NAPL	NAPL	NAPL	NAPL
MW-38	1.26.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-38	4.20.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-38	7.29.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-38	10.27.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-38	1.27.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-38	4.18.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-39	1.26.11	NA	1,200	730	37	570	11	<1.0
MW-39	4.19.11	NA	120	<1.0	1.6	5.9	0.33	<1.0
MW-39	7.29.11	NA	27	14	1.9	18	0.80	<1.0
MW-39	10.27.11	NA	260	<1.0	1.2	3.5	0.44	<1.0
MW-39	1.27.12	NA	580	48	4.3	79	1.8	<1.0
MW-39	4.18.12	NA	1,500	620	36	860	12	112

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TABLE 2
Largo Compressor Station
GROUNDWATER ANALYTICAL SUMMARY

Sample I.D.	Date	Total Dissolved Solids (mg/L)	Benzene (µg/L)	Toluene (µg/L)	Ethylbenzene (µg/L)	Xylenes (µg/L)	TPH GRO (mg/L)	TPH DRO (mg/L)
New Mexico Water Quality Control Commmission Groundwater Quality Standards		NE	10	750	750	620	NE	NE
MW-40	1.28.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-40	4.20.11	NA	<2.0	<2.0	<2.0	<4.0	<0.10	<1.0
MW-40	7.28.11	NA	Dry	Dry	Dry	Dry	Dry	Dry
MW-40	10.26.11	NA	Dry	Dry	Dry	Dry	Dry	Dry
MW-40	1.27.12	NA	Dry	Dry	Dry	Dry	Dry	Dry
MW-40R	4.18.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-41	1.31.11	NA	<5.0	<5.0	<5.0	<10	<0.25	<1.0
MW-41	4.18.11	NA	<5.0	<5.0	<5.0	<10	<0.25	<1.0
MW-41	7.29.11	NA	<5.0	<5.0	<5.0	<10	<0.050	<1.0
MW-41	10.27.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-41	1.27.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-41	4.18.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-42	2.4.11	NA	<5.0	<5.0	<5.0	<10	<0.25	NA
MW-42	3.3.11	75,400	NA	NA	NA	NA	NA	NA
MW-42	4.19.11	NA	<5.0	<5.0	<5.0	<10	<0.25	<1.0
MW-42	7.28.11	NA	Dry	Dry	Dry	Dry	Dry	Dry
MW-42	10.26.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-42	1.30.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-42	4.18.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-43	1.28.11	NA	<1.0	<1.0	<1.0	<2.0	0.06	<1.0
MW-43	4.19.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-43	7.29.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-43	10.26.11	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-43	1.27.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-43	4.18.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
TSW-44	11.18.10	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
TSW-45	11.18.10	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
TSW-46	11.23.10	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-47	1.28.11	NA	<5.0	<5.0	<5.0	<10	1.3	2.5
MW-47	4.18.11	NA	<5.0	<5.0	<5.0	<10	2.0	1.2
MW-47	7.28.11	NA	<5.0	<5.0	<5.0	27.0	6.6	1.1
MW-47	10.28.11	NA	<5.0	<5.0	<5.0	<10	1.4	2.7
MW-47	1.30.12	NA	<5.0	<5.0	<5.0	<10	2.6	2.5
MW-47	4.18.12	NA	11	<5.0	16	38	5.5	2.9
MW-48	4.18.12	NA	**290**	**3,200**	360	**5,000**	25	1.3
MW-49	4.18.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-50	4.18.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0
MW-51	4.18.12	NA	**1,200**	**3,600**	150	**1,400**	19	<1.0
MW-52	4.18.12	NA	<1.0	<1.0	<1.0	<2.0	<0.050	<1.0

Note: Concentrations in **bold** and yellow exceed the applicable OCD Remediation Action Level

NA = Not Analyzed

NE = Not Established

NAPL = Non-aqueous phase liquid

* = piezometer well was replaced with associated monitoring well

TABLE 3
Largo Compressor Station
Groundwater Elevations

Monitoring Well ID	Measurement Date	Top-of-Casing Elevation (feet)	Depth to PSH (feet)	Depth to Water (feet)	PSH Thickness (feet)	Corrected Groundwater Elevation
MW-3R	4.5.10	6117.47	None Observed	21.83	0.0	6095.64
	5.27.10		None Observed	21.82	0.0	6095.65
	6.25.10		None Observed	22.22	0.0	6095.25
	7.13.10		None Observed	22.47	0.0	6095.00
	8.26.10		None Observed	22.24	0.0	6095.23
	11.18.10		None Observed	22.32	0.0	6095.15
	1.25.11		None Observed	22.13	0.0	6095.34
	4.22.11		None Observed	21.99	0.0	6095.48
	7.27.11		None Observed	22.81	0.0	6094.66
	10.26.11		None Observed	22.91	0.0	6094.56
	1.26.12		None Observed	22.74	0.0	6094.73
	4.19.12		None Observed	22.61	0.0	6094.86
MW-6	8.10.09	6115.47	None Observed	20.28	0.0	6095.19
	11.24.09		None Observed	20.17	0.0	6095.30
	2.25.10		None Observed	19.54	0.0	6095.93
	4.5.10		None Observed	19.11	0.0	6096.36
	5.27.10		None Observed	19.28	0.0	6096.19
	6.25.10		None Observed	19.87	0.0	6095.60
	7.13.10		None Observed	20.09	0.0	6095.38
	8.26.10		None Observed	19.68	0.0	6095.79
	11.18.10		None Observed	19.72	0.0	6095.75
	1.25.11		None Observed	19.51	0.0	6095.96
	4.22.11		None Observed	19.42	0.0	6096.05
	7.27.11		None Observed	20.4	0.0	6095.07
	10.26.11		None Observed	20.43	0.0	6095.04
	1.26.12		None Observed	20.15	0.0	6095.32
	4.19.12			Not Gauged		Not Gauged
MW-7	8.10.09	6116.65	None Observed	21.52	0.0	6095.13
	11.24.09		None Observed	21.73	0.0	6094.92
	2.25.10		None Observed	21.42	0.0	6095.23
	4.5.10		None Observed	20.96	0.0	6095.69
	5.27.10		None Observed	20.96	0.0	6095.69
	6.25.10		None Observed	21.32	0.0	6095.33
	7.13.10		None Observed	21.46	0.0	6095.19
	8.26.10		None Observed	21.36	0.0	6095.29
	11.18.10		None Observed	21.42	0.0	6095.23
	1.25.11		None Observed	21.24	0.0	6095.41
	4.22.11		None Observed	21.22	0.0	6095.43
	7.27.11		None Observed	21.8	0.0	6094.85
	10.26.11		None Observed	21.94	0.0	6094.71
	1.26.12		None Observed	21.82	0.0	6094.83
	4.19.12		None Observed	21.70	0.0	6094.95
MW-8	8.10.09	6118.28	None Observed	23.17	0.0	6095.11
	11.24.09		None Observed	23.43	0.0	6094.85
	2.25.10		None Observed	23.25	0.0	6095.03
	4.5.10		None Observed	22.97	0.0	6095.31
	5.27.10		None Observed	22.85	0.0	6095.43
	6.25.10		None Observed	23.01	0.0	6095.27
	7.13.10		None Observed	23.21	0.0	6095.07
	8.26.10		None Observed	23.23	0.0	6095.05
	11.18.10		None Observed	23.3	0.0	6094.98
	1.25.11		None Observed	23.1	0.0	6095.18
	4.22.11		None Observed	22.94	0.0	6095.34
	7.27.11		None Observed	23.56	0.0	6094.72
	10.26.11		None Observed	23.75	0.0	6094.53
	1.26.12		None Observed	23.64	0.0	6094.64
	4.19.12		None Observed	23.54	0.0	6094.74

TABLE 3
Largo Compressor Station
Groundwater Elevations

Monitoring Well ID	Measurement Date	Top-of-Casing Elevation (feet)	Depth to PSH (feet)	Depth to Water (feet)	PSH Thickness (feet)	Corrected Groundwater Elevation
MW-9	8.10.09	6117.83	None Observed	21.95	0.0	6095.88
	11.24.09		None Observed	21.98	0.0	6095.85
	2.25.10		None Observed	21.51	0.0	6096.32
	4.5.10		None Observed	21	0.0	6096.83
	5.27.10		None Observed	21.1	0.0	6096.73
	6.25.10		None Observed	21.56	0.0	6096.27
	7.13.10		None Observed	21.77	0.0	6096.06
	8.26.10		None Observed	21.58	0.0	6096.25
	11.18.10		None Observed	21.61	0.0	6096.22
	1.25.11		None Observed	21.43	0.0	6096.40
	4.22.11		None Observed	21.30	0.0	6096.53
	7.27.11		None Observed	22.15	0.0	6095.68
	10.26.11		None Observed	22.25	0.0	6095.58
	1.26.12		None Observed	22.04	0.0	6095.79
	4.19.12		None Observed	21.88	0.0	6095.95
MW-11	4.5.10	6116.65	None Observed	20.57	0.0	6096.08
	5.27.10		None Observed	20.75	0.0	6095.90
	6.25.10		None Observed	21.33	0.0	6095.32
	7.13.10		None Observed	21.54	0.0	6095.11
	8.26.10		None Observed	21.17	0.0	6095.48
	11.18.10		None Observed	21.16	0.0	6095.49
	1.25.11		None Observed	21.02	0.0	6095.63
	4.22.11		None Observed	20.91	0.0	6095.74
	7.27.11		None Observed	21.89	0.0	6094.76
	10.26.11		None Observed	21.94	0.0	6094.71
	1.26.12		None Observed	21.64	0.0	6095.01
	4.19.12		None Observed	21.49	0.0	6095.16
MW-12	4.5.10	6111.24	None Observed	14.88	0.0	6096.36
	5.27.10		None Observed	15.11	0.0	6096.13
	6.25.10		None Observed	15.67	0.0	6095.57
	7.13.10		None Observed	15.91	0.0	6095.33
	8.26.10		None Observed	15.55	0.0	6095.69
	11.18.10		None Observed	16.58	0.0	6094.66
	1.25.11		None Observed	15.73	0.0	6095.51
	4.22.11		None Observed	15.3	0.0	6095.94
	7.27.11		None Observed	16.1	0.0	6095.14
	10.26.11		None Observed	16.21	0.0	6095.03
	1.26.12		None Observed	15.99	0.0	6095.25
	4.19.12		None Observed	15.83	0.0	6095.41
MW-13	4.5.10	6115.46	None Observed	19.26	0.0	6096.20
	5.27.10		None Observed	19.47	0.0	6095.99
	6.25.10		None Observed	20.07	0.0	6095.39
	7.13.10		None Observed	20.28	0.0	6095.18
	8.26.10		None Observed	19.86	0.0	6095.60
	11.18.10		None Observed	19.91	0.0	6095.55
	1.25.11		None Observed	19.71	0.0	6095.75
	4.22.11		None Observed	19.65	0.0	6095.81
	7.27.11		None Observed	20.59	0.0	6094.87
	10.26.11		None Observed	20.62	0.0	6094.84
	1.26.12		None Observed	20.34	0.0	6095.12
	4.19.12		None Observed	20.19	0.0	6095.27
MW-14	4.5.10	6115.99	None Observed	20.09	0.0	6095.90
	5.27.10		None Observed	20.28	0.0	6095.71
	6.25.10		None Observed	20.94	0.0	6095.05
	7.13.10		None Observed	21.19	0.0	6094.80
	8.26.10		None Observed	20.70	0.0	6095.29
	11.18.10		None Observed	20.73	0.0	6095.26
	1.25.11		None Observed	20.52	0.0	6095.47
	4.22.11		None Observed	20.45	0.0	6095.54
	7.27.11		None Observed	21.47	0.0	6094.52
	10.26.11		None Observed	21.48	0.0	6094.51
	1.26.12		None Observed	21.15	0.0	6094.84
	4.19.12		None Observed	21.00	0.0	6094.99

TABLE 3
Largo Compressor Station
Groundwater Elevations

Monitoring Well ID	Measurement Date	Top-of-Casing Elevation (feet)	Depth to PSH (feet)	Depth to Water (feet)	PSH Thickness (feet)	Corrected Groundwater Elevation
MW-15	4.5.10	6116.49	None Observed	20.66	0.0	6095.83
	5.27.10		None Observed	20.82	0.0	6095.67
	6.25.10		None Observed	21.43	0.0	6095.06
	7.13.10		None Observed	21.64	0.0	6094.85
	8.26.10		None Observed	21.25	0.0	6095.24
	11.18.10		None Observed	21.36	0.0	6095.13
	1.25.11		None Observed	21.07	0.0	6095.42
	4.22.11		None Observed	20.95	0.0	6095.54
	7.27.11		None Observed	21.95	0.0	6094.54
	10.26.11		None Observed	21.98	0.0	6094.51
	1.26.12		None Observed	21.70	0.0	6094.79
	4.19.12		None Observed	21.56	0.0	6094.93
MW-16	4.5.10	6117.57	None Observed	21.51	0.0	6096.06
	5.27.10		None Observed	51.59	0.0	6065.98
	6.25.10		None Observed	22.10	0.0	6095.47
	7.13.10		None Observed	22.29	0.0	6095.28
	8.26.10		None Observed	22.05	0.0	6095.52
	11.18.10		None Observed	22.11	0.0	6095.46
	1.25.11		None Observed	21.87	0.0	6095.70
	4.22.11		None Observed	21.76	0.0	6095.81
	7.27.11		None Observed	22.66	0.0	6094.91
	10.26.11		None Observed	22.71	0.0	6094.86
	1.26.12		None Observed	22.50	0.0	6095.07
	4.19.12		None Observed	22.38	0.0	6095.19
MW-32	1.25.11	6110.2	None Observed	12.67	0.0	6097.53
	4.22.11		None Observed	12.49	0.0	6097.71
	7.27.11		None Observed	13.47	0.0	6096.73
	10.26.11		None Observed	13.56	0.0	6096.64
	1.26.12		None Observed	13.23	0.0	6096.97
	4.18.12		None Observed	13.05	0.0	6097.15
MW-33	1.25.11*	6114	16.08	16.44	0.36	6097.88
	4.22.11		16.59	16.60	0.01	6097.41
	7.27.11		16.07	16.72	0.65	6097.85
	10.26.11		15.55	16.15	0.60	6098.38
	1.26.12		15.83	15.84	0.01	6098.17
	4.18.12		Not Gauged			Not Gauged
MW-34	1.25.11	6115.36	None Observed	17.38	0.0	6097.98
	4.22.11		None Observed	17.20	0.0	6098.16
	7.27.11		None Observed	18.23	0.0	6097.13
	10.26.11		None Observed	18.32	0.0	6097.04
	1.26.12		None Observed	17.98	0.0	6097.38
	4.18.12		None Observed	17.78	0.0	6097.58
MW-35	1.25.11*	6112.21	14.5	14.75	0.25	6097.68
	4.22.11		14.22	14.80	0.58	6097.92
	7.27.11		15.11	16.36	1.25	6096.95
	10.26.11		15.14	16.64	1.50	6096.89
	1.26.12		14.72	14.73	0.01	6097.49
	4.18.12		Not Gauged			Not Gauged
MW-36	1.25.11	6111.42	None Observed	13.80	0.0	6097.62
	4.22.11		None Observed	13.65	0.0	6097.77
	7.27.11		None Observed	14.69	0.0	6096.73
	10.26.11		None Observed	14.45	0.0	6096.97
	1.26.12		None Observed	14.41	0.0	6097.01
	4.18.12		None Observed	14.18	0.0	6097.24
MW-37	1.25.11	6110.79	None Observed	12.91	sheen	6097.88
	4.22.11		None Observed	12.78	0.0	6098.01
	7.27.11		13.81	13.84	0.03	6096.98
	10.26.11		13.88	13.92	0.04	6096.91
	1.26.12		13.54	13.54	0.01	6097.26
	4.18.12		Not Gauged			Not Gauged

TABLE 3
Largo Compressor Station
Groundwater Elevations

Monitoring Well ID	Measurement Date	Top-of-Casing Elevation (feet)	Depth to PSH (feet)	Depth to Water (feet)	PSH Thickness (feet)	Corrected Groundwater Elevation
MW-38	1.25.11	6110.48	None Observed	12.06	0.0	6098.42
	4.22.11		None Observed	11.87	0.0	6098.61
	7.27.11		None Observed	13.01	0.0	6097.47
	10.26.11		None Observed	13.10	0.0	6097.38
	1.26.12		None Observed	12.68	0.0	6097.80
	4.18.12		None Observed	12.11	0.0	6098.37
MW-39	1.25.11	6113.84	None Observed	16.21	0.0	6097.63
	4.22.11		None Observed	17.35	0.0	6096.49
	7.27.11		None Observed	16.43	0.0	6097.41
	10.26.11		None Observed	16.52	0.0	6097.32
	1.26.12		None Observed	16.57	0.0	6097.27
	4.18.12		None Observed	16.61	0.0	6097.23
MW-40	1.25.11	6115.69	None Observed	19.16	0.0	6096.53
	4.22.11		None Observed	dry	0.0	dry
	7.27.11		None Observed	dry	0.0	dry
	10.26.11		None Observed	dry	0.0	dry
	1.26.12		None Observed	dry	0.0	dry
MW-40R	4.18.12		None Observed	19.58	0.0	Not Yet Surveyed
MW-41	1.25.11	6112.1	None Observed	14.14	0.0	6097.96
	4.22.11		None Observed	14.18	0.0	6097.92
	7.27.11		None Observed	14.08	0.0	6098.02
	10.26.11		None Observed	14.97	0.0	6097.13
	1.26.12		None Observed	14.20	0.0	6097.90
	4.18.12		None Observed	14.27	0.0	6097.83
MW-42	1.25.11	6121.5	None Observed	24.88	0.0	6096.62
	4.22.11**		None Observed	Errant Gauge	0.0	Errant Gauge
	7.27.11		None Observed	dry	0.0	dry
	10.26.11		None Observed	25.16	0.0	6096.34
	1.26.12		None Observed	24.92	0.0	6096.58
	4.18.12		Not Gauged			Not Gauged
MW-43	1.25.11	6112.91	None Observed	15.41	0.0	6097.50
	4.22.11		None Observed	15.30	0.0	6097.61
	7.27.11		None Observed	16.27	0.0	6096.64
	10.26.11		None Observed	16.35	0.0	6096.56
	1.26.12		None Observed	16.05	0.0	6096.86
	4.18.12		None Observed	15.87	0.0	6097.04
MW-47	1.25.11	6114.42	None Observed	19.22	0.0	6095.20
	4.22.11		None Observed	19.02	0.0	6095.40
	7.27.11		None Observed	19.69	0.0	6094.73
	10.26.11		None Observed	19.86	0.0	6094.56
	1.26.12		None Observed	19.79	0.0	6094.63
	4.19.12		None Observed	19.67	0.0	6094.75
MW-48	4.18.12		None Observed	Not Gauged	0.0	Not Yet Surveyed
MW-49	4.18.12		None Observed	12.38	0.0	Not Yet Surveyed
MW-50	4.18.12		None Observed	24.64	0.0	Not Yet Surveyed
MW-51	4.18.12		None Observed	18.33	0.0	Not Yet Surveyed
MW-52	4.18.12		None Observed	21.11	0.0	Not Yet Surveyed

* - Regauged 1.31.11 to confirm product thickness

** - Aberrant gauging data

Southwest GEOSCIENCE

APPENDIX C

Soil Boring/Monitoring Well Logs

Client: Enterprise Field Services LLC
Project Name: Largo Compressor Station
Project Location: Off County Road 397
Project Manager: Kyle Summers

SOIL BORING / MONITORING WELL LOG

DRILLING & SAMPLING INFORMATION

Date Started: 3.20.12
Date Completed: 3.20.12
Drilling Company: Earthworx
Driller: Louis Trujillo
Geologist: B. Chris Mitchell
Boring Method: Geoprobe
Bore Hole Dia: 3.25"

Well Diam: 1"
Screen Size: 0.010"
Screen Length: 10'
Casing Length: 10'

Soil Boring / Monitoring Well Number: MW-48
Project #: 0410002
Drawn By: BCM
Approved By: BCM

BORING METHOD
HSA - HOLLOW STEM AUGERS
CFA - CONTINUOUS FLIGHT AUGERS
GP - GEOPROBE
AR - AIR ROTARY

SAMPLER TYPE
CB - FIVE FOOT CORE BARREL
SS - DRIVEN SPLIT SPOON
ST - PRESSED SHELBY TUBE

GROUNDWATER DEPTH
▽ AT COMPLETION
▼ AT WELL STABILIZATION

Monitor Well Detail	SOIL CLASSIFICATION SURFACE ELEVATION:	Stratum Depth	Depth Scale	Sample No.	Sample Interval	% Recovery	Groundwater Depth	FID/PID Readings (ppm)	BORING AND SAMPLING NOTES
	SANDY SILT, Tan, Dry, No Odor		5			100%		0 0 0 0 0 0 0 0 0 0	
	SILTY CLAY, Tan, Dry to Moist, No Odor		10			100%		0	
	SAND, Tan, Moist to Wet, No Odor			11 - 12		100%	▼	9 0 0 0	Wet @ 12.5'
	SILTY CLAY, Tan, Wet, No Odor		15					0	
	Bottom of Boring @ 20'		20						

Southwest GEOSCIENCE

Client: Enterprise Field Services LLC
Project Name: Largo Compressor Station
Off County Road 397
Project Manager: Kyle Summers

SOIL BORING / MONITORING WELL LOG

DRILLING & SAMPLING INFORMATION

Date Started: 3.20.12
Date Completed: 3.20.12
Drilling Company: Earthworx
Driller: Louis Trujillo
Geologist: B. Chris Mitchell
Boring Method: Geoprobe
Bore Hole Dia: 3.25"

Soil Boring / Monitoring Well Number: MW-49
Project #: 0410002
Drawn By: BCM
Approved By: BCM

Well Diam: 1"
Screen Size: 0.010"
Screen Length: 10'
Casing Length: 6'

BORING METHOD
HSA - HOLLOW STEM AUGERS
CFA - CONTINUOUS FLIGHT AUGERS
GP - GEOPROBE
AR - AIR ROTARY

SAMPLER TYPE
CB - FIVE FOOT CORE BARREL
SS - DRIVEN SPLIT SPOON
ST - PRESSED SHELBY TUBE

GROUNDWATER DEPTH
▽ AT COMPLETION
▼ AT WELL STABILIZATION

Monitor Well Detail	SOIL CLASSIFICATION	Stratum Depth	Depth Scale	Sample No.	Sample Interval	% Recovery	Groundwater Depth	FID/PID Readings (ppm)	BORING AND SAMPLING NOTES
	SURFACE ELEVATION:								
	SILTY CLAY, Tan, Dry, No Odor							0	
								0	
								0	
								0	
								0	
								0	
								0	
								0	
								0	
			5			100%		0	
								0	
	SAND, Tan, Moist to Wet, No Odor					100%		0	
			10	10-11			▼	0	
						100%		0	
								0	
								0	
								0	
			15					0	
	Bottom of Boring @ 16'								
			20						

Southwest GEOSCIENCE

Client: Enterprise Field Services LLC
Project Name: Largo Compressor Staion
Project Location: Off County Road 397
Project Manager: Kyle Summers

SOIL BORING / MONITORING WELL LOG

DRILLING & SAMPLING INFORMATION

Date Started: 3.20.12
Date Completed: 3.20.12
Drilling Company: Earthworx
Driller: Louis Trujillo
Geologist: B. Chris Mitchell
Boring Method: Geoprobe
Bore Hole Dia: 3.25"

Soil Boring / Monitoring Well Number: MW-50
Project #: 04110002
Drawn By: BCM
Approved By: BCM

Well Diam: 1"
Screen Size: 0.010"
Screen Length: 10'
Casing Length: 18'

BORING METHOD
HSA - HOLLOW STEM AUGERS
CFA - CONTINUOUS FLIGHT AUGERS
GP - GEOPROBE
AR - AIR ROTARY

SAMPLER TYPE
CB - FIVE FOOT CORE BARREL
SS - DRIVEN SPLIT SPOON
ST - PRESSED SHELBY TUBE

GROUNDWATER DEPTH
▽ AT COMPLETION
▼ AT WELL STABILIZATION

Monitor Well Detail	SOIL CLASSIFICATION	Stratum Depth	Depth Scale	Sample No.	Sample Interval	% Recovery	Groundwater Depth	FID/PID Readings (ppm)	BORING AND SAMPLING NOTES
	SURFACE ELEVATION:								
	SAND, Tan, Dry, No Odor		5			100%		0	Hydro-Vac 0' - 8'
			10			100%		0	
			15			100%		0	
	CLAYEY SAND, Tan, Moist to Wet, No Odor		20	20-21		100%	▼	0	
	SILTY CLAY, Tan, Moist, No Odor		25			100%			
	Bottom of Boring @ 28'		30						

Southwest GEOSCIENCE

Client: Enterprise Field Services LLC
Project Name: Largo Compressor Staion
Project Location: Off County Road 397
Project Manager: Kyle Summers

SOIL BORING / MONITORING WELL LOG

DRILLING & SAMPLING INFORMATION

Date Started: 3.20.12
Date Completed: 3.20.12
Drilling Company: Earthworx
Driller: Louis Trujillo
Geologist: B. Chris Mitchell
Boring Method: Geoprobe
Bore Hole Dia: 3.25"

Soil Boring / Monitoring Well Number: MW-51
Project #: 0410002
Drawn By: BCM
Approved By: BCM

Well Diam: 1"
Screen Size: 0.010"
Screen Length: 10'
Casing Length: 18'

BORING METHOD
HSA - HOLLOW STEM AUGERS
CFA - CONTINUOUS FLIGHT AUGERS
GP - GEOPROBE
AR - AIR ROTARY

SAMPLER TYPE
CB - FIVE FOOT CORE BARREL
SS - DRIVEN SPLIT SPOON
ST - PRESSED SHELBY TUBE

GROUNDWATER DEPTH
▽ AT COMPLETION
▼ AT WELL STABILIZATION

Monitor Well Detail	SOIL CLASSIFICATION	Stratum Depth	Depth Scale	Sample No.	Sample Interval	% Recovery	Groundwater Depth	FID/PID Readings (ppm)	BORING AND SAMPLING NOTES
	SURFACE ELEVATION:								
	SILTY SAND, Tan, Dry, No Odor		0			100%		0	
								0	
								0	
								0	Hydro-Vac 0' - 8'
								0	
			5					0	
						100%		0	
								0	
								0	
								39	
			10					32	
								42	
				12-13		100%		119	
								373	
								87	Some Staining 14' - 16'
			15					73	
								162	
	SILTY CLAY, Brown, Dry, No Odor					100%		27	
								23	
								18	
			20					19.2	
								0	
						100%		0	
								0	
								27	
	SAND, Tan, Moist to Wet, No Odor		25				▼	0	
								0	
						100%		0	
								0	
	Bottom of Boring @ 28'		30						

Southwest GEOSCIENCE

Client: Enterprise Field Services LLC
Project Name: Largo Compressor Staion
Project Location: Off County Road 397
Project Manager: Kyle Summers

SOIL BORING / MONITORING WELL LOG

DRILLING & SAMPLING INFORMATION

Date Started: 3.20.12
Date Completed: 3.20.12
Drilling Company: Earthworx
Driller: Louis Trujillo
Geologist: B. Chris Mitchell
Boring Method: Geoprobe
Bore Hole Dia: 3.25"

Soil Boring / Monitoring Well Number: MW-52
Project #: 0410002
Drawn By: BCM
Approved By: BCM

Well Diam: 1"
Screen Size: 0.010"
Screen Length: 10'
Casing Length: 14'

BORING METHOD
HSA - HOLLOW STEM AUGERS
CFA - CONTINUOUS FLIGHT AUGERS
GP - GEOPROBE
AR - AIR ROTARY

SAMPLER TYPE
CB - FIVE FOOT CORE BARREL
SS - DRIVEN SPLIT SPOON
ST - PRESSED SHELBY TUBE

GROUNDWATER DEPTH
▽ AT COMPLETION
▼ AT WELL STABILIZATION

Monitor well Detail	SOIL CLASSIFICATION SURFACE ELEVATION:	Stratum Depth	Depth Scale	Sample No.	Sample Interval	% Recovery	Groundwater Depth	FID/PID Readings (ppm)	BORING AND SAMPLING NOTES
	SILTY SAND, Tan, Dry To Wet, No Odor to Slight Petroleum Hydrocarbon Odor		5			100%		0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	Hydro-Vac 0' - 8'
			10			100%			
			15	16-17		100%	▼	0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	Some Staining @1 6' Wet @ 16.5'
	SILTY CLAY, Brown, Dry, No Odor		20			100%			
	Bottom of Boring @ 28'		25						

Southwest GEOSCIENCE

Southwest GEOSCIENCE

APPENDIX D

Laboratory Data Reports & Chain of Custody Documentation

HALL ENVIRONMENTAL ANALYSIS LABORATORY

Hall Environmental Analysis Laboratory
4901 Hawkins NE
Albuquerque, NM 87109
TEL: 505-345-3975 FAX: 505-345-4107
Website: www.hallenvironmental.com

March 28, 2012

Kyle Summers
Southwest Geoscience
606 S. Rio Grande Unit A
Aztec, NM 87410
TEL: (214) 350-5469
FAX (214) 350-2914

RE: Largo Compressor Sta. OrderNo.: 1203751

Dear Kyle Summers:

Hall Environmental Analysis Laboratory received 5 sample(s) on 3/21/2012 for the analyses presented in the following report.

These were analyzed according to EPA procedures or equivalent. To access our accredited tests please go to www.hallenvironmental.com or the state specific web sites. See the sample checklist and/or the Chain of Custody for information regarding the sample receipt temperature and preservation. Data qualifiers or a narrative will be provided if the sample analysis or analytical quality control parameters require a flag. All samples are reported as received unless otherwise indicated.

Please don't hesitate to contact HEAL for any additional information or clarifications.

Sincerely,

Andy Freeman
Laboratory Manager
4901 Hawkins NE
Albuquerque, NM 87109

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Project: Largo Compressor Sta.
Lab ID: 1203751-001 **Matrix:** SOIL

Client Sample ID: MW-48 (11-12)
Collection Date: 3/20/2012 9:40:00 AM
Received Date: 3/21/2012 9:59:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE ORGANICS						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	9.9		mg/Kg	1	3/23/2012 8:36:46 PM
Surr: DNOP	93.9	77.4-131		%REC	1	3/23/2012 8:36:46 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	4.9		mg/Kg	1	3/27/2012 1:26:12 AM
Surr: BFB	103	69.7-121		%REC	1	3/27/2012 1:26:12 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	0.056	0.049		mg/Kg	1	3/27/2012 1:26:12 AM
Toluene	ND	0.049		mg/Kg	1	3/27/2012 1:26:12 AM
Ethylbenzene	ND	0.049		mg/Kg	1	3/27/2012 1:26:12 AM
Xylenes, Total	0.40	0.098		mg/Kg	1	3/27/2012 1:26:12 AM
Surr: 4-Bromofluorobenzene	98.7	80-120		%REC	1	3/27/2012 1:26:12 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Project: Largo Compressor Sta.
Lab ID: 1203751-002 **Matrix:** SOIL

Client Sample ID: MW-49 (10-11)
Collection Date: 3/20/2012 10:15:00 AM
Received Date: 3/21/2012 9:59:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE ORGANICS						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	9.8		mg/Kg	1	3/23/2012 9:41:04 PM
Surr: DNOP	92.9	77.4-131		%REC	1	3/23/2012 9:41:04 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	5.0		mg/Kg	1	3/27/2012 2:52:37 AM
Surr: BFB	102	69.7-121		%REC	1	3/27/2012 2:52:37 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	0.050		mg/Kg	1	3/27/2012 2:52:37 AM
Toluene	ND	0.050		mg/Kg	1	3/27/2012 2:52:37 AM
Ethylbenzene	ND	0.050		mg/Kg	1	3/27/2012 2:52:37 AM
Xylenes, Total	ND	0.099		mg/Kg	1	3/27/2012 2:52:37 AM
Surr: 4-Bromofluorobenzene	97.2	80-120		%REC	1	3/27/2012 2:52:37 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Project: Largo Compressor Sta.
Lab ID: 1203751-003 **Matrix:** SOIL

Client Sample ID: MW-50 (20-21)
Collection Date: 3/20/2012 11:15:00 AM
Received Date: 3/21/2012 9:59:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE ORGANICS						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	10		mg/Kg	1	3/23/2012 10:02:22 PM
Surr: DNOP	92.5	77.4-131		%REC	1	3/23/2012 10:02:22 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	5.0		mg/Kg	1	3/27/2012 3:21:22 AM
Surr: BFB	97.6	69.7-121		%REC	1	3/27/2012 3:21:22 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	0.050		mg/Kg	1	3/27/2012 3:21:22 AM
Toluene	ND	0.050		mg/Kg	1	3/27/2012 3:21:22 AM
Ethylbenzene	ND	0.050		mg/Kg	1	3/27/2012 3:21:22 AM
Xylenes, Total	ND	0.10		mg/Kg	1	3/27/2012 3:21:22 AM
Surr: 4-Bromofluorobenzene	96.5	80-120		%REC	1	3/27/2012 3:21:22 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Project: Largo Compressor Sta.
Lab ID: 1203751-004 **Matrix:** SOIL

Client Sample ID: MW-51 (12-13)
Collection Date: 3/20/2012 12:30:00 PM
Received Date: 3/21/2012 9:59:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE ORGANICS						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	10		mg/Kg	1	3/23/2012 10:23:49 PM
Surr: DNOP	93.8	77.4-131		%REC	1	3/23/2012 10:23:49 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	4.7		mg/Kg	1	3/27/2012 3:50:11 AM
Surr: BFB	97.2	69.7-121		%REC	1	3/27/2012 3:50:11 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	0.049	0.047		mg/Kg	1	3/27/2012 3:50:11 AM
Toluene	0.16	0.047		mg/Kg	1	3/27/2012 3:50:11 AM
Ethylbenzene	ND	0.047		mg/Kg	1	3/27/2012 3:50:11 AM
Xylenes, Total	0.13	0.095		mg/Kg	1	3/27/2012 3:50:11 AM
Surr: 4-Bromofluorobenzene	96.5	80-120		%REC	1	3/27/2012 3:50:11 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Project: Largo Compressor Sta.
Lab ID: 1203751-005 **Matrix:** SOIL

Client Sample ID: MW-52 (16-17)
Collection Date: 3/20/2012 1:15:00 PM
Received Date: 3/21/2012 9:59:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE ORGANICS						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	10		mg/Kg	1	3/23/2012 10:45:06 PM
Surr: DNOP	94.1	77.4-131		%REC	1	3/23/2012 10:45:06 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	4.8		mg/Kg	1	3/27/2012 4:18:51 AM
Surr: BFB	96.4	69.7-121		%REC	1	3/27/2012 4:18:51 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	0.048		mg/Kg	1	3/27/2012 4:18:51 AM
Toluene	ND	0.048		mg/Kg	1	3/27/2012 4:18:51 AM
Ethylbenzene	ND	0.048		mg/Kg	1	3/27/2012 4:18:51 AM
Xylenes, Total	ND	0.097		mg/Kg	1	3/27/2012 4:18:51 AM
Surr: 4-Bromofluorobenzene	96.6	80-120		%REC	1	3/27/2012 4:18:51 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.
E	Value above quantitation range
J	Analyte detected below quantitation limits
R	RPD outside accepted recovery limits
S	Spike Recovery outside accepted recovery limits
B	Analyte detected in the associated Method Blank
H	Holding times for preparation or analysis exceeded
ND	Not Detected at the Reporting Limit
RL	Reporting Detection Limit

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1203751**

28-Mar-12

Client: Southwest Geoscience

Project: Largo Compressor Sta.

Sample ID **MB-1193**	SampType: **MBLK**	TestCode: **EPA Method 8015B: Diesel Range Organics**
Client ID: **PBS**	Batch ID: **1193**	RunNo: **1634**
Prep Date: **3/22/2012**	Analysis Date: **3/23/2012**	SeqNo: **46879** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	ND	10								
Surr: DNOP	9.2		10.00		91.6	77.4	131			

Sample ID **LCS-1193**	SampType: **LCS**	TestCode: **EPA Method 8015B: Diesel Range Organics**
Client ID: **LCSS**	Batch ID: **1193**	RunNo: **1634**
Prep Date: **3/22/2012**	Analysis Date: **3/23/2012**	SeqNo: **46880** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	46	10	50.00	0	91.2	62.7	139			
Surr: DNOP	4.4		5.000		87.5	77.4	131			

Sample ID **1203751-001AMS**	SampType: **MS**	TestCode: **EPA Method 8015B: Diesel Range Organics**
Client ID: **MW-48 (11-12)**	Batch ID: **1193**	RunNo: **1634**
Prep Date: **3/22/2012**	Analysis Date: **3/23/2012**	SeqNo: **46882** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	43	10	49.90	0	85.9	57.2	146			
Surr: DNOP	4.3		4.990		86.6	77.4	131			

Sample ID **1203751-001AMSD**	SampType: **MSD**	TestCode: **EPA Method 8015B: Diesel Range Organics**
Client ID: **MW-48 (11-12)**	Batch ID: **1193**	RunNo: **1634**
Prep Date: **3/22/2012**	Analysis Date: **3/23/2012**	SeqNo: **46883** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	44	9.7	48.69	0	89.8	57.2	146	1.93	26.7	
Surr: DNOP	4.1		4.869		85.0	77.4	131	0	0	

Qualifiers:

- */X Value exceeds Maximum Contaminant Level.
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- H Holding times for preparation or analysis exceeded
- J Analyte detected below quantitation limits
- ND Not Detected at the Reporting Limit
- R RPD outside accepted recovery limits
- RL Reporting Detection Limit

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1203751**

28-Mar-12

Client: Southwest Geoscience

Project: Largo Compressor Sta.

Sample ID **MB-1182**	SampType: **MBLK**	TestCode: **EPA Method 8015B: Gasoline Range**
Client ID: **PBS**	Batch ID: **1182**	RunNo: **1710**
Prep Date: **3/21/2012**	Analysis Date: **3/26/2012**	SeqNo: **48158** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	ND	5.0								
Surr: BFB	940		1,000		93.9	69.7	121			

Sample ID **LCS-1182**	SampType: **LCS**	TestCode: **EPA Method 8015B: Gasoline Range**
Client ID: **LCSS**	Batch ID: **1182**	RunNo: **1710**
Prep Date: **3/21/2012**	Analysis Date: **3/26/2012**	SeqNo: **48159** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	27	5.0	25.00	0	106	98.5	133			
Surr: BFB	990		1,000		98.9	69.7	121			

Sample ID **1203751-001AMS**	SampType: **MS**	TestCode: **EPA Method 8015B: Gasoline Range**
Client ID: **MW-48 (11-12)**	Batch ID: **1182**	RunNo: **1710**
Prep Date: **3/21/2012**	Analysis Date: **3/27/2012**	SeqNo: **48179** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	26	4.9	24.53	3.539	92.5	85.4	147			
Surr: BFB	1,100		981.4		112	69.7	121			

Sample ID **1203751-001AMSD**	SampType: **MSD**	TestCode: **EPA Method 8015B: Gasoline Range**
Client ID: **MW-48 (11-12)**	Batch ID: **1182**	RunNo: **1710**
Prep Date: **3/21/2012**	Analysis Date: **3/27/2012**	SeqNo: **48180** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	30	4.8	24.04	3.539	109	85.4	147	12.2	19.2	
Surr: BFB	1,200		961.5		128	69.7	121	0	0	S

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: 1203751

28-Mar-12

Client: Southwest Geoscience

Project: Largo Compressor Sta.

Sample ID **MB-1182**	SampType: **MBLK**	TestCode: **EPA Method 8021B: Volatiles**
Client ID: **PBS**	Batch ID: **1182**	RunNo: **1711**
Prep Date: **3/21/2012**	Analysis Date: **3/26/2012**	SeqNo: **48204** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	ND	0.050								
Toluene	ND	0.050								
Ethylbenzene	ND	0.050								
Xylenes, Total	ND	0.10								
Surr: 4-Bromofluorobenzene	0.94		1.000		93.5	80	120			

Sample ID **LCS-1182**	SampType: **LCS**	TestCode: **EPA Method 8021B: Volatiles**
Client ID: **LCSS**	Batch ID: **1182**	RunNo: **1711**
Prep Date: **3/21/2012**	Analysis Date: **3/26/2012**	SeqNo: **48206** Units: **mg/Kg**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	0.89	0.050	1.000	0	88.8	83.3	107			
Toluene	0.92	0.050	1.000	0	91.7	74.3	115			
Ethylbenzene	0.93	0.050	1.000	0	93.4	80.9	122			
Xylenes, Total	2.8	0.10	3.000	0	94.1	85.2	123			
Surr: 4-Bromofluorobenzene	0.95		1.000		95.4	80	120			

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit

HALL ENVIRONMENTAL ANALYSIS LABORATORY

Hall Environmental Analysis Laboratory
4901 Hawkins NE
Albuquerque, NM 87109
TEL: 505-345-3975 FAX: 505-345-4107
Website: www.hallenvironmental.com

Sample Log-In Check List

Client Name: Southwest Geoscience — Work Order Number: 1203751

Received by/date: AG 03/21/2012

Logged By: Lindsay Mangin 3/21/2012 9:59:00 AM

Completed By: Lindsay Mangin 3/21/2012 10:20:07 AM

Reviewed By: 03/21/12

Chain of Custody

1. Were seals intact?	Yes	No	Not Present ✔
2. Is Chain of Custody complete?	Yes ✔	No	Not Present
3. How was the sample delivered?	COURIER		

Log In

4. ~~Coolers are present? (see 19. for cooler specific information)~~	~~Yes ✔~~	~~No~~	~~NA~~
5. Was an attempt made to cool the samples?	Yes ✔	No	NA
6. Were all samples received at a temperature of >0° C to 6.0°C	Yes ✔	No	NA
7. Sample(s) in proper container(s)?	Yes ✔	No	
8. Sufficient sample volume for indicated test(s)?	Yes ✔	No	
9. Are samples (except VOA and ONG) properly preserved?	Yes ✔	No	
10. Was preservative added to bottles?	Yes	No ✔	NA
11. VOA vials have zero headspace?	Yes	No	No VOA Vials ✔
12. Were any sample containers received broken?	Yes	No ✔	
13. Does paperwork match bottle labels? (Note discrepancies on chain of custody)	Yes ✔	No	# of preserved bottles checked for pH:
14. Are matrices correctly identified on Chain of Custody?	Yes ✔	No	(<2 or >12 unless noted)
15. Is it clear what analyses were requested?	Yes ✔	No	Adjusted?
16. Were all holding times able to be met? (If no, notify customer for authorization.)	Yes ✔	No	Checked by:

Special Handling (if applicable)

17. Was client notified of all discrepancies with this order? Yes No NA ✔

Person Notified: Date:

By Whom: Via: eMail Phone Fax In Person

Regarding:

Client Instructions:

18. Additional remarks:

19. **Cooler Information**

Cooler No	Temp °C	Condition	Seal Intact	Seal No	Seal Date	Signed By
1	1.3	Good	Yes			

CHAIN OF CUSTODY RECORD

Southwest GEOSCIENCE
Environmental & Hydrogeologic Consultants

Office Location: AZTEC
Project Manager: K. SUMMERS

Laboratory: HALL (HEAL)
Address:
Contact:
Phone:
PO/SO #:

Lab use only
Due Date:
Temp. of coolers when received (C°): 1.3
1 | 2 | 3 | 4 | 5
Page 1 of 1

Sampler's Name: B. CHRIS MITCHELL
Sampler's Signature:

Proj. No.: 04100 02
Project Name: LARGO COMPRESSOR STA.
No/Type of Containers

ANALYSIS REQUESTED: TPH GRO/DRO (SW-846 8015B); BTEX (SW-846 8021B)

Matrix	Date	Time	Comp	Grab	Identifying Marks of Sample(s)	Start Depth	End Depth	VOA	A/G 1 Lt.	250 ml	P/O	Lab Sample ID (Lab Use Only)
S	3.20.12	940		✓	MW-48 (11-12)	11	12				1	1203751-001
S	3.20.12	1015		✓	MW-49 (10-11)	10	11				1	-002
S	3.20.12	1115		✓	MW-50 (20-21)	20	21				1	-003
S	3.20.12	1230		✓	MW-51 (12-13)	12	13				1	-004
S	3.20.12	1315		✓	MW-52 (16-17)	16	17				1	-005

No Tax Exempt (WITNESS)

Turn around time: ☒ Normal ☐ 25% Rush ☐ 50% Rush ☐ 100% Rush

Relinquished by (Signature)	Date:	Time:	Received by: (Signature)	Date:	Time:
	3/20/12	1615	Christa Walker	3/20/12	1615
Christa Walker	3/21/12	645			
Relinquished by (Signature)	Date:	Time:	Received by: (Signature)	Date:	Time:
Relinquished by (Signature)	Date:	Time:	Received by: (Signature)	Date:	Time:

NOTES:

Matrix: WW - Wastewater; W - Water; S - Soil; SD - Solid; L - Liquid; A - Air Bag; C - Charcoal tube; SL - sludge; O - Oil
Container: VOA - 40 ml vial; A/G - Amber / Or Glass 1 Liter; 250 ml - Glass wide mouth; P/O - Plastic or other

HALL ENVIRONMENTAL ANALYSIS LABORATORY

Hall Environmental Analysis Laboratory
4901 Hawkins NE
Albuquerque, NM 87109
TEL: 505-345-3975 FAX: 505-345-4107
Website: www.hallenvironmental.com

May 02, 2012

Kyle Summers
Southwest Geoscience
606 S. Rio Grande Unit A
Aztec, NM 87410
TEL: (903) 821-5603
FAX

RE: Largo CS OrderNo.: 1204865

Dear Kyle Summers:

Hall Environmental Analysis Laboratory received 26 sample(s) on 4/21/2012 for the analyses presented in the following report.

These were analyzed according to EPA procedures or equivalent. To access our accredited tests please go to www.hallenvironmental.com or the state specific web sites. See the sample checklist and/or the Chain of Custody for information regarding the sample receipt temperature and preservation. Data qualifiers or a narrative will be provided if the sample analysis or analytical quality control parameters require a flag. All samples are reported as received unless otherwise indicated.

Please don't hesitate to contact HEAL for any additional information or clarifications.

Sincerely,

Andy Freeman
Laboratory Manager
4901 Hawkins NE
Albuquerque, NM 87109

Analytical Report
Lab Order **1204865**
Date Reported: **5/2/2012**

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Project: Largo CS
Lab ID: 1204865-001 **Matrix:** AQUEOUS

Client Sample ID: MW-40
Collection Date: 4/18/2012 8:25:00 AM
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/23/2012 2:20:02 PM
Surr: DNOP	120	61.3-164		%REC	1	4/23/2012 2:20:02 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/25/2012 12:33:30 AM
Surr: BFB	92.0	69.3-120		%REC	1	4/25/2012 12:33:30 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/25/2012 12:33:30 AM
Toluene	ND	1.0		µg/L	1	4/25/2012 12:33:30 AM
Ethylbenzene	ND	1.0		µg/L	1	4/25/2012 12:33:30 AM
Xylenes, Total	ND	2.0		µg/L	1	4/25/2012 12:33:30 AM
Surr: 4-Bromofluorobenzene	94.7	55-140		%REC	1	4/25/2012 12:33:30 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-50
Project: Largo CS
Collection Date: 4/18/2012 9:15:00 AM
Lab ID: 1204865-002 **Matrix:** AQUEOUS **Received Date:** 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/23/2012 2:41:45 PM
Surr: DNOP	114	61.3-164		%REC	1	4/23/2012 2:41:45 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/25/2012 1:04:15 AM
Surr: BFB	94.0	69.3-120		%REC	1	4/25/2012 1:04:15 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/25/2012 1:04:15 AM
Toluene	ND	1.0		µg/L	1	4/25/2012 1:04:15 AM
Ethylbenzene	ND	1.0		µg/L	1	4/25/2012 1:04:15 AM
Xylenes, Total	ND	2.0		µg/L	1	4/25/2012 1:04:15 AM
Surr: 4-Bromofluorobenzene	98.2	55-140		%REC	1	4/25/2012 1:04:15 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-42
Project: Largo CS
Collection Date: 4/18/2012 9:40:00 AM
Lab ID: 1204865-003
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/23/2012 3:03:25 PM
Surr: DNOP	107	61.3-164		%REC	1	4/23/2012 3:03:25 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/25/2012 1:34:49 AM
Surr: BFB	82.5	69.3-120		%REC	1	4/25/2012 1:34:49 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/25/2012 1:34:49 AM
Toluene	ND	1.0		µg/L	1	4/25/2012 1:34:49 AM
Ethylbenzene	ND	1.0		µg/L	1	4/25/2012 1:34:49 AM
Xylenes, Total	ND	2.0		µg/L	1	4/25/2012 1:34:49 AM
Surr: 4-Bromofluorobenzene	85.8	55-140		%REC	1	4/25/2012 1:34:49 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-51
Project: Largo CS
Collection Date: 4/18/2012 10:30:00 AM
Lab ID: 1204865-004
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/23/2012 3:46:48 PM
Surr: DNOP	109	61.3-164		%REC	1	4/23/2012 3:46:48 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	19	1.0		mg/L	20	4/25/2012 4:54:31 PM
Surr: BFB	109	69.3-120		%REC	20	4/25/2012 4:54:31 PM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	1,200	20		µg/L	20	4/25/2012 4:54:31 PM
Toluene	3,600	100		µg/L	100	4/26/2012 5:47:12 PM
Ethylbenzene	150	20		µg/L	20	4/25/2012 4:54:31 PM
Xylenes, Total	1,400	40		µg/L	20	4/25/2012 4:54:31 PM
Surr: 4-Bromofluorobenzene	140	55-140	S	%REC	1	4/25/2012 2:05:34 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-41
Project: Largo CS
Collection Date: 4/18/2012 11:15:00 AM
Lab ID: 1204865-005
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/23/2012 4:08:32 PM
Surr: DNOP	113	61.3-164		%REC	1	4/23/2012 4:08:32 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/25/2012 5:25:22 PM
Surr: BFB	79.7	69.3-120		%REC	1	4/25/2012 5:25:22 PM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/25/2012 5:25:22 PM
Toluene	ND	1.0		µg/L	1	4/25/2012 5:25:22 PM
Ethylbenzene	ND	1.0		µg/L	1	4/25/2012 5:25:22 PM
Xylenes, Total	ND	2.0		µg/L	1	4/25/2012 5:25:22 PM
Surr: 4-Bromofluorobenzene	83.9	55-140		%REC	1	4/25/2012 5:25:22 PM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-43
Project: Largo CS
Collection Date: 4/18/2012 11:55:00 AM
Lab ID: 1204865-006
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/23/2012 4:30:12 PM
Surr: DNOP	114	61.3-164		%REC	1	4/23/2012 4:30:12 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/25/2012 5:56:09 PM
Surr: BFB	96.1	69.3-120		%REC	1	4/25/2012 5:56:09 PM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/25/2012 5:56:09 PM
Toluene	ND	1.0		µg/L	1	4/25/2012 5:56:09 PM
Ethylbenzene	ND	1.0		µg/L	1	4/25/2012 5:56:09 PM
Xylenes, Total	ND	2.0		µg/L	1	4/25/2012 5:56:09 PM
Surr: 4-Bromofluorobenzene	100	55-140		%REC	1	4/25/2012 5:56:09 PM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-32
Project: Largo CS
Collection Date: 4/18/2012 12:35:00 PM
Lab ID: 1204865-007
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/23/2012 4:52:00 PM
Surr: DNOP	115	61.3-164		%REC	1	4/23/2012 4:52:00 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/25/2012 3:37:34 AM
Surr: BFB	96.8	69.3-120		%REC	1	4/25/2012 3:37:34 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/25/2012 3:37:34 AM
Toluene	ND	1.0		µg/L	1	4/25/2012 3:37:34 AM
Ethylbenzene	ND	1.0		µg/L	1	4/25/2012 3:37:34 AM
Xylenes, Total	ND	2.0		µg/L	1	4/25/2012 3:37:34 AM
Surr: 4-Bromofluorobenzene	97.2	55-140		%REC	1	4/25/2012 3:37:34 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Project: Largo CS
Lab ID: 1204865-008 **Matrix:** AQUEOUS

Client Sample ID: MW-34
Collection Date: 4/18/2012 1:15:00 PM
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/23/2012 5:13:47 PM
Surr: DNOP	113	61.3-164		%REC	1	4/23/2012 5:13:47 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/25/2012 4:08:12 AM
Surr: BFB	97.5	69.3-120		%REC	1	4/25/2012 4:08:12 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/25/2012 4:08:12 AM
Toluene	ND	1.0		µg/L	1	4/25/2012 4:08:12 AM
Ethylbenzene	ND	1.0		µg/L	1	4/25/2012 4:08:12 AM
Xylenes, Total	ND	2.0		µg/L	1	4/25/2012 4:08:12 AM
Surr: 4-Bromofluorobenzene	97.6	55-140		%REC	1	4/25/2012 4:08:12 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-52
Project: Largo CS
Collection Date: 4/18/2012 1:55:00 PM
Lab ID: 1204865-009
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/23/2012 5:35:42 PM
Surr: DNOP	110	61.3-164		%REC	1	4/23/2012 5:35:42 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/25/2012 4:38:39 AM
Surr: BFB	89.0	69.3-120		%REC	1	4/25/2012 4:38:39 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/25/2012 4:38:39 AM
Toluene	ND	1.0		µg/L	1	4/25/2012 4:38:39 AM
Ethylbenzene	ND	1.0		µg/L	1	4/25/2012 4:38:39 AM
Xylenes, Total	ND	2.0		µg/L	1	4/25/2012 4:38:39 AM
Surr: 4-Bromofluorobenzene	88.7	55-140		%REC	1	4/25/2012 4:38:39 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-39
Project: Largo CS
Collection Date: 4/18/2012 2:30:00 PM
Lab ID: 1204865-010
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/23/2012 5:57:26 PM
Surr: DNOP	112	61.3-164		%REC	1	4/23/2012 5:57:26 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	12	1.0		mg/L	20	4/25/2012 6:26:52 PM
Surr: BFB	94.9	69.3-120		%REC	20	4/25/2012 6:26:52 PM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	1,500	20		µg/L	20	4/25/2012 6:26:52 PM
Toluene	620	20		µg/L	20	4/25/2012 6:26:52 PM
Ethylbenzene	36	1.0		µg/L	1	4/25/2012 5:09:31 AM
Xylenes, Total	860	40		µg/L	20	4/25/2012 6:26:52 PM
Surr: 4-Bromofluorobenzene	110	55-140		%REC	1	4/25/2012 5:09:31 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Project: Largo CS
Lab ID: 1204865-011
Matrix: AQUEOUS
Client Sample ID: MW-38
Collection Date: 4/18/2012 3:55:00 PM
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/24/2012 8:48:51 AM
Surr: DNOP	116	61.3-164		%REC	1	4/24/2012 8:48:51 AM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/25/2012 6:57:37 PM
Surr: BFB	93.5	69.3-120		%REC	1	4/25/2012 6:57:37 PM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/25/2012 6:57:37 PM
Toluene	ND	1.0		µg/L	1	4/25/2012 6:57:37 PM
Ethylbenzene	ND	1.0		µg/L	1	4/25/2012 6:57:37 PM
Xylenes, Total	ND	2.0		µg/L	1	4/25/2012 6:57:37 PM
Surr: 4-Bromofluorobenzene	98.6	55-140		%REC	1	4/25/2012 6:57:37 PM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-36
Project: Largo CS
Collection Date: 4/18/2012 4:35:00 PM
Lab ID: 1204865-012
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/24/2012 5:57:24 AM
Surr: DNOP	109	61.3-164		%REC	1	4/24/2012 5:57:24 AM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/25/2012 7:28:18 PM
Surr: BFB	96.5	69.3-120		%REC	1	4/25/2012 7:28:18 PM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/25/2012 7:28:18 PM
Toluene	ND	1.0		µg/L	1	4/25/2012 7:28:18 PM
Ethylbenzene	ND	1.0		µg/L	1	4/25/2012 7:28:18 PM
Xylenes, Total	ND	2.0		µg/L	1	4/25/2012 7:28:18 PM
Surr: 4-Bromofluorobenzene	101	55-140		%REC	1	4/25/2012 7:28:18 PM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-49
Project: Largo CS
Collection Date: 4/18/2012 5:10:00 PM
Lab ID: 1204865-013
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/24/2012 6:18:52 AM
Surr: DNOP	109	61.3-164		%REC	1	4/24/2012 6:18:52 AM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/26/2012 12:34:45 AM
Surr: BFB	96.1	69.3-120		%REC	1	4/26/2012 12:34:45 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/26/2012 12:34:45 AM
Toluene	ND	1.0		µg/L	1	4/26/2012 12:34:45 AM
Ethylbenzene	ND	1.0		µg/L	1	4/26/2012 12:34:45 AM
Xylenes, Total	ND	2.0		µg/L	1	4/26/2012 12:34:45 AM
Surr: 4-Bromofluorobenzene	101	55-140		%REC	1	4/26/2012 12:34:45 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-48
Project: Largo CS
Collection Date: 4/18/2012 5:25:00 PM
Lab ID: 1204865-014
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	1.3	1.0		mg/L	1	4/24/2012 9:10:25 AM
Surr: DNOP	115	61.3-164		%REC	1	4/24/2012 9:10:25 AM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	25	5.0		mg/L	100	4/26/2012 1:05:25 AM
Surr: BFB	107	69.3-120		%REC	100	4/26/2012 1:05:25 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	290	100		µg/L	100	4/26/2012 1:05:25 AM
Toluene	3,200	100		µg/L	100	4/26/2012 1:05:25 AM
Ethylbenzene	360	100		µg/L	100	4/26/2012 1:05:25 AM
Xylenes, Total	5,000	200		µg/L	100	4/26/2012 1:05:25 AM
Surr: 4-Bromofluorobenzene	122	55-140		%REC	100	4/26/2012 1:05:25 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Project: Largo CS
Lab ID: 1204865-015
Matrix: AQUEOUS
Client Sample ID: MW-9
Collection Date: 4/19/2012 8:35:00 AM
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/24/2012 9:31:52 AM
Surr: DNOP	112	61.3-164		%REC	1	4/24/2012 9:31:52 AM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/26/2012 1:36:14 AM
Surr: BFB	90.9	69.3-120		%REC	1	4/26/2012 1:36:14 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/26/2012 1:36:14 AM
Toluene	ND	1.0		µg/L	1	4/26/2012 1:36:14 AM
Ethylbenzene	ND	1.0		µg/L	1	4/26/2012 1:36:14 AM
Xylenes, Total	ND	2.0		µg/L	1	4/26/2012 1:36:14 AM
Surr: 4-Bromofluorobenzene	97.5	55-140		%REC	1	4/26/2012 1:36:14 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-3R
Project: Largo CS
Collection Date: 4/19/2012 9:15:00 AM
Lab ID: 1204865-016
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/24/2012 10:47:57 AM
Surr: DNOP	112	61.3-164		%REC	1	4/24/2012 10:47:57 AM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	0.16	0.050		mg/L	1	4/26/2012 2:06:56 AM
Surr: BFB	126	69.3-120	S	%REC	1	4/26/2012 2:06:56 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/26/2012 2:06:56 AM
Toluene	ND	1.0		µg/L	1	4/26/2012 2:06:56 AM
Ethylbenzene	ND	1.0		µg/L	1	4/26/2012 2:06:56 AM
Xylenes, Total	ND	2.0		µg/L	1	4/26/2012 2:06:56 AM
Surr: 4-Bromofluorobenzene	116	55-140		%REC	1	4/26/2012 2:06:56 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-8
Project: Largo CS
Collection Date: 4/19/2012 9:55:00 AM
Lab ID: 1204865-017
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/24/2012 6:14:15 PM
Surr: DNOP	95.2	61.3-164		%REC	1	4/24/2012 6:14:15 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/26/2012 2:37:30 AM
Surr: BFB	99.9	69.3-120		%REC	1	4/26/2012 2:37:30 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/26/2012 2:37:30 AM
Toluene	ND	1.0		µg/L	1	4/26/2012 2:37:30 AM
Ethylbenzene	ND	1.0		µg/L	1	4/26/2012 2:37:30 AM
Xylenes, Total	ND	2.0		µg/L	1	4/26/2012 2:37:30 AM
Surr: 4-Bromofluorobenzene	107	55-140		%REC	1	4/26/2012 2:37:30 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-47
Project: Largo CS
Collection Date: 4/19/2012 10:30:00 AM
Lab ID: 1204865-018
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	2.9	1.0		mg/L	1	4/24/2012 6:40:08 PM
Surr: DNOP	98.8	61.3-164		%REC	1	4/24/2012 6:40:08 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	5.5	0.25		mg/L	5	4/26/2012 3:08:15 AM
Surr: BFB	365	69.3-120	S	%REC	5	4/26/2012 3:08:15 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	11	5.0		µg/L	5	4/26/2012 3:08:15 AM
Toluene	ND	5.0		µg/L	5	4/26/2012 3:08:15 AM
Ethylbenzene	16	5.0		µg/L	5	4/26/2012 3:08:15 AM
Xylenes, Total	38	10		µg/L	5	4/26/2012 3:08:15 AM
Surr: 4-Bromofluorobenzene	179	55-140	S	%REC	5	4/26/2012 3:08:15 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-14
Project: Largo CS
Collection Date: 4/19/2012 11:10:00 AM
Lab ID: 1204865-019
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/24/2012 7:06:02 PM
Surr: DNOP	97.9	61.3-164		%REC	1	4/24/2012 7:06:02 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/26/2012 3:39:03 AM
Surr: BFB	93.4	69.3-120		%REC	1	4/26/2012 3:39:03 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/26/2012 3:39:03 AM
Toluene	ND	1.0		µg/L	1	4/26/2012 3:39:03 AM
Ethylbenzene	ND	1.0		µg/L	1	4/26/2012 3:39:03 AM
Xylenes, Total	ND	2.0		µg/L	1	4/26/2012 3:39:03 AM
Surr: 4-Bromofluorobenzene	98.6	55-140		%REC	1	4/26/2012 3:39:03 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-13
Project: Largo CS
Collection Date: 4/19/2012 11:45:00 AM
Lab ID: 1204865-020
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/24/2012 8:49:03 PM
Surr: DNOP	103	61.3-164		%REC	1	4/24/2012 8:49:03 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/26/2012 4:09:58 AM
Surr: BFB	88.4	69.3-120		%REC	1	4/26/2012 4:09:58 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/26/2012 4:09:58 AM
Toluene	ND	1.0		µg/L	1	4/26/2012 4:09:58 AM
Ethylbenzene	ND	1.0		µg/L	1	4/26/2012 4:09:58 AM
Xylenes, Total	ND	2.0		µg/L	1	4/26/2012 4:09:58 AM
Surr: 4-Bromofluorobenzene	91.1	55-140		%REC	1	4/26/2012 4:09:58 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-6
Project: Largo CS
Collection Date: 4/19/2012 12:20:00 PM
Lab ID: 1204865-021
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/24/2012 9:14:26 PM
Surr: DNOP	101	61.3-164		%REC	1	4/24/2012 9:14:26 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	ND	0.050		mg/L	1	4/26/2012 6:17:50 PM
Surr: BFB	96.5	69.3-120		%REC	1	4/26/2012 6:17:50 PM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	ND	1.0		µg/L	1	4/26/2012 6:17:50 PM
Toluene	ND	1.0		µg/L	1	4/26/2012 6:17:50 PM
Ethylbenzene	ND	1.0		µg/L	1	4/26/2012 6:17:50 PM
Xylenes, Total	ND	2.0		µg/L	1	4/26/2012 6:17:50 PM
Surr: 4-Bromofluorobenzene	102	55-140		%REC	1	4/26/2012 6:17:50 PM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-16
Project: Largo CS
Collection Date: 4/19/2012 1:00:00 PM
Lab ID: 1204865-022
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/24/2012 9:40:06 PM
Surr: DNOP	101	61.3-164		%REC	1	4/24/2012 9:40:06 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	0.14	0.050		mg/L	1	4/26/2012 6:48:37 PM
Surr: BFB	118	69.3-120		%REC	1	4/26/2012 6:48:37 PM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	20	1.0		µg/L	1	4/26/2012 6:48:37 PM
Toluene	ND	1.0		µg/L	1	4/26/2012 6:48:37 PM
Ethylbenzene	1.0	1.0		µg/L	1	4/26/2012 6:48:37 PM
Xylenes, Total	ND	2.0		µg/L	1	4/26/2012 6:48:37 PM
Surr: 4-Bromofluorobenzene	117	55-140		%REC	1	4/26/2012 6:48:37 PM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-15
Project: Largo CS
Collection Date: 4/19/2012 1:40:00 PM
Lab ID: 1204865-023
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/24/2012 10:31:08 PM
Surr: DNOP	102	61.3-164		%REC	1	4/24/2012 10:31:08 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	0.21	0.050		mg/L	1	4/30/2012 4:07:16 PM
Surr: BFB	111	69.3-120		%REC	1	4/30/2012 4:07:16 PM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	23	1.0		µg/L	1	4/30/2012 4:07:16 PM
Toluene	ND	1.0		µg/L	1	4/30/2012 4:07:16 PM
Ethylbenzene	1.4	1.0		µg/L	1	4/30/2012 4:07:16 PM
Xylenes, Total	ND	2.0		µg/L	1	4/30/2012 4:07:16 PM
Surr: 4-Bromofluorobenzene	115	55-140		%REC	1	4/30/2012 4:07:16 PM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-7
Project: Largo CS
Collection Date: 4/19/2012 2:20:00 PM
Lab ID: 1204865-024
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/24/2012 10:56:30 PM
Surr: DNOP	106	61.3-164		%REC	1	4/24/2012 10:56:30 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	2.7	0.50		mg/L	10	4/27/2012 12:57:19 AM
Surr: BFB	104	69.3-120		%REC	10	4/27/2012 12:57:19 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	790	10		µg/L	10	4/27/2012 12:57:19 AM
Toluene	ND	10		µg/L	10	4/27/2012 12:57:19 AM
Ethylbenzene	15	10		µg/L	10	4/27/2012 12:57:19 AM
Xylenes, Total	ND	20		µg/L	10	4/27/2012 12:57:19 AM
Surr: 4-Bromofluorobenzene	113	55-140		%REC	10	4/27/2012 12:57:19 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Client Sample ID: MW-12
Project: Largo CS
Collection Date: 4/19/2012 3:15:00 PM
Lab ID: 1204865-025
Matrix: AQUEOUS
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	5.8	1.0		mg/L	1	4/24/2012 11:21:54 PM
Surr: DNOP	114	61.3-164		%REC	1	4/24/2012 11:21:54 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	22	2.5		mg/L	50	4/27/2012 1:58:49 AM
Surr: BFB	85.3	69.3-120		%REC	50	4/27/2012 1:58:49 AM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	4,300	50		µg/L	50	4/27/2012 1:58:49 AM
Toluene	53	50		µg/L	50	4/27/2012 1:58:49 AM
Ethylbenzene	150	50		µg/L	50	4/27/2012 1:58:49 AM
Xylenes, Total	930	100		µg/L	50	4/27/2012 1:58:49 AM
Surr: 4-Bromofluorobenzene	93.0	55-140		%REC	50	4/27/2012 1:58:49 AM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit
S	Spike Recovery outside accepted recovery limits		

Hall Environmental Analysis Laboratory, Inc.

CLIENT: Southwest Geoscience
Project: Largo CS
Lab ID: 1204865-026
Matrix: AQUEOUS
Client Sample ID: MW-11
Collection Date: 4/19/2012 3:55:00 PM
Received Date: 4/21/2012 11:00:00 AM

Analyses	Result	RL	Qual	Units	DF	Date Analyzed
EPA METHOD 8015B: DIESEL RANGE						Analyst: **JMP**
Diesel Range Organics (DRO)	ND	1.0		mg/L	1	4/24/2012 11:47:17 PM
Surr: DNOP	112	61.3-164		%REC	1	4/24/2012 11:47:17 PM
EPA METHOD 8015B: GASOLINE RANGE						Analyst: **NSB**
Gasoline Range Organics (GRO)	0.43	0.050		mg/L	1	4/30/2012 4:37:59 PM
Surr: BFB	121	69.3-120	S	%REC	1	4/30/2012 4:37:59 PM
EPA METHOD 8021B: VOLATILES						Analyst: **NSB**
Benzene	84	1.0		µg/L	1	4/30/2012 4:37:59 PM
Toluene	ND	1.0		µg/L	1	4/30/2012 4:37:59 PM
Ethylbenzene	3.2	1.0		µg/L	1	4/30/2012 4:37:59 PM
Xylenes, Total	ND	2.0		µg/L	1	4/30/2012 4:37:59 PM
Surr: 4-Bromofluorobenzene	123	55-140		%REC	1	4/30/2012 4:37:59 PM

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.
E	Value above quantitation range
J	Analyte detected below quantitation limits
R	RPD outside accepted recovery limits
S	Spike Recovery outside accepted recovery limits
B	Analyte detected in the associated Method Blank
H	Holding times for preparation or analysis exceeded
ND	Not Detected at the Reporting Limit
RL	Reporting Detection Limit

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1204865**

02-May-12

Client: Southwest Geoscience

Project: Largo CS

Sample ID **MB-1652**	SampType: **MBLK**	TestCode: **EPA Method 8015B: Diesel Range**
Client ID: **PBW**	Batch ID: **1652**	RunNo: **2293**
Prep Date: **4/23/2012**	Analysis Date: **4/23/2012**	SeqNo: **64078** Units: **mg/L**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	ND	1.0								
Surr: DNOP	1.1		1.000		109	61.3	164			

Sample ID **LCS-1652**	SampType: **LCS**	TestCode: **EPA Method 8015B: Diesel Range**
Client ID: **LCSW**	Batch ID: **1652**	RunNo: **2293**
Prep Date: **4/23/2012**	Analysis Date: **4/23/2012**	SeqNo: **64079** Units: **mg/L**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	4.4	1.0	5.000	0	87.8	74	157			
Surr: DNOP	0.49		0.5000		98.2	61.3	164			

Sample ID **LCSD-1652**	SampType: **LCSD**	TestCode: **EPA Method 8015B: Diesel Range**
Client ID: **LCSS02**	Batch ID: **1652**	RunNo: **2293**
Prep Date: **4/23/2012**	Analysis Date: **4/23/2012**	SeqNo: **64080** Units: **mg/L**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	4.5	1.0	5.000	0	90.7	74	157	3.25	23	
Surr: DNOP	0.49		0.5000		97.8	61.3	164	0	0	

Sample ID **MB-1653**	SampType: **MBLK**	TestCode: **EPA Method 8015B: Diesel Range**
Client ID: **PBW**	Batch ID: **1653**	RunNo: **2346**
Prep Date: **4/23/2012**	Analysis Date: **4/24/2012**	SeqNo: **65243** Units: **mg/L**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	ND	1.0								
Surr: DNOP	1.0		1.000		99.8	61.3	164			

Sample ID **LCS-1653**	SampType: **LCS**	TestCode: **EPA Method 8015B: Diesel Range**
Client ID: **LCSW**	Batch ID: **1653**	RunNo: **2346**
Prep Date: **4/23/2012**	Analysis Date: **4/24/2012**	SeqNo: **65244** Units: **mg/L**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	5.6	1.0	5.000	0	112	74	157			
Surr: DNOP	0.49		0.5000		97.1	61.3	164			

Sample ID **LCSD-1653**	SampType: **LCSD**	TestCode: **EPA Method 8015B: Diesel Range**
Client ID: **LCSS02**	Batch ID: **1653**	RunNo: **2346**
Prep Date: **4/23/2012**	Analysis Date: **4/24/2012**	SeqNo: **65245** Units: **mg/L**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Diesel Range Organics (DRO)	5.6	1.0	5.000	0	113	74	157	0.673	23	
Surr: DNOP	0.48		0.5000		95.2	61.3	164	0	0	

Qualifiers:

- */X Value exceeds Maximum Contaminant Level.
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- H Holding times for preparation or analysis exceeded
- J Analyte detected below quantitation limits
- ND Not Detected at the Reporting Limit
- R RPD outside accepted recovery limits
- RL Reporting Detection Limit

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: 1204865

02-May-12

Client: Southwest Geoscience

Project: Largo CS

Sample ID 5ML RB	SampType: MBLK	TestCode: EPA Method 8015B: Gasoline Range
Client ID: PBW	Batch ID: R2334	RunNo: 2334
Prep Date:	Analysis Date: 4/24/2012	SeqNo: 65518 Units: mg/L

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	ND	0.050								
Surr: BFB	21		20.00		104	69.3	120			

Sample ID 2.5UG GRO LCS	SampType: LCS	TestCode: EPA Method 8015B: Gasoline Range
Client ID: LCSW	Batch ID: R2334	RunNo: 2334
Prep Date:	Analysis Date: 4/24/2012	SeqNo: 65519 Units: mg/L

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	0.54	0.050	0.5000	0	107	101	123			
Surr: BFB	22		20.00		109	69.3	120			

Sample ID 5ML RB	SampType: MBLK	TestCode: EPA Method 8015B: Gasoline Range
Client ID: PBW	Batch ID: R2385	RunNo: 2385
Prep Date:	Analysis Date: 4/25/2012	SeqNo: 66305 Units: mg/L

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	ND	0.050								
Surr: BFB	19		20.00		95.2	69.3	120			

Sample ID 2.5UG GRO LC	SampType: LCS	TestCode: EPA Method 8015B: Gasoline Range
Client ID: LCSW	Batch ID: R2385	RunNo: 2385
Prep Date:	Analysis Date: 4/25/2012	SeqNo: 66306 Units: mg/L

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	0.54	0.050	0.5000	0	108	101	123			
Surr: BFB	18		20.00		87.5	69.3	120			

Sample ID 5ML RB	SampType: MBLK	TestCode: EPA Method 8015B: Gasoline Range
Client ID: PBW	Batch ID: R2421	RunNo: 2421
Prep Date:	Analysis Date: 4/26/2012	SeqNo: 67209 Units: mg/L

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	ND	0.050								
Surr: BFB	19		20.00		96.8	69.3	120			

Sample ID 2.5UG GRO LCS	SampType: LCS	TestCode: EPA Method 8015B: Gasoline Range
Client ID: LCSW	Batch ID: R2421	RunNo: 2421
Prep Date:	Analysis Date: 4/26/2012	SeqNo: 67210 Units: mg/L

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	0.55	0.050	0.5000	0	110	101	123			
Surr: BFB	22		20.00		108	69.3	120			

Qualifiers:

- */X Value exceeds Maximum Contaminant Level.
- B Analyte detected in the associated Method Blank
- E Value above quantitation range
- H Holding times for preparation or analysis exceeded
- J Analyte detected below quantitation limits
- ND Not Detected at the Reporting Limit
- R RPD outside accepted recovery limits
- RL Reporting Detection Limit

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1204865**

02-May-12

Client: Southwest Geoscience

Project: Largo CS

Sample ID **5ML RB**	SampType: **MBLK**	TestCode: **EPA Method 8015B: Gasoline Range**
Client ID: **PBW**	Batch ID: **R2484**	RunNo: **2484**
Prep Date:	Analysis Date: **4/30/2012**	SeqNo: **69022** Units: **mg/L**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	ND	0.050								
Surr: BFB	21		20.00		106	69.3	120			

Sample ID **2.5UG GRO LCS**	SampType: **LCS**	TestCode: **EPA Method 8015B: Gasoline Range**
Client ID: **LCSW**	Batch ID: **R2484**	RunNo: **2484**
Prep Date:	Analysis Date: **4/30/2012**	SeqNo: **69023** Units: **mg/L**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Gasoline Range Organics (GRO)	0.54	0.050	0.5000	0	107	101	123			
Surr: BFB	22		20.00		112	69.3	120			

Qualifiers:

- */X Value exceeds Maximum Contaminant Level.
- E Value above quantitation range
- J Analyte detected below quantitation limits
- R RPD outside accepted recovery limits
- B Analyte detected in the associated Method Blank
- H Holding times for preparation or analysis exceeded
- ND Not Detected at the Reporting Limit
- RL Reporting Detection Limit

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1204865**

02-May-12

Client: Southwest Geoscience

Project: Largo CS

Sample ID	5ML RB	SampType:	MBLK		TestCode:	EPA Method 8021B: Volatiles				
Client ID:	PBW	Batch ID:	R2334		RunNo:	2334				
Prep Date:		Analysis Date:	4/24/2012		SeqNo:	65540	Units:	µg/L		
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	ND	1.0								
Toluene	ND	1.0								
Ethylbenzene	ND	1.0								
Xylenes, Total	ND	2.0								
Surr: 4-Bromofluorobenzene	23		20.00		114	55	140			

Sample ID	100NG BTEX LCS	SampType:	LCS		TestCode:	EPA Method 8021B: Volatiles				
Client ID:	LCSW	Batch ID:	R2334		RunNo:	2334				
Prep Date:		Analysis Date:	4/24/2012		SeqNo:	65541	Units:	µg/L		
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	21	1.0	20.00	0	105	80	120			
Toluene	21	1.0	20.00	0	107	80	120			
Ethylbenzene	21	1.0	20.00	0	105	80	120			
Xylenes, Total	63	2.0	60.00	0	106	80	120			
Surr: 4-Bromofluorobenzene	23		20.00		116	55	140			

Sample ID	5ML RB	SampType:	MBLK		TestCode:	EPA Method 8021B: Volatiles				
Client ID:	PBW	Batch ID:	R2385		RunNo:	2385				
Prep Date:		Analysis Date:	4/25/2012		SeqNo:	66363	Units:	µg/L		
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	ND	1.0								
Toluene	ND	1.0								
Ethylbenzene	ND	1.0								
Xylenes, Total	ND	2.0								
Surr: 4-Bromofluorobenzene	20		20.00		98.9	55	140			

Sample ID	100NG BTEX LCS	SampType:	LCS		TestCode:	EPA Method 8021B: Volatiles				
Client ID:	LCSW	Batch ID:	R2385		RunNo:	2385				
Prep Date:		Analysis Date:	4/25/2012		SeqNo:	66364	Units:	µg/L		
Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	21	1.0	20.00	0	106	80	120			
Toluene	21	1.0	20.00	0	105	80	120			
Ethylbenzene	21	1.0	20.00	0	103	80	120			
Xylenes, Total	62	2.0	60.00	0	104	80	120			
Surr: 4-Bromofluorobenzene	24		20.00		118	55	140			

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit

QC SUMMARY REPORT

Hall Environmental Analysis Laboratory, Inc.

WO#: **1204865**

02-May-12

Client: Southwest Geoscience

Project: Largo CS

Sample ID **5ML RB**	SampType: **MBLK**	TestCode: **EPA Method 8021B: Volatiles**
Client ID: **PBW**	Batch ID: **R2421**	RunNo: **2421**
Prep Date:	Analysis Date: **4/26/2012**	SeqNo: **67246** Units: **µg/L**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	ND	1.0								
Toluene	ND	1.0								
Ethylbenzene	ND	1.0								
Xylenes, Total	ND	2.0								
Surr: 4-Bromofluorobenzene	21		20.00		104	55	140			

Sample ID **100NG BTEX LCS**	SampType: **LCS**	TestCode: **EPA Method 8021B: Volatiles**
Client ID: **LCSW**	Batch ID: **R2421**	RunNo: **2421**
Prep Date:	Analysis Date: **4/26/2012**	SeqNo: **67247** Units: **µg/L**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	21	1.0	20.00	0	107	80	120			
Toluene	22	1.0	20.00	0	108	80	120			
Ethylbenzene	21	1.0	20.00	0	107	80	120			
Xylenes, Total	64	2.0	60.00	0	106	80	120			
Surr: 4-Bromofluorobenzene	27		20.00		133	55	140			

Sample ID **5ML RB**	SampType: **MBLK**	TestCode: **EPA Method 8021B: Volatiles**
Client ID: **PBW**	Batch ID: **R2484**	RunNo: **2484**
Prep Date:	Analysis Date: **4/30/2012**	SeqNo: **69128** Units: **µg/L**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	ND	1.0								
Toluene	ND	1.0								
Ethylbenzene	ND	1.0								
Xylenes, Total	ND	2.0								
Surr: 4-Bromofluorobenzene	23		20.00		116	55	140			

Sample ID **100NG BTEX LCS**	SampType: **LCS**	TestCode: **EPA Method 8021B: Volatiles**
Client ID: **LCSW**	Batch ID: **R2484**	RunNo: **2484**
Prep Date:	Analysis Date: **4/30/2012**	SeqNo: **69129** Units: **µg/L**

Analyte	Result	PQL	SPK value	SPK Ref Val	%REC	LowLimit	HighLimit	%RPD	RPDLimit	Qual
Benzene	21	1.0	20.00	0	107	80	120			
Toluene	21	1.0	20.00	0	107	80	120			
Ethylbenzene	21	1.0	20.00	0	106	80	120			
Xylenes, Total	63	2.0	60.00	0	105	80	120			
Surr: 4-Bromofluorobenzene	20		20.00		101	55	140			

Qualifiers:

*/X	Value exceeds Maximum Contaminant Level.	B	Analyte detected in the associated Method Blank
E	Value above quantitation range	H	Holding times for preparation or analysis exceeded
J	Analyte detected below quantitation limits	ND	Not Detected at the Reporting Limit
R	RPD outside accepted recovery limits	RL	Reporting Detection Limit

HALL ENVIRONMENTAL ANALYSIS LABORATORY

Hall Environmental Analysis Laboratory
4901 Hawkins NE
Albuquerque, NM 87109
TEL: 505-345-3975 FAX: 505-345-4107
Website: www.hallenvironmental.com

Sample Log-In Check List

Client Name: Southwest Geoscience — Work Order Number: 1204865

Received by/date: AF 04/21/12

Logged By: **Michelle Garcia** 4/21/2012 11:00:00 AM Michelle Garcia

Completed By: **Michelle Garcia** 4/23/2012 9:09:29 AM Michelle Garcia

Reviewed By: 04/23/12

Chain of Custody

1. Were seals intact?	Yes ☐	No ☐	Not Present ☑
2. Is Chain of Custody complete?	Yes ☑	No ☐	Not Present ☐
3. How was the sample delivered?	Courier		

Log In

4. Coolers are present? (see 19. for cooler specific information)	Yes ☑	No ☐	NA ☐
5. Was an attempt made to cool the samples?	Yes ☑	No ☐	NA ☐
6. Were all samples received at a temperature of >0° C to 6.0°C	Yes ☑	No ☐	NA ☐
7. Sample(s) in proper container(s)?	Yes ☑	No ☐	
8. Sufficient sample volume for indicated test(s)?	Yes ☑	No ☐	
9. Are samples (except VOA and ONG) properly preserved?	Yes ☑	No ☐	
10. Was preservative added to bottles?	Yes ☐	No ☑	NA ☐
11. VOA vials have zero headspace?	Yes ☐	No ☐	No VOA Vials ☑
12. Were any sample containers received broken?	Yes ☐	No ☑	
13. Does paperwork match bottle labels? (Note discrepancies on chain of custody)	Yes ☑	No ☐	
14. Are matrices correctly identified on Chain of Custody?	Yes ☑	No ☐	
15. Is it clear what analyses were requested?	Yes ☑	No ☐	
16. Were all holding times able to be met? (If no, notify customer for authorization.)	Yes ☑	No ☐	

# of preserved bottles checked for pH: _____ (<2 or >12 unless noted)

Adjusted? _____

Checked by: _____

Special Handling (if applicable)

17. Was client notified of all discrepancies with this order? Yes ☐ No ☐ NA ☑

Person Notified: _____ Date: _____

By Whom: _____ Via: ☐ eMail ☐ Phone ☐ Fax ☐ In Person

Regarding: _____

Client Instructions: _____

18. Additional remarks:

19. Cooler Information

Cooler No	Temp °C	Condition	Seal Intact	Seal No	Seal Date	Signed By
1	3.0	Good	Yes			

CHAIN OF CUSTODY RECORD

Southwest GEOSCIENCE
Environmental & Hydrogeologic Consultants

Office Location: Aztec
Project Manager: Kyle Summers

Laboratory: HALL
Address: Albequerque
Contact:
Phone:
PO/SO #:

Lab use only
Due Date:
Temp. of coolers when received (C°): 3.0°
1 3.0° | 2 | 3 | 4 | 5
Page 1 of 2

Sampler's Name: Aaron Bentley
Sampler's Signature: Aaron Bentley

Proj. No.: 0410002
Project Name: Largo CS
No/Type of Containers

ANALYSIS REQUESTED: TPH GRO/DRO 8015; BTEX 8021

Matrix	Date	Time	Comp	Grab	Identifying Marks of Sample(s)	Start Depth	End Depth	VOA	A/G 1 Lt.	250 ml	P/O	Lab Sample ID (Lab Use Only)
W	4/18/12	0825		✓	MW-40			5				1204865-001
W	4/18/12	0915		✓	MW-50			5				-002
W	4/18/12	0940		✓	MW-42			5				-003
W	4/18/12	1030		✓	MW-51			5				-004
W	4/18/12	1115		✓	MW-41			5				-005
W	4/18/12	1155		✓	MW-43			5				-006
W	4/18/12	1235		✓	MW-32			5				-007
W	4/18/12	1315		✓	MW-34			5				-008
W	4/18/12	1355		✓	MW-52			5				-009
W	4/18/12	1430		✓	MW-39			5				-010

Turn around time: ☒ Normal ☐ 25% Rush ☐ 50% Rush ☐ 100% Rush

Relinquished by (Signature)	Date:	Time:	Received by: (Signature)	Date:	Time:
	4/19/12	1715		4/19/12	1715
	4/19/12	1735	Matthew Walters	4/19/12	1735
Matthew Walters	4/20/12	1721		4/21/12	1100

NOTES:

Matrix: WW - Wastewater; W - Water; S - Soil; SD - Solid; L - Liquid; A - Air Bag; C - Charcoal tube; SL - sludge; O - Oil
Container: VOA - 40 ml vial; A/G - Amber / Or Glass 1 Liter; 250 ml - Glass wide mouth; P/O - Plastic or other

CHAIN OF CUSTODY RECORD

Southwest GEOSCIENCE
Environmental & Hydrogeologic Consultants

Office Location: Aztec
Project Manager: Kyla Summers

Laboratory: Hall
Address: Albequerque
Contact:
Phone:
PO/SO #:

Sampler's Name: Aaron Bentley
Sampler's Signature: Aaron Bentley

Lab use only
Due Date:

Temp. of cooters when received (C°): 3.0°

Page 2 of 3

Proj. No.: 0410002
Project Name: Largo CS

ANALYSIS REQUESTED: TPH GRO/DRO 8015; BTEX 8021

Matrix	Date	Time	Comp	Grab	Identifying Marks of Sample(s)	Start Depth	End Depth	No/Type of Containers: VOA	A/G 1 Lt.	250 ml	P/O	Lab Sample ID (Lab Use Only)
w	4/18/12	1555		✓	MW-38			5				1204805 - 011
w	4/18/12	1635		✓	MW-36			5				- 012
w	4/18/12	1710		✓	MW-49			5				- 013
w	4/18/12	1725		✓	MW-48			5				- 014
w	4/19/12	0835		✓	MW-9			5				- 015
w	4/19/12	0915		✓	MW-3R			5				- 016
w	4/19/12	0955		✓	MW-8			5				- 017
w	4/19/12	1030		✓	MW-47			5				- 018
w	4/19/12	1110		✓	MW-14			5				- 019
w	4/19/12	1145		✓	MW-13			5				- 020

Turn around time: ☒ Normal ☐ 25% Rush ☐ 50% Rush ☐ 100% Rush

Relinquished by (Signature)	Date:	Time:	Received by: (Signature)	Date:	Time:
Aaron Bentley	4/19/12	1715		4/19/12	1744
	4/19/12	1735	Mike Wade	4/19/12	1735
Christine Walsh	4/20/12	1721		4/20/12	1100

NOTES:

Matrix: WW - Wastewater; W - Water; S - Soil; SD - Solid; L - Liquid; A - Air Bag; C - Charcoal tube; SL - sludge; O - Oil
Container: VOA - 40 ml vial; A/G - Amber / Or Glass 1 Liter; 250 ml - Glass wide mouth; P/O - Plastic or other

CHAIN OF CUSTODY RECORD

Southwest GEOSCIENCE
Environmental & Hydrogeologic Consultants

Office Location: Aztec
Project Manager: Kyle Summers

Laboratory: HALL
Address: Albuquerque
Contact:
Phone:
PO/SO #:

Sampler's Name: Aaron Bentley
Sampler's Signature: Aaron Bentley

Proj. No.: 0410002
Project Name: Largo CS

Lab use only
Due Date:
Temp. of coolers when received (C°): 3.0°
1 3 | 2 | 3 | 4 | 5
Page 3 of 3

ANALYSIS REQUESTED: TPH GRO/DRO 8015; BTEX 8021

Matrix	Date	Time	Comp	Grab	Identifying Marks of Sample(s)	Start Depth	End Depth	No/Type of Containers: VOA	A/G 1 Lt.	250 ml	P/O	Lab Sample ID (Lab Use Only)
W	4/19/12	1220		✓	MW-6			5				1204865-021
W	4/19/12	1300		✓	MW-16			5				-022
W	4/19/12	1340		✓	MW-15			5				-023
W	4/19/12	1420		✓	MW-17 DUP			5				-024
W	4/19/12	1515		✓	MW-12			5				-025
W	4/19/12	1555		✓	MW-11			5				-026

Turn around time: ☑ Normal ☐ 25% Rush ☐ 50% Rush ☐ 100% Rush

Relinquished by (Signature)	Date:	Time:	Received by: (Signature)	Date:	Time:
	4/19/12	17:15		4/19/12	1715
	4/19/12	1735		4/19/12	1735
	4/20/12	1721		4/21/12	1100

NOTES:
SPOKE WITH KYLE REGARDING -024 SAMPLE NAME. 04/23/12

Matrix: W - Wastewater; S - Soil; SD - Solid; L - Liquid; A - Air Bag; C - Charcoal tube; SL - sludge; O - Oil
Container: VOA - 40 ml vial; A/G - Amber / Or Glass 1 Liter; 250 ml - Glass wide mouth; P/O - Plastic or other