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Alameda County
Environmental Health

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Mr. Jerry Wickham
Alameda County Health Care Services Agency
1131 Harbor Bay Parkway, Suite 250
Alameda, California 94502-6577

Subject: Supplemental Subsurface Investigation Report
Shell-branded Service Station
1784 150th Avenue
San Leandro, California
SAP Code 136019
Incident No. 98996068
ACEH File No. RO0000367

Dear Mr. Wickham:

Attached for your review and comment is a copy of the *Supplemental Subsurface Investigation Report* for the above referenced site. Upon information and belief, I declare, under penalty of perjury, that the information contained in the attached document is true and correct.

As always, please feel free to contact me directly at (707) 865-0251 with any questions or concerns.

Sincerely,

Denis L. Brown
Project Manager

CONESTOGA-ROVERS
& ASSOCIATES

19449 Riverside Drive, Suite 230, Sonoma, California 95476
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December 19, 2007

Mr. Jerry Wickham
Alameda County Health Care Services Agency
1131 Harbor Bay Parkway, Suite 250
Alameda, California 94502-6577

Re: **Supplemental Subsurface Investigation Report**
Shell-branded Service Station
1784 150th Avenue
San Leandro, California
SAP Code 136019
Incident No. 98996068
ACEH File No. RO0000367

Dear Mr. Wickham:

Conestoga-Rovers & Associates, Inc. (CRA) prepared this report on behalf of Equilon Enterprises LLC dba Shell Oil Products US (Shell) to document the recent groundwater, soil, and soil vapor investigations at the subject site. The purpose of these investigations was to further delineate the lateral and vertical extent of groundwater impact and assess soil vapor impact both on and off the site. CRA followed the scope of work proposed in our June 5, 2007 *Site Investigation Work Plan* which was approved in the Alameda County Health Care Services Agency (ACHCSA) correspondence dated July 2, 2007. Recommendations in Cambria's February 14, 2007 *Agency Response with Proposed Future Actions* initiated the investigation, and CRA performed the work in accordance with ACHCSA and San Francisco Bay Regional Water Quality Control Board (SF-RWQCB) guidelines.

As stated in Cambria's February 14, 2007 document and CRA's June 2007 work plan, the objectives of this work were to:

- Obtain better lithologic information to depths up to 75 feet below grade (fbg);
- Assess residual soil concentrations near previous documented impact at SB-23;
- Further delineate the vertical and horizontal extent of groundwater impact on and offsite; and
- Evaluate current soil vapor concentrations to assess potential threat to indoor air (residential and commercial).

EXECUTIVE SUMMARY

- Five of the six proposed CPT borings were completed. The sixth location (proposed CPT-4) was sampled using Geoprobe equipment (B-1) instead of CPT due to access restrictions. Soil samples from B-1 indicate residual soil impact in the vadose zone still exists, but has decreased from 5-15 fbg, and increased at 29.5 fbg compared with the 2006 data from SB-23.

- Groundwater samples were attempted at first water in B-1 and from numerous intervals from the CPT borings; however, only CPT-3 resulted in sample recovery from the shallow interval (less than 30 fbg). The others provided no shallow groundwater recovery after up to 60 minutes of waiting for recharge.

- Two to three deeper groundwater samples were obtained from each CPT location, resulting in horizontal and vertical groundwater delineation to below non-drinking water Environmental Screening Levels (ESLs, reference SFBRWQCB November 2007 document). Vertical groundwater data from CPT-1 and CPT-2 onsite indicate that the majority of groundwater impact is concentrated at the shallower depths, and deeper screened wells (MW-1 and MW-2) may be acting as conduits for vertical migration. There is an upward vertical gradient at this site which helps minimize vertical migration downward, but destruction of wells that screen a long interval beyond 30 fbg would be prudent.

- All five of the proposed soil vapor probes were installed and subsequently sampled. Soil vapor samples from SVP-1, SVP-4, and SVP-5 exceed the ESLs for TPHg for residential indoor air, and SVP-5 TPHg concentration exceeds the commercial ESL. None of the BTEX or MTBE concentrations exceed any of the indoor air ESLs. Re-sampling is recommended.

- The TPHg concentration in soil vapor from SVP-5 is almost 6 times higher than the maximum onsite soil vapor concentrations in SVP-1 and SVP-4. Reviewing historical soil data shows vadose zone impacted soils in boring MW-12, near SVP-5, which may explain the higher concentrations offsite than onsite. The source of the vadose zone impacted soil at MW-12 is unknown, but is not likely a result of the UST equipment at the subject site.

SITE DESCRIPTION AND HISTORY

The site is an operating Shell-branded service station located at the southern corner of 150th Avenue and Freedom Avenue in San Leandro, California (Figure 1). The area surrounding the site is mixed commercial and residential. The site layout (Figure 2) includes a station building, two dispenser islands,

and three fuel underground storage tanks (USTs). A summary of previous work performed at the site is provided in Attachment A.

INVESTIGATION SUMMARY

A summary of the investigation scope of work is listed below:

- ***CPT Investigation:*** CRA oversaw the drilling and sampling of cone penetration testing (CPT) borings CPT-1 through CPT-3, CPT-5 and CPT-6. CPT provided tip resistance, sleeve friction, dynamic pore pressure, and hydrocarbon measurements which were electronically recorded on a continuous log from which the subsurface lithology, and stratigraphy was inferred. The depth and number of discrete groundwater samples was based on the CPT data evaluation. CPT-4 could not be drilled because the CPT drill rig would not fit beneath the station canopy. Access to the drilling location was also restricted by underground utilities in the area. In an attempt to obtain at least some of the desired data from this location, boring B-1 was drilled at the proposed location of CPT-4 with a Geoprobe drilling rig. The CPT and boring locations are presented on Figure 2. CRA's standard field procedures for CPT and Geoprobe drilling are included in Attachment B.

- ***Soil Vapor Investigation:*** CRA oversaw the drilling, installation, and sampling of soil vapor probes SVP-1 through SVP-5 along the southwestern property boundary, near the onsite commercial building, and offsite near monitoring well MW-12 to determine the potential vapor intrusion risk to human health on and offsite. The soil vapor probe boring locations are presented on Figure 2. CRA's standard field procedures for soil vapor probe installation and sampling are included in Attachment B.

Details of these investigations are provided in the following sections.

CPT INVESTIGATION

CRA Personnel Present: CRA field geologist Scott Lewis directed the CPT field activities and Lauren Goldfinch directed the Geoprobe field activities, under the supervision of California Professional Geologist Ana Friel.

Permits: CRA obtained Alameda County Public Works Agency Water Resources Well Permit W2007-0841 for advancement of CPT and Geoprobe borings, and an encroachment permit from the City of San Leandro ENC2007-00297 for work completed in the public-right-of-way. Attachment C includes all permits.

Drilling Company: Gregg Drilling and Testing of Martinez, California (C-57 License #485165).

Drilling Dates: CPT: August 29 through 31, 2007. Geoprobe: September 14, 2007.

Drilling Methods: Direct push CPT and Geoprobe.

Number of Borings: CPT locations CPT-1 through CPT-3, CPT-5, and CPT-6 consisted of 3 to 6 CPT borings: one boring to a approximately 75 fbg for the continuous CPT log; and one boring for each discrete groundwater sample or attempted sample. No soil samples were collected from the CPT borings. One Geoprobe boring (B-1) was advanced on-site.

Boring depths: CPT borings CPT-1 through CPT-3, CPT-5, and CPT-6 were advanced to 75 feet below ground (fbg) and Geoprobe boring B-1 was advanced to 30 fbg.

CPT Logging: Continuous logs of CPT data were generated by Gregg InSitu, Inc. (Gregg) for each boring. The CPT logs are presented in Attachment D.

Groundwater Sampling Methods: Groundwater samples were collected from the CPT borings using Hydropunch ® sampling equipment and were contained in appropriate sample containers supplied by the laboratory. Upon their collection, each groundwater sample was labeled, entered onto a chain-of-custody record, and placed into a cooler with ice for transport to Calscience Environmental Laboratories, Inc. (Calscience) of Garden Grove California for analysis.

Groundwater Sample Intervals/Recovery: Hydropunch® samples were attempted in CPT-1 at 26-30 fbg (no recovery [NR]), 41-45 fbg, 54-58 fbg, and 70-74 fbg; in CPT-2 at 22-25 fbg (NR), 35-39 fbg, 53-57 fbg, and 68-72 fbg; in CPT-3 at 23-27 fbg, 49-53 fbg, and 69-73 fbg; in CPT-5 at 28-32 fbg (NR), 41-45 fbg, 54-57 fbg, and 70-74 fbg; and in CPT-6 at 21-25 fbg (NR), 26-30 fbg (NR), 40-44 fbg, 52-56 fbg (NR), and 70-74 fbg. Grab and Hydropunch ® samples were attempted from boring B-1, but no recovery was achieved after allowing more than 2 hours.

Soil Sampling Methods: Soil samples were not collected from the CPT borings. In the Geoprobe boring, CRA logged soil types using the Unified Soil Classification System and describes the encountered soils in the boring log presented in Attachment D. Soil samples were collected from the Geoprobe boring at 5 foot intervals to approximately 30 fbg, and also at 17 fbg based on field observations, for soil description, chemical analysis and headspace analysis. CRA screened the soil samples for the presence of organic vapors using a photo-ionization detector (PID) and recorded PID readings on the boring log (Attachment D).

Soil Classification: Soil encountered during drilling consisted of silt and silt with sand (ML) with lenses and intervals of clayey silt (ML), silty sand (SM), cemented sand (SP), and clay (CL) to the maximum depth of the CPT borings. Silty sands and sandy silts from B-1 also contained varying amounts of gravel to 17 fbg. Encountered soils are described in the boring logs (Attachment D) and present graphically in cross-sections A-A' (Figure 3) and C-C' (Figure 4). The cross-section locations are shown in Figure 2.

Backfill Method: All borings were backfilled with neat cement grout to match the existing grade.

Chemical Analyses: Calscience analyzed groundwater samples for total petroleum hydrocarbons as gasoline (TPHg), benzene, toluene, ethylbenzene, xylenes (BTEX), 5 fuel oxygenates (MTBE, DIPE, TBA, ETBE, and TAME), 1,2-dibromomethane (EDB), and 1,2-dichloroethane (DCA). Soil samples from boring B-1 were analyzed for TPHg, BTEX, MTBE, EDB and DCA.

Soil Disposal: CRA temporarily stored soil generated during the field activities on-site in lidded and labeled 55-gallon drums. CRA sampled the drums for disposal profiling and submitted the samples to Calscience. Attachment E includes the laboratory report. Waste Management of Houston, Texas transported the drummed soil to Evergreen Landfill in Hayward, California for disposal as non-hazardous waste; disposal documentation has not yet been received by CRA, but will be available at a later date, upon request. Three drums of material contained rinse water with grout, resulting in an elevated pH. This drum was managed as hazardous waste and trasnported to US Ecology's facility in Beatty, Nevada for disposal. The certificate of disposal for the hazardous waste drums is included as Attachment F.

Soil Vapor Investigation

CRA Personnel Present: CRA field geologists Scott Lewis directed the soil vapor probe installation field activities and Lauren Goldfinch conducted soil vapor sampling activities, under the supervision of California Professional Geologist Ana Friel.

Permits: CRA obtained Alameda County Public Works Agency Water Resources Well Permit W2007-0840 for drilling and installation of the soil vapor probes, and an encroachment permit from the City of San Leandro ENC2007-00297 for work completed in the public-right-of-way. Attachment C includes all permits.

Drilling Company: Gregg Drilling and Testing of Martinez, California (C-57 License #485165).

Drilling Dates: August 27 through 28, 2007.

Drilling Methods: Air knife and hand auger.

Number of Borings: Soil vapor probe borings SVP-1 through SVP-5 were drilled on-site and off site. Soil samples were collected from the SVP borings at 4.5 fbg.

Boring depths: All SVP borings were advanced to 5 fbg.

Soil Sampling Methods: CRA logged soil types using the Unified Soil Classification System and describes the encountered soils in the boring logs presented in Attachment D. Soil samples were collected from each boring at 5 fbg for chemical analysis and headspace analysis. CRA screened the soil samples for the presence of organic vapors using a photo-ionization detector (PID) and recorded PID readings on the boring logs.

Soil Classification: Soil encountered during drilling consisted of silt (ML), silty sand and silty sand with gravel (SM) to the maximum depth of the SVP borings. Encountered soils are described in the boring logs.

Soil Vapor Probe Installation: CRA advanced 5 soil borings (SVP-1 through SVP-5) in the approximate locations shown on Figure 2. After the borings were advanced, fixed vapor-sampling points were installed in each boring using ¼-inch diameter Teflon tubing. Each point consists of a 3-inch screen interval manufactured by Geoprobe attached to the Teflon tubing. Clean, fine-grained silica sand filter pack was installed approximately 3 inches below and above the screened interval. The annulus was sealed to the surface using bentonite slurry, set atop a two-inch base of bentonite pellets. Each soil probe was completed at the surface using a traffic-rated well box at grade. Construction details for each well are shown on the respective boring logs.

Soil Vapor Probe Sampling: On September 25, 2007, soil vapor samples were collected from each sampling point in summa canisters according to Shell's vapor sampling protocol which is included in Attachment B.

Soil Vapor Chemical Analyses: The soil gas samples were analyzed by Modified EPA Methods TO-3 for TPHg, and TO-15 for BTEX, MTBE, and leak test (tracer) compounds isobutane, butane, and propane (as tentatively identified compounds [TICs]). These tracer compounds were identified by EPA method TO-15 as the most abundant compounds of the specific shaving cream analyzed and indicated by distinctive peaks on the petroleum hydrocarbon chromatograph.

Soil Disposal: CRA temporarily stored soil generated during the field activities on-site in lidded and labeled 55-gallon drums. CRA sampled the drums for disposal profiling and submitted the samples to Calscience. Attachment E includes the laboratory report. Waste Management of Houston, Texas transported the drummed soil to Evergreen Landfill in Hayward, California for disposal as non-hazardous waste; disposal documentation has not yet been received by CRA, but will be available at a later date, upon request.

INVESTIGATION RESULTS

Soil Analytical Results: Soil samples were collected for chemical analysis from soil vapor probe borings SVP-1 through SVP-5 at 4.5 fbg. In addition, soil samples were collected for chemical analysis from Geoprobe boring B-1 in the approximate location as proposed boring CPT-4 at 5-foot intervals to approximately 30 fbg, and also at 17 fbg. A total of 12 soil samples were collected during this investigation.

The soil sample from B-1 at 29 fbg showed the highest levels detected during the field investigation activities and contained 1,100 milligrams per kilogram (mg/kg) TPHg, 4.1 mg/kg benzene, 15 mg/kg

toluene, 19 mg/kg ethyl benzene, and 112 mg/kg xylenes. Only one of the soil samples from the five SVP borings contained any detectable concentrations. SVP-4 at 4.5 fbg reported 150 mg/kg TPHg, 0.24 mg/kg toluene, 3.8 mg/kg ethyl benzene, and 12 mg/kg xylenes. The TPHg result contained a laboratory notation that the chromatographic pattern did not match the chromatographic pattern of the specified standard.

Table 1 summarizes the soil analytical data, results for TPHg, benzene, and MTBE are presented on Figure 5, and the laboratory analytical report is presented in Attachment E.

Grab Groundwater Analytical Results: Grab groundwater samples for chemical analysis were collected from CPT borings CPT-1 through CPT-3, and CPT-5 at three 4-foot intervals between 23 and 74 fbg and from CPT-6 at two 4-foot intervals between 40 and 74 fbg. Sampling was attempted at one shallow interval in CPT-1 (26-30 fbg), CPT-2 (21-25 fbg), and CPT-5 (28-32 fbg). Sampling was attempted in CPT-6 at 2 shallow intervals (21-25 and 25-29 fbg) and one deeper interval (52-56 fbg) but in each attempt no water entered the Hydropunch apparatus after 20 – 60 minutes and sampling was abandoned. A Hydropunch sample was attempted in boring B-1 at 26 – 30 fbg, but again, no recharge occurred.

Grab groundwater samples collected during the field activities contained up to 3,600 micrograms per liter (µg/l) TPHg, 41 µg/l benzene, 4.7 µg/l toluene, 18 µg/l ethyl benzene, 50 µg/l xylenes, 1,100 µg/l MTBE, 430 µg/l TBA, 2.0 µg/l DIPE, and 97 µg/l EDB.

Table 2 summarizes the groundwater analytical data, results for TPHg, benzene, and MTBE are presented on Figure 5, and the laboratory analytical report is presented in Attachment E.

Soil Vapor Analytical Results: Soil vapor samples for chemical analysis were collected from the soil vapor probes SVP-1 through SVP-5. Soil vapor samples collected approximately one month after the probes were installed contained up to 70,000 micrograms per cubic meter (µg/m^3) TPHg (SVP-5), 11 µg/m^3 benzene (SVP-2), 7,000 µg/m^3 toluene (SVP-1), 120 µg/m^3 ethyl benzene (SVP-1), 296 µg/m^3 xylenes (SVP-1), and 24 µg/m^3 MTBE (SVP-2). Leak testing was performed during sampling using shaving cream to determine if ambient air was entering the Summa canisters during sampling by recognizing if the specific leak test compounds were identified in the chemical analysis. Isobutane is the standard compound of the leak test (approximately 350,000 µg/m^3 in shaving cream) and was not identified in the soil vapor samples. Although butane was detected in samples SVP-1 and SVP-4, the highest amount reported was 1,200 µg/m^3 in SVP-4, an amount considered negligible, as isobutene was not identified.

Table 3 summarizes the soil vapor analytical data, results for TPHg, benzene, and MTBE are presented on Figure 6, and the laboratory analytical report is presented in Attachment E.

CONCLUSIONS

The purpose of this investigation was to determine the lateral and vertical extent of groundwater impact and assess soil vapor impact both on and off the site. The investigation consisted of advancing 5 CPT borings for groundwater grab sampling, advancing 1 Geoprobe boring for sampling in the vicinity of previous boring SB-23, and installing five soil vapor probes for the collection of soil vapor samples.

Shallow soil samples from SVP-1 through SVP-3, and SVP-5 did not contain detectable levels of TPHg, BTEX or MTBE, and the detection in SVP-4 and samples from B-1 are all below the recently revised SFBRWQCB ESLs for shallow and deep soil at residential properties where groundwater is not a potential source of drinking water (Tables B and D of November 2007 ESL document). Data from boring B-1 confirm the presence of residual source material in vadose zone soils in this area, however, the shallower concentrations are lower and the deepest sample interval (29.5 fbg) is higher when compared with the data collected from nearby boring B-23 in 2006.

Groundwater grab sample analyses were all below the SFBRWQCB ESLs for sites where groundwater is not a current or potential source of drinking water. Based on the results from this investigation, the horizontal extent of significant petroleum hydrocarbons has been defined at the site, and the vertical extent is confined to the shallower groundwater intervals. The deeper samples obtained from CPT-1 and CPT-3 indicate that the shallower zone (less than 30 fbg) is more impacted than deeper zones, and that the monitoring wells with long screens may be providing preferential pathways for contaminant migration.

All soil vapor sample analyses were below SFBRWQCB ESLs for residential and commercial land use for the BTEX and MTBE constituents, and SVP-2 and SVP-3 were below the ESLs for TPHg. SVP-1, SVP-4, and SVP-5 exceed the residential ESL and SVP-5 exceeds the commercial ESL for TPHg. Since the groundwater concentrations offsite are lower than those onsite, and since there was impacted vadose zone soil samples near SVP-5 (reported in boring MW-12), it appears that the TPHg concentration in soil gas reflects migration of vapors from shallow impacted soil rather than from the impacted groundwater at depth.

RECOMMENDATIONS

Shell recommends the following activities:

- Destruction of wells MW-1 and MW-2 due to overly long screen intervals.
- Replacement of well MW-1 with an appropriately screened well in the shallow zone (4-inch diameter well) and a deeper screened well in the within the sandy unit encountered below 40 fbg (2-inch diameter well).
- Installation of a shallow-zone monitoring well at the location of boring B-1, if utility clearance allows.
- Re-sampling vapor probes SVP-1 through SVP-5.

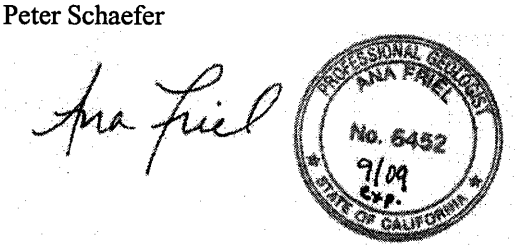
Upon agency concurrence with these recommendations, a detailed work plan should be prepared and submitted for review.

CLOSING

If you have any questions regarding this submittal, please call Peter Schaefer (510) 420-3319 or Ana Friel at (707) 268-3812.

Sincerely,
Conestoga-Rovers & Associates, Inc.

Peter Schaefer



Ana Friel, PG

Figure 1. Site Vicinity Map
Figure 2. Sample Location Map
Figure 3. Geologic Cross Section A-A'
Figure 4. Geologic Cross Section C-C'
Figure 5. Soil and Groundwater Data (August 2007)
Figure 6. Soil Vapor Data (September 2007)

Table 1. Soil Sample Analytical Results
Table 2. Groundwater Sample Analytical Results
Table 3. Soil Vapor Sample Analytical Results

Attachment A. Site History
Attachment B. Standard Field Procedures
Attachment C. Drilling and Encroachment Permits
Attachment D. CPT Logs and Boring Logs
Attachment E. Laboratory Analytical Reports
Attachment F. Disposal Documentation

cc: Denis Brown, Shell Oil Products US, 20945 S. Wilmington Ave., Carson, CA 90810

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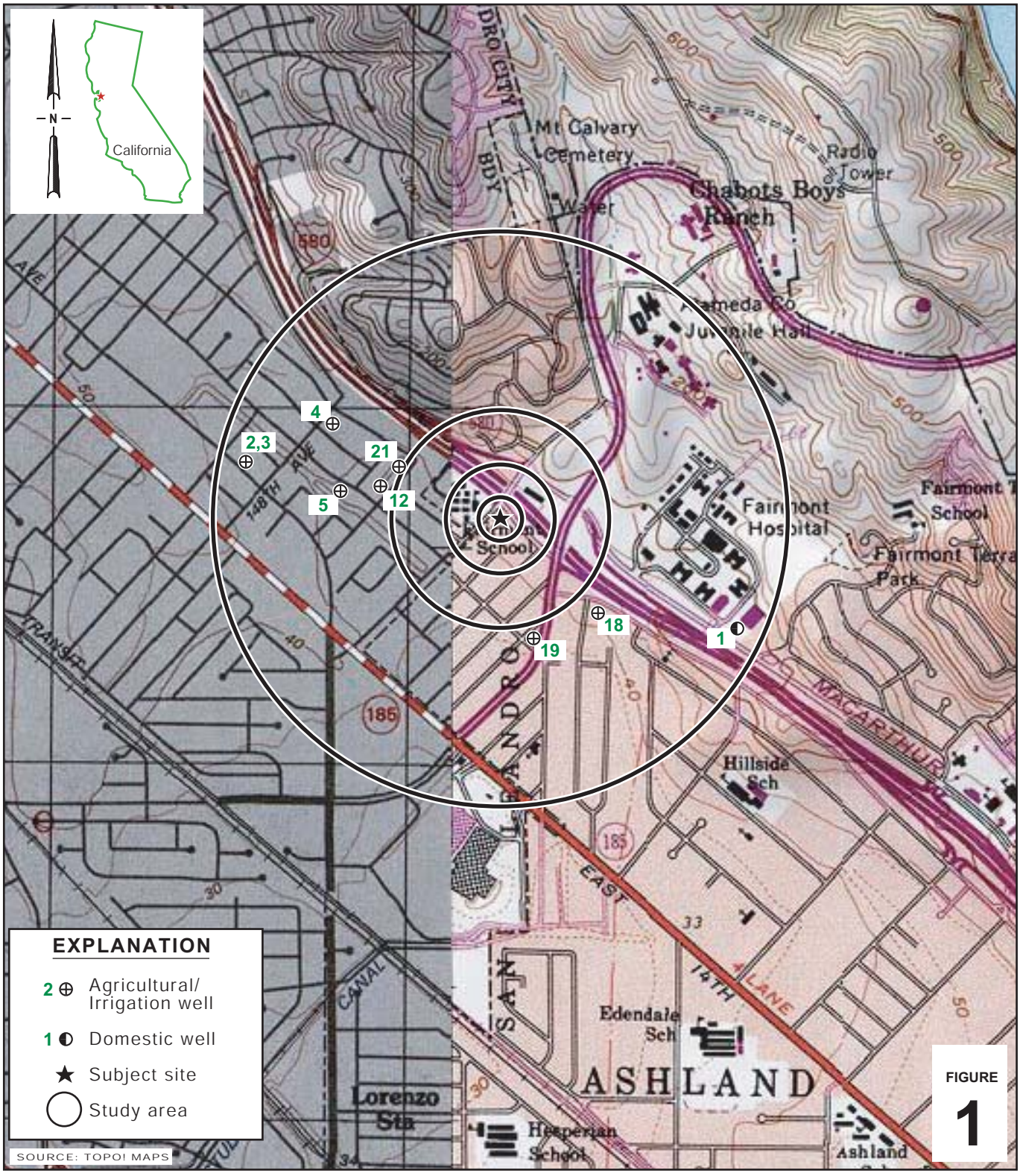
05/17/07



SCALE : 1" = 1/4 MILE

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FIGURE 1

Shell-branded Service Station

1784 150th Avenue

San Leandro, California

CONESTOGA-ROVERS & ASSOCIATES

Vicinity Map

11/08/07

Site Plan

EXPLANATION

- CPT-1 — CPT location (CRA, 8/29-30/07)
- B-1 — Soil boring location (CRA, 9/14/07)
- SVP-1 — Soil vapor probe location (CRA, 8/28/07)
- WO-1-6.5 — Soil sample location (Cambria, 5/25/06)
- S-19 — Soil boring location (Cambria, 5/23-25/06)
- MW-4 — Monitoring well location
- MW-6 — Monitoring well location
- D-1-5.0 — Soil sample location (Cambria, 04/05/05)
- D-1-3.5 — Soil sample location (Cambria, 03/22/05)
- SB-17 — Soil boring location (Cambria, 9/04)
- SB-10 — Soil boring location (Cambria, 6/03)
- SB-9 — Soil boring location (Cambria, 10/02)
- SVS-11 — Soil boring location (Cambria, 11/98)
- SVS-1 — Soil boring location (Cambria, 7/96)
- BH-7 — Soil boring location (Weiss, 3/95)
- A — Dispenser soil sample location (Weiss, 3/95)
- BH-1 — Soil boring location (Weiss, 6/94)
- 1 — Dispenser number
- Product piping
- A — A' Cross-section line

I-580

I-580 OFF-RAMP

FREEDOM AVENUE

PORTOFINO CIRCLE

PORTOFINO DRIVE

150TH AVENUE

brick sound wall

BH-1 located 215' SE

BH-6 located 360' SE

BH-4

BH-2

BH-5

BH-7

BH-8

BH-9

SB-9

SB-10

SB-11

SB-12

SB-13

SB-14

SB-15

SB-16

SB-17

SB-18

SB-19

SB-20

SB-21

SB-22

SB-23

SVS-1

SVS-2

SVS-3

SVS-4

SVS-5

SVS-6

SVS-7

SVS-8

SVS-9

SVS-10

SVS-11

SVS-12

SVS-13

SVS-14

SVS-15

SVS-16

MW-1

MW-2

MW-3

MW-4

MW-5

MW-6

MW-7

MW-8

MW-9

MW-10

MW-11

SB-24/MW-12

SB-25/ MW-13

CPT-1

CPT-2

CPT-3

CPT-5

CPT-6

SVP-1

SVP-2

SVP-3

SVP-4

SVP-5

A

A'

B-1

C

C'

Former Dispenser Island

Former W/O UST

Shell Station
1784 150th Ave.

Station Building

USTs

air comp.

parking lot

Denny's Restaurant
15015 Freedom Ave.

Residential

Residential (Townhouses)

Private (Gated Driveway)

MH

P-1-2.5, P-1-5.0

D-2-3.5

D-2-5.0

D-4-3.5

D-4-5.0

P-2-3.5, P-2-5.0

D-3-3.5

P-3-3.0

D-1-3.5

D-1-5.0

P-4-2.5

P-4-5.0

0 20 40 80

Scale (ft)

FIGURE

2

Shell-branded Service Station

1784 150th Avenue

San Leandro, California

CONESTOGA-ROVERS & ASSOCIATES

I:\SONOMA.SHELL\SAN LEANDRO 1784 150TH\FIGURES\SITE PLAN.DWG

12/17/07

Geologic Cross Section A-A'

A — Northwest — A'

Southeast

MW-13 41.59' | MW-9 41.65' (4'SW) | SB-14 NS (7'NE) | MW-12 44.10' (2'NE) | PL | CPT-2 NS (1'SW) | MW-2 45.79' (12'SW) | MW-11 45.58' (3'SW) | Shell Station 1784 150th Ave. | SB-19 NS (10'SW) | SB-22 NS (1'SW) | CPT-1 NS (2'SW) | MW-1 49.10' | PL | SB-17 NS (1'SW) | CPT-5 NS (8'SW)

~107'

Residential

PORTOFINO CIRCLE

150th AVENUE

sidewalk

parking lot

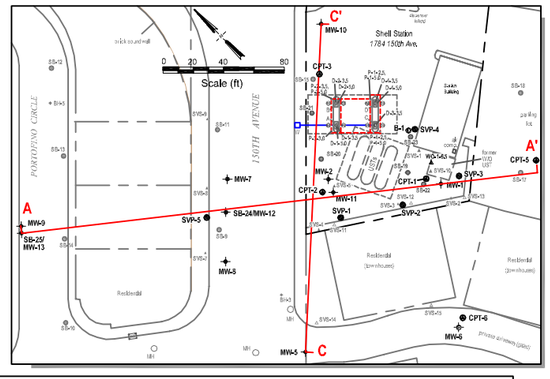
UST PIT

FORMER W/O UST PIT

Groundwater Flow Direction

Elevation, in feet above mean sea level

Approximate depth in feet below grade



EXPLANATION

Well ID – Well Designation

Elev. — TOC Elevation, in feet above msl (NS = Not Surveyed)

(offset) — Offset distance and direction to cross-section line

— Groundwater Monitoring Well or Soil Boring

— Well Screen Interval

— Bottom of boring

◄ Approximate Soil Sample Location

Interval of Discrete Soil Sample Results (Grouped for Clarity)

NA Not analyzed

ND TPHg, benzene, and MTBE all not detected

TPHg / Benzene / MTBE — Concentrations in Soil, in mg/kg; (MTBE analyzed by EPA Method 8020 in parentheses, all others by EPA Method 8260 or NA)

TPHg / Benzene / MTBE — Concentrations in Groundwater, in µg/L (09/11/07)

▼ Depth of Groundwater (09/11/07)

– – – Inferred Potentiometric Surface

◄ Grab Groundwater Sample Depth

(6/26/00) ▽ Depth and Date of First Encountered Groundwater

<50 / <0.50 / <1.0 — CPT Groundwater Sampling Interval and Concentrations, in µg/L (08/29-31/07)

N/R No Recovery

= Fine-Grained Soils

= Coarse-Grained Soils

= Fill (Tank Pit)

Scale (ft)

0 10 20

FIGURE

3

Shell-branded Service Station

1784 150th Avenue

San Leandro, California

CONESTOGA-ROVERS & ASSOCIATES

I:\SONOMA.SHELL\SAN LEANDRO 1784 150th\FIGURES\X-SECT A-A'.DWG

12/17/07

Geologic Cross Section C-C'

C Southwest — Northeast C'

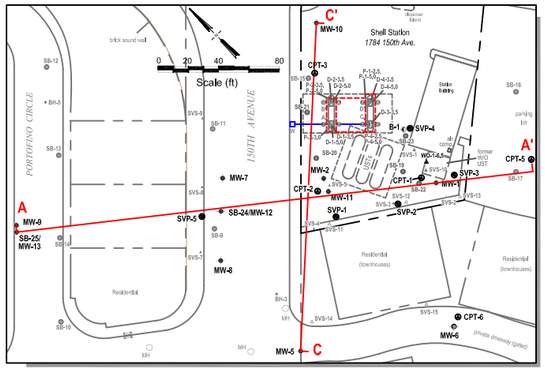
MW-5 41.46' | SVS-14 NS (6'NW) | SVS-11 NS (15'NW) | CPT-2 NS (6'NW) | MW-11 45.58' (13'NW) | MW-2 45.79' (10'NW) | SB-20 NS (4'NW) | SB-21 NS (3'SE) | SB-15 NS (4'SE) | CPT-3 NS | MW-10 50.64'

PRIVATE DRIVEWAY

PL

Elevation, in feet above mean sea level

Approximate depth in feet below grade



EXPLANATION

= Fine-Grained Soils

= Coarse-Grained Soils

Approximate Soil Sample Location

Interval of Discrete Soil Sample Results (Grouped for Clarity)

NA — Not analyzed

ND — TPHg, benzene, and MTBE all not detected

TPHg / Benzene / MTBE — Concentrations in Soil, in mg/kg; (MTBE analyzed by EPA Method 8020 in parentheses, all others by EPA Method 8260 or NA)

Well ID – Well Designation

Elev. — TOC Elevation, in feet above msl (NS = Not Surveyed)

(offset) — Offset distance and direction to cross-section line

Groundwater Monitoring Well or Soil Boring

Well Screen Interval

Bottom of boring

TPHg / Benzene / MTBE — Concentrations in Groundwater, in µg/L (09/11/07)

Depth of Groundwater (09/11/07)

Inferred Potentiometric Surface

Grab Groundwater Sample Depth

(6/26/00) — Depth and Date of First Encountered Groundwater

CPT Groundwater Sampling Interval and Concentrations, in µg/L (08/29-31/07)

N/R — No Recovery

Scale (ft) 0 10 20

FIGURE 4

Shell-branded Service Station
1784 150th Avenue
San Leandro, California

CONESTOGA-ROVERS & ASSOCIATES

I:\SONOMA.SHELL\SAN LEANDRO 1784 150th\FIGURES\X-SECT C-C'.DWG

11/08/07

Soil and Grab Groundwater Data Map

August 28-31, and September 14, 2007

EXPLANATION

- CPT-1 — CPT location (CRA, 8/29-30/07)
- B-1 — Soil boring location (CRA, 9/14/07)
- SVP-1 — Soil vapor probe location (CRA, 8/28/07)
- WO-1-6.5 — Soil sample location (Cambria, 5/25/06)
- S-19 — Soil boring location (Cambria, 5/23-25/06)
- MW-4 — Monitoring well location
- MW-6 — Monitoring well location
- D-1-5.0 — Soil sample location (Cambria, 04/05/05)
- D-1-3.5 — Soil sample location (Cambria, 03/22/05)
- SB-17 — Soil boring location (Cambria, 9/04)
- SB-10 — Soil boring location (Cambria, 6/03)
- SB-9 — Soil boring location (Cambria, 10/02)
- SVS-11 — Soil boring location (Cambria, 11/98)
- SVS-1 — Soil boring location (Cambria, 7/96)
- BH-7 — Soil boring location (Weiss, 3/95)
- A — Dispenser soil sample location (Weiss, 3/95)
- BH-1 — Soil boring location (Weiss, 6/94)
- 1 — Dispenser number
- Product piping

SB-1: SOIL (mg/kg)			
Depth	TPHg	Benz.	MTBE

Soil Sample ID

Soil sample depth and TPHg, benzene, and MTBE concentrations in soil, in mg/kg

SB-1: WATER (µg/L)			
Depth	TPHg	Benz.	MTBE

Grab groundwater sample depth and TPHg, benzene, and MTBE concentrations, in µg/L

I:\SONOMA-SHELL\SAN LEANDRO 1784 150TH\FIGURES\GRAB GW-SOIL 8-07.DWG

I-580

I-580 OFF-RAMP

FREEDOM AVENUE

PORTOFINO CIRCLE

PORTOFINO DRIVE

150TH AVENUE

BH-1 located 215' SE

BH-6 located 360' SE

BH-4

BH-2

BH-5

Shell Station
1784 150th Ave.

Former Dispenser Island

Station Building

parking lot

Denny's Restaurant
15015 Freedom Ave.

brick sound wall

SB-12

SB-13

SB-14

SB-15

SB-18

SB-21

SB-23

SB-20

SB-19

SB-22

SB-17

SB-9

SB-10

SB-16

SVS-1

SVS-2

SVS-3

SVS-4

SVS-5

SVS-6

SVS-7

SVS-8

SVS-9

SVS-10

SVS-11

SVS-12

SVS-13

SVS-14

SVS-15

SVS-16

MW-1

MW-2

MW-3

MW-4

MW-5

MW-6

MW-7

MW-8

MW-9

MW-10

MW-11

SB-24/
MW-12

SB-25/
MW-13

SVP-1

SVP-2

SVP-3

SVP-4

SVP-5

CPT-1

CPT-2

CPT-3

CPT-5

CPT-6

B-1

BH-3

BH-7

BH-8

BH-9

MH

USTs

air comp.

Former W/O UST

Residential

Residential (Townhouses)

Private (Gated Driveway)

(Townhouses)

CPT-3: WATER (µg/L)			
Depth	TPHg	Benz.	MTBE
23-27'	**3,600**	0.94	35
49-53'	<50	1.5	<1.0
69-73'	<50	0.42	<1.0

B-1: SOIL (mg/kg)			
Depth	TPHg	Benz.	MTBE
5'	55	<0.12	<0.12
10'	24	0.28	<0.0050
15'	6.6	0.038	<0.0050
17'	160	<0.12	<0.12
20'	**550**	<0.62	<0.62
25'	310	0.38	<0.12
29.5'	**1,100**	**4.1**	<0.62

SVP-4: SOIL (mg/kg)			
Depth	TPHg	Benz.	MTBE
4.5'	150	<0.12	<0.12

CPT-5: WATER (µg/L)			
Depth	TPHg	Benz.	MTBE
41-45'	<50	0.88	<1.0
54-58'	<50	<0.50	<1.0
70-74'	<50	<0.50	<1.0

SVP-3: SOIL (mg/kg)			
Depth	TPHg	Benz.	MTBE
4.5'	<0.50	<0.0050	<0.0050

CPT-1: WATER (µg/L)			
Depth	TPHg	Benz.	MTBE
41-45'	**650**	27	1,100
54-58'	<50	8.0	120
70-74'	<50	4.1	2.1

SVP-2: SOIL (mg/kg)			
Depth	TPHg	Benz.	MTBE
4.5'	<0.50	<0.0050	<0.0050

SVP-1: SOIL (mg/kg)			
Depth	TPHg	Benz.	MTBE
4.5'	<0.50	<0.0050	<0.0050

CPT-6: WATER (µg/L)			
Depth	TPHg	Benz.	MTBE
40-44'	<50	<0.50	<1.0
70-74'	<50	<0.50	20

SVP-5: SOIL (mg/kg)			
Depth	TPHg	Benz.	MTBE
4.5'	<0.50	<0.0050	<0.0050

CPT-2: WATER (µg/L)			
Depth	TPHg	Benz.	MTBE
35-39'	310	41	54
53-57'	<50	1.5	2.1
68-72'	<50	5.3	0.63

0 20 40 80

Scale (ft)

FIGURE

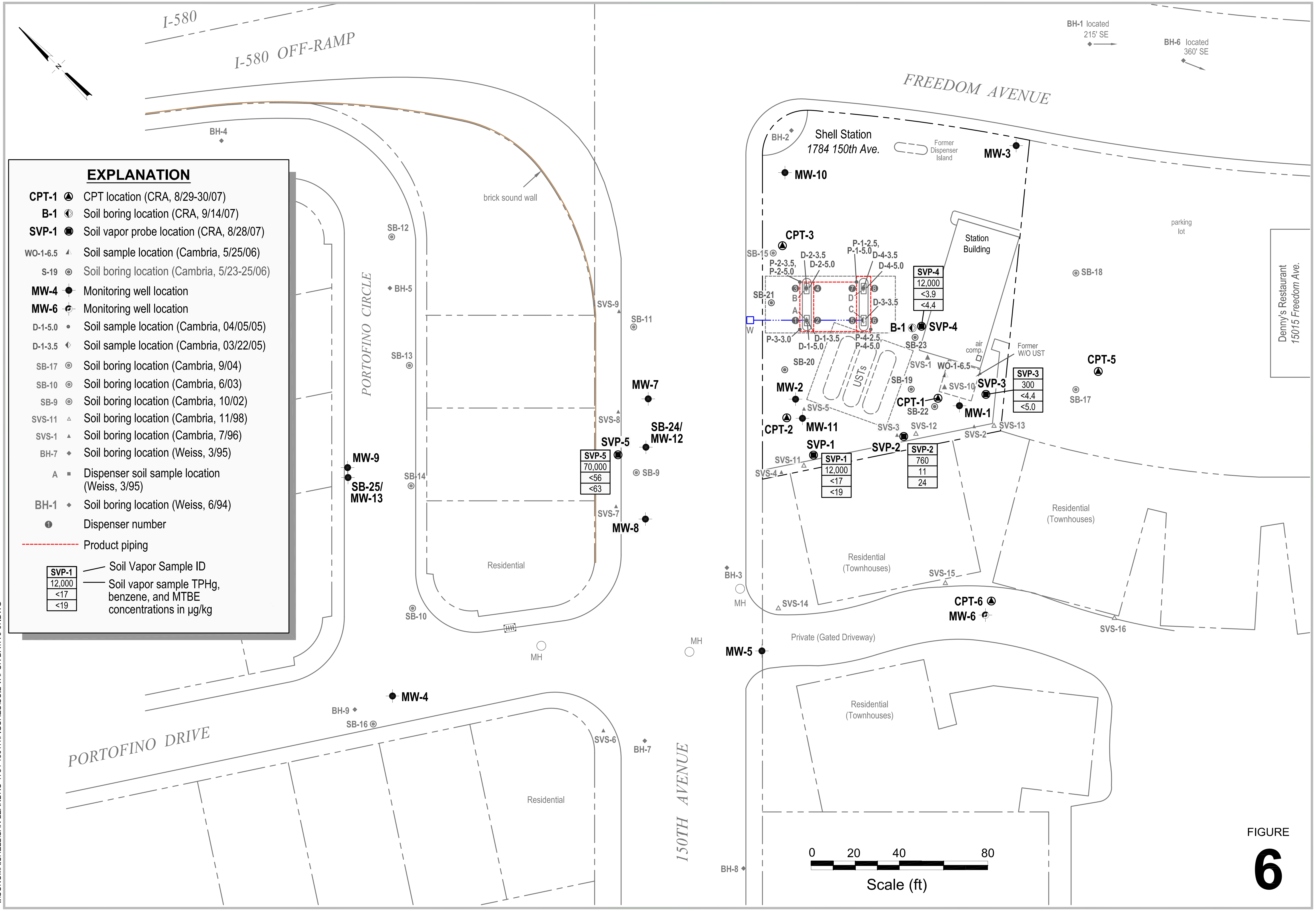
5

CONESTOGA-ROVERS & ASSOCIATES

Shell-branded Service Station

1784 150th Avenue

San Leandro, California



11/13/07
I-580
I-580 OFF-RAMP
FREEDOM AVENUE
PORTOFINO CIRCLE
PORTOFINO DRIVE
150TH AVENUE
Shell Station
1784 150th Ave.
Former Dispenser Island
Station Building
USTs
brick sound wall
parking lot
Denny's Restaurant 15015 Freedom Ave.
Residential
Residential (Townhouses)
Private (Gated Driveway)
BH-1 located 215' SE
BH-6 located 360' SE
Former W/O UST
air comp.
EXPLANATION
CPT-1 CPT location (CRA, 8/29-30/07)
B-1 Soil boring location (CRA, 9/14/07)
SVP-1 Soil vapor probe location (CRA, 8/28/07)
WO-1-6.5 Soil sample location (Cambria, 5/25/06)
S-19 Soil boring location (Cambria, 5/23-25/06)
MW-4 Monitoring well location
MW-6 Monitoring well location
D-1-5.0 Soil sample location (Cambria, 04/05/05)
D-1-3.5 Soil sample location (Cambria, 03/22/05)
SB-17 Soil boring location (Cambria, 9/04)
SB-10 Soil boring location (Cambria, 6/03)
SB-9 Soil boring location (Cambria, 10/02)
SVS-11 Soil boring location (Cambria, 11/98)
SVS-1 Soil boring location (Cambria, 7/96)
BH-7 Soil boring location (Weiss, 3/95)
A Dispenser soil sample location (Weiss, 3/95)
BH-1 Soil boring location (Weiss, 6/94)
Dispenser number
Product piping
SVP-1 12,000 <17 <19
Soil Vapor Sample ID
Soil vapor sample TPHg, benzene, and MTBE concentrations in μg/kg
SVP-1 12,000 <17 <19
SVP-2 760 11 24
SVP-3 300 <4.4 <5.0
SVP-4 12,000 <3.9 <4.4
SVP-5 70,000 <56 <63
CPT-2
CPT-3
CPT-5
CPT-6
B-1
MW-1
MW-2
MW-3
MW-4
MW-5
MW-6
MW-7
MW-8
MW-9
MW-10
MW-11
SB-24/ MW-12
SB-25/ MW-13
SB-9
SB-10
SB-11
SB-12
SB-13
SB-14
SB-15
SB-16
SB-17
SB-18
SB-19
SB-20
SB-21
SB-22
SB-23
SVS-1
SVS-2
SVS-3
SVS-4
SVS-5
SVS-6
SVS-7
SVS-8
SVS-9
SVS-10
SVS-11
SVS-12
SVS-13
SVS-14
SVS-15
SVS-16
BH-2
BH-3
BH-4
BH-5
BH-7
BH-8
BH-9
WO-1-6.5
P-1-2.5, P-1-5.0
P-2-3.5, P-2-5.0
P-3-3.0
P-4-2.5, P-4-5.0
D-1-3.5
D-1-5.0
D-2-3.5
D-2-5.0
D-3-3.5
D-4-3.5
D-4-5.0
MH
W
0 20 40 80
Scale (ft)

FIGURE
6

Soil Vapor Data Map

September 25, 2007

Shell-branded Service Station

1784 150th Avenue
San Leandro, California

CONESTOGA-ROVERS & ASSOCIATES

I:\SONOMA.SHELL\SAN LEANDRO 1784 150TH\FIGURES\SOIL VAPOR DATA 9-07.DWG

Table 1. Soil Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th St., San Leandro, California

Sample ID	Date	Depth (fbg)	TPHg	Benzene	Toluene	Ethyl-benzene	Xylenes	MTBE	TBA	ETBE	DIPE	TAME	1,2-DCA	EDB
			← (Concentrations in mg/kg) →											
SVP-1-4.5'	8/28/2007	4.5	<0.50	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050	<0.050	<0.010	<0.010	<0.010	<0.0050	<0.0050
SVP-2-4.5'	8/28/2007	4.5	<0.50	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050	<0.050	<0.010	<0.010	<0.010	<0.0050	<0.0050
SVP-3-4.5'	8/28/2007	4.5	<0.50	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050	<0.050	<0.010	<0.010	<0.010	<0.0050	<0.0050
SVP-4-4.5'	8/28/2007	4.5	150 [a]	<0.12	0.24	3.8	12.13	<0.12	<12	<0.25	<0.25	<0.25	<0.12	<0.12
SVP-5-4.5'	8/28/2007	4.5	<0.50	<0.0050	<0.0050	<0.0050	<0.0050	<0.0050	<0.050	<0.010	<0.010	<0.010	<0.0050	<0.0050
B-1-5	9/14/2007	5	55	<0.12	<0.12	0.27	1.0	<0.12	---	---	---	---	<0.12	<0.12
B-1-10	9/14/2007	10	24	0.28	0.0094	0.13	0.1156	<0.0050	---	---	---	---	<0.0050	<0.0050
B-1-15	9/14/2007	15	6.6	0.038	<0.0050	0.17	0.19	<0.0050	---	---	---	---	<0.0050	<0.0050
B-1-17	9/14/2007	17	160	<0.12	<0.12	1.7	6.53	<0.12	---	---	---	---	<0.12	<0.12
B-1-20	9/14/2007	20	550	<0.62	<0.62	6.0	30.6	<0.62	---	---	---	---	<0.62	<0.62
B-1-25	9/14/2007	25	310	0.38	<0.12	3.5	11.8	<0.12	---	---	---	---	<0.12	<0.12
B-1-29.5	9/14/2007	29.5	1,100	4.1	15	19	112	<0.62	---	---	---	---	<0.62	<0.62
Shallow Soil (≤10 fbg) ESL [b]:			**450**	**0.12**	**29**	**33**	**31**	**8.4**	**100**	**NA**	**NA**	**NA**	**NA**	**0.019**
Deep Soil (>10 fbg) ESL [b]:			**4,200**	**11**	**29**	**33**	**420**	**8.4**	**310**	**NA**	**NA**	**NA**	**NA**	**1.0**

Abbreviations:

TPHg = Total petroleum hydrocarbons as gasoline analyzed by EPA Method 8260B.
Benzene, toluene, ethylbenzene, and total xylenes analyzed by EPA Method 8260B.
MTBE = Methyl tert-butyl ether analyzed by EPA Method 8260.
TBA = Tert-Butyl alcohol, analyzed by EPA Method 8260B.
ETBE = Ethyl tert butyl ether, analyzed by EPA Method 8260B.
DIPE = Di-isopropyl Ether, analyzed by EPA Method 8260B.
TAME = tert-Amyl methyl ether, analyzed by EPA Method 8260B.
1,2-DCA = 1,2-dichloroethane
EDB = Ethyl di-bromide, analyzed by EPA Method 8260B.

Table 1. Soil Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th St., San Leandro, California

fbg = Feet below grade
mg/kg = Milligrams per kilogram
<n = Below laboratory detection limit of **n** mg/kg
--- = Not analyzed

a = The sample chromatographic pattern for TPH does not match the chromatographic pattern of the specified standard. Quantification of the unknown hydrocarbon(s) in the sample was based upon the specified standard.
b = San Francisco Bay Regional Water Quality Control Board residential Environmental Screening Level for soil where groundwater is not a source of drinking water; November 2007 edition.

Table 2. Grab Groundwater Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th Avenue, San Leandro, California

Sample ID	Sample Date	Depth (fbg)	TPHg	Benzene	Toluene	Ethyl-benzene	Total Xylenes	MTBE	TBA	DIPE	ETBE	TAME	1,2 DCA	EDB
			←						(mg/L)					→
CPT-1-26'-30'	8/30/2007	26-30	No sample due to no recovery of groundwater after 20 - 60 minutes wait.											
CPT-1-41'-45'	8/30/2007	41-45	650	27	4.3	14	43.4	1,100	430	2.0	<2.0	<2.0	92	<1.0
CPT-1-54'-58'	8/31/2007	54-58	<50 [a]	8.0	0.64 [b]	2.6	5.39 [b]	120	<10	<2.0	<2.0	<2.0	97	<1.0
CPT-1-70'-74'	8/31/2007	70-74	<50	4.1	0.62 [b]	1.0	1.97 [b]	2.1	<10	<2.0	<2.0	<2.0	<0.50	<1.0
CPT-2-22'-25'	8/29/2007	22-25	No sample due to no recovery of groundwater after 20 - 60 minutes wait.											
CPT-2-35'-39'	8/29/2007	35-39	310	41	4.7	12	50	54	<10	<2.0	<2.0	<2.0	11	<1.0
CPT-2-53'-57'	8/29/2007	53-57	<50	1.5	0.83 [b]	1.1	4.7	2.1	<10	<2.0	<2.0	<2.0	13	<1.0
CPT-2-68'-72'	8/29/2007	68-72	<50	5.3	1.8	4.2	16.3	0.63 [b]	<10	<2.0	<2.0	<2.0	<0.50	<1.0
CPT-3-23'-27'	8/28/2007	23-27	3,600	0.94	0.32 [b]	18	8.8	35	11	<2.0	<2.0	<2.0	8.2	<1.0
CPT-3-49'-53'	8/29/2007	49-53	<50	1.5	0.51 [b]	0.43 [b]	<1.0	<1.0	<10	<2.0	<2.0	<2.0	<0.50	<1.0
CPT-3-69'-73'	8/29/2007	69-73	<50	0.42 [b]	<1.0	<1.0	<1.0	<1.0	<10	<2.0	<2.0	<2.0	<0.50	<1.0
(CPT-4) B-1	9/14/2007	26-30	No sample due to no recovery of groundwater after 20 - 60 minutes wait.											
CPT-5-28'-32'	8/30/2007	28-32	No sample due to no recovery of groundwater after 20 - 60 minutes wait.											
CPT-5-41'-45'	8/30/2007	41-45	<50	0.88	0.34 [b]	<1.0	<1.0	<1.0	<10	<2.0	<2.0	<2.0	<0.50	<1.0
CPT-5-54'-58'	8/31/2007	54-57	<50	<0.50	<1.0	<1.0	<1.0	<1.0	<10	<2.0	<2.0	<2.0	6.6	<1.0
CPT-5-70'-74'	8/31/2007	70-74	<50	<0.50	<1.0	<1.0	<1.0	<1.0	<10	<2.0	<2.0	<2.0	<0.50	<1.0
CPT-6-21'-25'	8/30/2007	21-25	No sample due to no recovery of groundwater after 20 - 60 minutes wait.											
CPT-6-26'-30'	8/30/2007	26-30	No sample due to no recovery of groundwater after 20 - 60 minutes wait.											
CPT-6-40'-44'	8/30/2007	40-44	<50	<0.50	<1.0	<1.0	<1.0	<1.0	<10	<2.0	<2.0	<2.0	<0.50	<1.0
CPT-6-52'-56'	8/30/2007	52-56	No sample due to no recovery of groundwater after 20 - 60 minutes wait.											
CPT-6-70'-74'	8/30/2007	70-74	<50	<0.50	<1.0	<1.0	<1.0	20	<10	<2.0	<2.0	<2.0	15	<1.0
Groundwater ESL [c]:			**5,000**	**540**	**400**	**300**	**5,300**	**1,800**	**5,000**	**NA**	**NA**	**NA**	**200**	**150**

Table 2. Grab Groundwater Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th Avenue, San Leandro, California

Abbreviations and Notes:

TPHg = Total petroleum hydrocarbons as gasoline by EPA Method 8260B.
Benzene, toluene, ethylbenzene and total xylenes by EPA Method 8260B.
MTBE = Methyl tertiary butyl ether by EPA Method 8260B.
TBA = Tert-Butyl alcohol, analyzed by EPA Method 8260B
ETBE = Ethyl tert butyl ether, analyzed by EPA Method 8260B
DIPE = Di-isopropyl Ether, analyzed by EPA Method 8260B
TAME = Tert-Amyl methyl ether, analyzed by EPA Method 8260B
1,2-DCA = 1,2-dichloroethane
EDB = Ethyl di-bromide, analyzed by EPA Method 8260B
Ethanol analyzed by EPA Method 8260B
ppb = Parts per billion

a = The sample chromatographic pattern for TPH does not match the chromatographic pattern of the specified standard. Quantification of the unknown hydrocarbon(s) in the sample was based upon the specified standard.
b = Analyte was detected at a concentration below the reporting limit and above the laboratory method detection limit. Reported value is estimated.
c = San Francisco Bay Regional Water Quality Control Board Environmental Screening Level (November 2007 edition) where groundwater is not a source of drinking water

Table 3. Soil Vapor Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th Avenue, San Leandro, California

Sample ID	Sample Date	TPHg µg/m³	Benzene µg/m³	Toluene µg/m³	Ethylbenzene µg/m³	Total Xylenes µg/m³	MTBE µg/m³	Butane [a] µg/m³	Isobutane [a] µg/m³	Propane [a] µg/m³
SVP-1	9/25/2007	**12,000**	<17	7,000	120	296	<19	66.56	ND	ND
SVP-2	9/25/2007	760	11	90	14	56	24	ND	ND	ND
SVP-3	9/25/2007	300	<4.4	<5.2	<6.0	<6.0	<5.0	ND	ND	ND
SVP-3 DUP	9/25/2007	<260	<4.1	<4.9	<5.6	<5.6	<4.6	ND	ND	ND
SVP-4	9/25/2007	**12,000**	<3.9	13	6.3	31	<4.4	713.13	ND	ND
SVP-5	9/25/2007	**70,000**	<56	<66	<76	<76	<63	ND	ND	ND
Residential Land Use ESLs [b]:		**10,000**	**84**	**63,000**	**210,000**	**21,000**	**9,400**	**Concentration in the tracer gas [c]**		
Commercial/Industrial Land Use ESLs [b]:		**29,000**	**280**	**180,000**	**580,000**	**58,000**	**31,000**	**11,410**	**356,000**	**72,130**

Abbreviations and Notes:

TPHg = Total petroleum hydrocarbons as gasoline by modified EPA Method TO-3 GC/FID
Benzene, toluene, ethylbenzene and total xylenes by modified EPA Method TO-15 GC/FID Full Scan
MTBE = Methyl tertiary butyl ether by modified EPA Method TO-15 GC/FID Full Scan
Butane, isobutane, and propane by modified EPA Method TO-15 GC/FID Full Scan, tentatively identified compounds (TIC)
µg/m³ = Micrograms per cubic meter
<x =Compound not reported at, or above, reporting limit x
ND = Not detected; since TIC, no reporting limit provided
ESL = Environmental screening level from SFBRWQCB November 2007 edition

a = Tentatively identified compounds (TICs); detected quantities estimated by laboratory.
b = San Francisco Bay RWQCB ESLs for shallow soil gas (November 2007 edition, Table E)
c = Tracer gas compound (shaving cream) previously sampled for trace compounds.

Attachment A

Site History

ATTACHMENT A

Site History
Shell-branded Service Station
1784 150th Avenue
San Leandro, California
SAP Code 135963, Incident # 98996068
ACEH File No. RO0000367

PREVIOUS WORK

1986 Waste Oil Tank Removal: According to an October 13, 1989 letter from Weiss Associates (Weiss) of Emeryville, California to Shell, Petroleum Engineering of Santa Rosa, California removed a 550-gallon waste-oil tank from the site in November 1986). Immediately following the tank removal, Blaine Tech Services, Inc. (Blaine) of San Jose, California collected soil samples (Soil #1 and Soil #2) beneath the former tank at 8 and 11 feet below grade (fbg). Soil #1 and Soil #2 contained petroleum oil and grease at 196 and 167 parts per million (ppm), respectively. The tank pit was over-excavated to a total depth of 16 fbg, but no additional soil samples were reportedly collected. Groundwater was not encountered in the tank excavation. A new 550-gallon fiberglass waste-oil tank was installed in the same location. Table 1 includes historical soil analytical results.

1990 Well Installation: In March 1990, Weiss advanced soil boring BH-A, which was converted to groundwater monitoring well MW-1, adjacent to the waste-oil tank (Figure 2). In a soil sample collected at 29 fbg, 35 ppm total petroleum hydrocarbons as gasoline (TPHg) and 0.23 ppm benzene were detected.

1992 Well Installations: In February 1992, Weiss advanced soil borings BH-B and BH-C, which were converted to monitoring wells MW-2 and MW-3. A soil sample collected near the water table from the boring for well MW-2 (21.5 fbg) contained 79 ppm TPHg. Soil samples from boring BH-C, which is located over 100 feet cross-gradient of the tanks, contained up to 68 ppm TPHg at 31.5 fbg.

1992 Well Survey: In 1992, Weiss reviewed the California Department of Water Resources (DWR) and Alameda County records to identify water wells within a ½-mile radius of the site. A total of 21 wells were identified: 12 monitoring wells, 8 irrigation wells and 1 domestic well. No municipal wells were identified. The 8 irrigation wells and 1 domestic well are more than 1,000 feet from the site.

1994 Subsurface Investigation: In June 1994, Weiss advanced six soil borings (BH-1 through BH-6) on and off site. No hydrocarbons were detected in soil samples from any borings, except for 0.013 ppm benzene in boring BH-3 at 16 fbg. No hydrocarbons were detected in grab groundwater samples from borings BH-1, BH-4, BH-5 and BH-6. The maximum concentrations of 120,000 parts per billion (ppb) TPHg and 25,000 ppb benzene were detected in the grab groundwater sample collected from boring BH-3. Table 2 presents historical grab groundwater analytical results.

1995 Well Installation: In February and March 1995, Weiss advanced four soil borings (BH-7 through BH-10) and converted BH-10 to monitoring well MW-4. No petroleum hydrocarbons were detected in any of the soil samples. Up to 100 ppb TPHg and 1.0 ppb benzene were detected in grab groundwater samples from BH-7 and BH-9. No TPHg or benzene was detected in the grab groundwater sample from BH-10. Groundwater was not encountered in soil boring BH-8.

1996 Soil Vapor Survey and Soil Sampling: In July 1996, Weiss conducted a subsurface investigation to obtain site-specific data for a risk-based corrective action (RBCA) evaluation of the site. Soil vapor and soil samples were collected from the vadose zone at 10 on- and off-site locations (SVS-1 through SVS-10). The highest soil vapor hydrocarbon concentrations were detected near the northwest corner of the UST complex (sample SVS-5 at 3.0 fbg, which contained 7,600 parts per million by volume [ppmv] benzene). No TPHg, benzene, toluene, ethylbenzene, and xylenes (BTEX), or methyl tertiary-butyl ether (MTBE) was detected in any of the soil samples except for 1.1 ppm TPHg detected in sample SVS-5 at 18 to 20 fbg. Weiss concluded that depleted oxygen concentrations and elevated carbon dioxide and methane concentrations in the vadose zone indicated that biodegradation was occurring.

1997 RBCA Evaluation: In 1997, Weiss prepared a RBCA evaluation for the site. RBCA analysis results indicated that BTEX, MTBE, 1,2-dichloroethane, and tetrachloroethylene concentrations detected in soil and groundwater beneath the site did not exceed a target risk level of 10^{-5} for residential indoor or outdoor air exposure pathways. However, a risk threshold exceedance was identified associated with ingestion of groundwater from a hypothetical well 25 feet downgradient of the source.

1997 Dispenser and Turbine Sump Upgrade: The dispensers and turbine sumps at the station were upgraded in December 1997. Cambria collected soil samples Disp-A through Disp-D from beneath the dispenser islands during upgrade activities. Up to 590 ppm TPHg (Disp-C at 4.5 fbg), 1.8 ppm benzene (Disp-C at 2.0 fbg) and 1.4 ppm MTBE (Disp-C at 2.0 fbg) were detected.

1998 Soil Vapor Survey and Soil Sampling: In November 1998, Cambria conducted a subsurface investigation to obtain site-specific data for an updated RBCA evaluation of the site. Soil samples, soil vapor samples, and grab groundwater samples were collected from the vadose zone at three on-site and three off-site locations (SVS-11 through SVS-16). In soil vapor, maximum concentrations of 2.7 ppmv TPHg (C5+ hydrocarbons) and 0.17 ppmv TPHg (C2-C4 hydrocarbons) were detected at 10 fbg in borings SVS-14 and SVS-15, respectively. A maximum concentration of 0.0099 ppmv benzene was detected in SVS-16 at 5 fbg. In soil, 1.6 ppm TPHg and 0.0050 ppm benzene were detected in boring SVS-11 at 19.5 fbg. No TPHg or benzene was detected in any other soil samples. MTBE was reported at 0.029 ppm in boring SVS-14 at 19 fbg using EPA Method 8020; however, MTBE was not detected in this sample using EPA Method 8260. TPHg and benzene were detected using EPA Method 8020 in groundwater from borings SVS-11 and SVS-12 at concentrations up to 130,000 ppb TPHg and 18,000 ppb benzene. MTBE was reported at a concentration of 1,500 ppb in boring SVS-11 by EPA Method 8020, but was not confirmed by EPA Method 8260.

1999 RBCA Evaluation: In September 1999, Cambria prepared a RBCA evaluation for the site. Cambria analyzed the following potential exposure pathways: off-site ingestion of groundwater, on-site ingestion of surficial soil, volatilization of benzene from soil or groundwater into on-site or off-site indoor air, and migration of benzene soil vapor to on-site or off-site outdoor air. Results of Tier 1 and Tier 2 RBCA analyses indicated that contaminants within soil and groundwater did not present significant health risks.

2001 Off-Site Monitoring Well Installation: Two monitoring wells (MW-5 and MW-6) were installed off site to the southwest. Soil sample results from this investigation indicated only minimal MTBE impact (0.012 ppm) to off-site soil southwest of the site. This finding was corroborated by Cambria's 1998 subsurface investigation, in which no TPHg or benzene and only low MTBE concentrations were detected in soil from three borings (SVS-14 through SVS-16) along the private driveway.

2002-2004 Mobile Groundwater Extraction (GWE): In July 2002, semi-monthly GWE was begun using monitoring well MW-2, and it continued on a monthly basis until March 2004. Beginning in March 2004, monthly GWE was performed using well MW-2 and MW-11 once per month each, so that GWE was conducted twice per month at the site. The GWE frequency was increased to weekly (from both MW-2 and MW-11) beginning in May 2004. Mobile GWE ceased on August 24, 2004. Approximately 19.6 pounds of TPHg, 3.45 pounds of benzene, and 5.12 pounds of MTBE had been removed during these activities.

2002 Off-Site Monitoring Well Installation: Two monitoring wells (MW-7 and MW-8) and one soil boring (SB-9) were installed off-site and northwest of the site in 150th Avenue. Soil sample results collected during this investigation indicated minimal TPHg and BTEX impact to off-site soil northwest of the site. Grab groundwater samples indicated elevated TPHg and benzene concentrations were present in groundwater northwest of the site beneath 150th Avenue.

2003 Soil and Groundwater Investigation: Six soil borings (SB-10 through SB-14 and SB-16) were advanced to the northwest of the site in both 150th Avenue and Portofino Circle; one boring (SB-15) was advanced on site (Figure 2). Initial groundwater was encountered between 24 and 28 fbg during drilling activities. During the investigation, MTBE was only detected in on-site grab groundwater sample SB-15-W at 40 ppb. The highest TPHg concentration was detected in SB-14-W at 67,000 ppb, and the highest benzene concentration was detected in SB-15-W at 530 ppb. TPHg was detected only in soil samples SB-11-30' and SB-15-36' at concentrations of 650 ppm and 1.4 ppm, respectively. Benzene was detected only in soil sample SB-15-35' at 0.10 ppm. Based on typical groundwater depths in nearby well MW-7, it was determined that samples SB-11-30' and SB-15-36' were saturated, and results may be more indicative of chemical concentrations in groundwater.

2003 Sensitive Receptor Survey (SRS): In October 2003, Cambria completed an SRS at Shell's request. The SRS targeted the following as potential sensitive receptors: basements within 200 feet, surface water and sensitive habitats within 500 feet, hospitals, residential care and childcare facilities within 1,000 feet, and water wells within ½ mile. No basements, surface water, sensitive habitats, or educational and childcare facilities were identified within the search radius. The Fairmont Hospital campus, located at 15400 Foothill Boulevard, is located approximately 1,100 feet from the site, just outside the target radius of 1,000 feet.

To update the 1992 well survey performed by Weiss, Cambria researched DWR records in September 2003 and located no additional well records for locations within ½ mile of the site. The closest identified water well potentially used for drinking water is a well installed in 1952 and listed as a "domestic well." This well is located at Fairmont Hospital, approximately 2,445 feet east-southeast of the site. The well is reportedly 138 feet deep and has a screened interval between 62 and 95 fbg. The well's status and operation frequency are unknown. Due to the well's distance from the site and the site's observed groundwater flow directions, it is unlikely that this well would be impacted by groundwater from the site.

2003 Monitoring Well Installation: On November 19 and 20, 2003, Cambria installed on-site and off-site wells MW-9, MW-10, and MW-11. Proposed off-site soil borings were not completed due to access agreement issues. MTBE was detected in two soil samples (MW-11-20'

and MW-11-24.5') at concentrations of 0.039 and 1.4 ppm, respectively. TPHg was detected in four soil samples (MW-10-30', MW-10-31.5', MW-11-20', and MW-11-24.5') at concentrations of 14, 230, 1.8, and 330 ppm, respectively. All soil samples with detectable hydrocarbon and MTBE concentrations were saturated soil samples, so identified results appeared more indicative of chemical concentrations in groundwater than soil.

September 2004 Off-Site Investigation: Two soil borings (SB-17 and SB-18) were installed southeast of the site. No TPHg, BTEX, or fuel oxygenates were detected in soil samples from the borings. Grab groundwater samples collected contained up to 55 ppb TPHg, and no benzene or fuel oxygenates. Results of the investigation are reported in Cambria's December 17, 2004 *Soil and Water Investigation Report*.

2004 Temporary GWE System Installation: On September 13, 2004, Cambria completed installation and began operation of a temporary GWE system. The temporary GWE system was installed as an interim remedial measure to address the elevated petroleum hydrocarbon and MTBE concentrations in groundwater near the west corner of the site. On November 8, 2004, Cambria stopped the temporary GWE system to conduct interim remediation by dual phase extraction (DPE). During these temporary GWE activities approximately 0.448 pounds of TPHg, 0.036 pounds of benzene, and 0.121 pounds of MTBE were removed from the subsurface.

2004 DPE: During the period November 8 through November 13, 2004, DPE was conducted in on-site wells MW-2 and MW-11 as an interim remedial action to reduce hydrocarbon concentrations in groundwater near the western corner of the site and to progress the site toward closure. Based on operating parameters and vapor sample analytical results, the total TPHg, benzene and MTBE vapor-phase masses removed from well MW-11 are estimated at 165 pounds, 0.291 pounds, and 0.063 pounds, respectively. The total TPHg, benzene, and MTBE vapor-phase masses removed from well MW-2 are estimated at 0.073 pounds, 0.0002 pounds, and 0.001 pounds, respectively. The total TPHg, benzene and MTBE liquid-phase masses removed from wells MW-2 and MW-11 during interim remediation are estimated at 5.31 pounds, 0.193 pounds, and 0.143 pounds, respectively.

2005 Temporary GWE System: Upon completing the interim remedial action, Cambria intended to immediately resume operating the temporary GWE system. However, the restart was delayed due to repaving the site's parking lot. The temporary GWE system operated between January 10 and April 13, 2005. Because detected TPHg and MTBE concentrations were higher in well MW-11 than in well MW-2, MW-11 was chosen for extraction. During these activities, approximately 19.04 pounds of TPHg, 1.69 pounds of benzene, and 3.94 pounds of MTBE were

removed from the subsurface. Because of facility upgrades work, Cambria removed the temporary GWE system between March and June 2005.

2005 Fuel System Upgrade: Under contract to Shell, Armer Norman of Pacheco, California replaced the fuel dispensers and piping and upgraded UST sumps between March and May 2005. On March 22 and April 4, 2005, soil samples were collected beneath each of the four dispensers and the product piping joints. TPHg was detected in 11 samples, with a maximum concentration of 4,100 ppm in sample P-4-5.0. Benzene was detected in six samples, with a maximum concentration of 11 ppm in sample P-4-2.5. MTBE was detected in five samples, with a maximum concentration of 0.18 ppm in sample D-1-3.5. Tertiary-butyl alcohol (TBA) was detected in sample D-3-3.5 at a concentration of 0.023 ppm. Lead was detected in four samples, with a maximum concentration of 75.7 ppm in sample D-1-3.5.

2005 Periodic GWE Restart: In September 2005, monthly GWE was re-instated using monitoring well MW-11, and because of the observed presence of SPH in well MW-1, bimonthly extraction from MW-1 was initiated in September 2006. These activities are ongoing as of December 2006 and are reported in the monitoring reports.

May 2006 Waste Oil Tank Removal: On May 25, 2006, Wayne Perry, Inc. (Wayne Perry) of Sacramento, California removed one 550-gallon, dual-wall fiberglass waste oil UST. Cambria collected one soil sample (WO-1-6.5) from the sidewall of the UST excavation at a depth of 6.5 fbg. The soil sample contained up to 45 parts per million (ppm) oil and grease, 4.3 ppm TPHd, 25.4 ppm chromium, 7.09 ppm lead, 19.0 ppm nickel, and 58.4 ppm zinc. Based on these concentrations, Shell submitted an Underground Storage Tank Unauthorized Release (Leak)/Site Contamination Report (Unauthorized Release Report) on June 6, 2006. All detections were below SFBRWQCB environmental screening levels for shallow soil (fewer than 3 meters below grade) where groundwater is a current or potential drinking water source for residential land use areas. Based on these results, no further investigation of waste oil constituents was conducted.

May 2006 Subsurface Investigation (SB-19 through SB-25; MW-12 & MW-13): The purpose of this investigation was to determine the vertical and horizontal extent of soil and groundwater impact. Seven soil borings were advanced, two of which were converted to groundwater monitoring wells. Shallow soil samples collected from borings SB-19, SB-20, SB-21, SB-22, and SB-24 did not contain TPHg or BTEX concentrations exceeding applicable published San Francisco Bay Regional Water Quality Control Board environmental screening levels (ESLs). Up to 1,060 ppm TPHg and 1.38 ppb benzene were detected in soil samples collected from the capillary fringe zone in borings SB-19, SB-20, SB-21, SB-23, and SB-24. These detections are considered to be more indicative of groundwater conditions. Fuel oxygenate concentrations were

near or below their respective reporting limits in all soil samples collected, and none of the low detections exceeded applicable ESLs. Based on this, the horizontal extent of petroleum hydrocarbons has been defined at the site, and the vertical extent has been defined to the typical groundwater table. TPHg, BTEX, and fuel oxygenate concentrations in grab groundwater samples collected from approximately 20 and 31 fbg in boring SB-25 were also near or below their respective reporting limits. None of the low detections in the grab groundwater samples collected exceed applicable ESLs. Based on this, the vertical extent of petroleum hydrocarbons in groundwater northwest of the site is defined.

February 2007 Agency Response with Proposed Future Actions: Cambria responded to ACEH's August 29, 2006 letter which requested updated cross-sections and discussion of other issues. Cambria provided revised cross-sections A-A' and C-C', a discussion of delineation of the extent of petroleum hydrocarbons in soil and groundwater, and a risk evaluation based on these delineations. In addition, Cambria proposed delineation of the vertical extent of petroleum hydrocarbons in groundwater and a shallow soil vapor investigation at the site.

Groundwater Monitoring Program: Groundwater quarterly groundwater sampling began in March 1990. Historically, the maximum concentrations of TPHg have been observed in well MW-1 (up to 790,000 ppb in June 1996); maximum concentrations of benzene have been observed in well MW-2 (up to 36,000 ppb in March 1993); and maximum concentrations of MTBE have been observed in well MW-2 (up to 32,000 ppb in February 2002). Separate phase hydrocarbons (SPH) have been observed intermittently in wells MW-1 and MW-2 historically. SPH re-occurred in well MW-1 in December 2005 and was present in each monitoring event through December 2006. As of the September 11, 2007 sample event no more SHP had been observed and the maximum dissolved phase concentrations of TPHg, benzene, and MTBE observed in onsite wells were 45,000 (MW-11), 8,100 (MW-1), and 5,700 (MW-1) ppb, respectively.

Table 1. Historical Soil Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th St., San Leandro, California

Sample ID	Date	Depth (fbg)	TPHg	Benzene	Toluene	Ethyl-benzene	Xylenes	MTBE (8020)	MTBE (8260)	TBA	ETBE	DIPE	TAME	1,2-DCA	EDB	Ethanol	TOG	Lead
			← (Concentrations in mg/kg) →															
1986 Waste Oil Tank Removal																		
Soil #1	11/7/1986	8	---	---	---	---	---	---	---	---	---	---	---	---	---	---	196	---
Soil #2	11/11/1986	11	---	---	---	---	---	---	---	---	---	---	---	---	---	---	167.4	---
1990 Monitoring Well Installation																		
MW-1/BH-A[a,b]	3/5/1990	5	<1	<0.0025	<0.0025	<0.0025	<0.0025	---	---	---	---	---	---	---	---	---	---	---
MW-1/BH-A[a,b]	3/5/1990	15.7	<1	<0.0025	<0.0025	<0.0025	<0.0025	---	---	---	---	---	---	---	---	---	---	---
MW-1/BH-A[a,b, c]	3/5/1990	24.7	<1	0.020	<0.0025	<0.0025	<0.0025	---	---	---	---	---	---	---	---	---	---	---
MW-1/BH-A[a,d]	3/5/1990	29.2	35	0.23	0.20	<0.0025	0.64	---	---	---	---	---	---	---	---	---	---	---
MW-1/BH-A[a,b]	3/5/1990	41.2	<1	<0.0025	<0.0025	<0.0025	<0.0025	---	---	---	---	---	---	---	---	---	---	---
1992 MonitoringWell Installations																		
MW-2/BH-B[b]	2/4/1992	11.5	<1	0.0026	<0.0025	<0.0025	<0.0025	---	---	---	---	---	---	---	---	---	---	---
MW-2/BH-B	2/4/1992	16.5	<1	0.0058	<0.0025	<0.0025	<0.0025	---	---	---	---	---	---	---	---	---	---	---
MW-2/BH-B[b,e]	2/4/1992	21.5	79	0.20	0.60	1.0	4.1	---	---	---	---	---	---	---	---	---	---	---
MW-2/BH-B	2/4/1992	26.5	74	**0.59**	0.91	1.5	3.9	---	---	---	---	---	---	---	---	---	---	---
MW-3/BH-C[b]	2/5/1992	11.5	<1	0.0042	0.0029	0.0039	<0.0025	---	---	---	---	---	---	---	---	---	---	---
MW-3/BH-C[b]	2/5/1992	21.5	<1	<0.0025	<0.0025	<0.0025	<0.0025	---	---	---	---	---	---	---	---	---	---	---
MW-3/BH-C[b,f]	2/5/1992	26.5	3.9	<0.0025	<0.0025	<0.0025	0.0054	---	---	---	---	---	---	---	---	---	---	---
MW-3/BH-C	2/5/1992	31.5	68	<0.05	<0.05	<0.05	0.17	---	---	---	---	---	---	---	---	---	---	---
1994 Subsurface Investigation																		
BH-1-21	6/6/1994	21	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	---	---	---	---	---	---	---	---	---	---
BH-2-20	6/6/1994	20	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	---	---	---	---	---	---	---	---	---	---
BH-3-16[g]	6/6/1994	16	<1.0	0.013	<0.0050	<0.0050	<0.0050	---	---	---	---	---	---	---	---	---	---	---
BH-4-20.6	6/7/1994	20.6	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	---	---	---	---	---	---	---	---	---	---
BH-5-15.6	6/7/1994	15.6	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	---	---	---	---	---	---	---	---	---	---
BH-6-20.5	6/7/1994	20.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	---	---	---	---	---	---	---	---	---	---
1995 Monitoring Well Installation																		
BH-7-15.8	2/14/1995	15.8	<1.0	<0.0025	<0.0025	<0.0025	<0.0025	---	---	---	---	---	---	---	---	---	---	---
BH-8-16.0	2/14/1995	16	<1.0	<0.0025	<0.0025	<0.0025	<0.0025	---	---	---	---	---	---	---	---	---	---	---
BH-9-19.5	2/14/1995	19.5	<1.0	<0.0025	<0.0025	<0.0025	<0.0025	---	---	---	---	---	---	---	---	---	---	---
MW-4/BH-10-15.2	3/3/1995	15.2	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	---	---	---	---	---	---	---	---	---	---
1996 Subsurface Investigation																		

Table 1. Historical Soil Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th St., San Leandro, California

Sample ID	Date	Depth (fbg)	TPHg	Benzene	Toluene	Ethyl-benzene	Xylenes	MTBE (8020)	MTBE (8260)	TBA	ETBE	DIPE	TAME	1,2-DCA	EDB	Ethanol	TOG	Lead
			(Concentrations in mg/kg)															
SVS-3	7/18-19/96	16-18	<1.0	<0.005	<0.005	<0.005	<0.005	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-5	7/18-19/96	4-6	<1.0	<0.005	<0.005	<0.005	<0.005	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-5	7/18-19/96	8-10	<1.0	<0.005	<0.005	<0.005	<0.005	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-5	7/18-19/96	18-20	1.1	<0.005	<0.005	<0.005	<0.005	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-9	7/18-19/96	3-5	<1.0	<0.005	<0.005	<0.005	<0.005	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-9	7/18-19/96	8-10	<1.0	<0.005	<0.005	<0.005	<0.005	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-9	7/18-19/96	16-18	<1.0	<0.005	<0.005	<0.005	<0.005	<0.025	---	---	---	---	---	---	---	---	---	---
1997 Dispenser and Turbine Pump Upgrades																		
Disp-A	12/4/1997	2	3.1	<0.005	0.037	0.022	<0.01	0.019	---	---	---	---	---	---	---	---	---	---
Disp-A, 4.5	12/4/1997	4.5	6.3	0.096	0.012	0.46	0.037	0.056	---	---	---	---	---	---	---	---	---	---
Disp-B	12/4/1997	2	130	<1	<1	<1	<2	<1	---	---	---	---	---	---	---	---	---	---
Disp-B, 4.5	12/4/1997	4.5	1.0	0.045	<0.005	0.064	0.32	<0.03	---	---	---	---	---	---	---	---	---	---
Disp-C	12/4/1997	2	190	**1.8**	2.1	3.6	**20**	1.4	---	---	---	---	---	---	---	---	---	---
Disp-C, 4.5[h]	12/4/1997	4.5	**590**	<0.5	0.98	2.3	3.1	<0.5	---	---	---	---	---	---	---	---	---	---
Disp-D	12/4/1997	2	3.8	0.11	<0.005	0.15	0.17	0.11	---	---	---	---	---	---	---	---	---	---
Disp-D, 4.5	12/4/1997	4.5	1.4	0.027	<0.005	0.036	0.178	0.005	---	---	---	---	---	---	---	---	---	---
1998 Subsurface Investigation																		
SVS-11-5.5	11/10/1998	5.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-11-6	11/10/1998	6	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-11-9.5	11/10/1998	9.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-11-10	11/10/1998	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
1998 Subsurface Investigation - cont.																		
SVS-11-15	11/10/1998	15	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-11-15.5	11/10/1998	15.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-11-19	11/10/1998	19	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-11-19.5	11/10/1998	19.5	1.6	0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-14-5	11/11/1998	5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-14-5.5	11/11/1998	5.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-14-10	11/11/1998	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-14-10.5	11/11/1998	10.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-14-15	11/11/1998	15	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-14-15.5	11/11/1998	15.5	<1.0	<0.0050	0.006	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-14-19	11/11/1998	19	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	0.029	<25	---	---	---	---	---	---	---	---	---
SVS-14-19.5	11/11/1998	19.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---

Table 1. Historical Soil Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th St., San Leandro, California

Sample ID	Date	Depth (fbg)	TPHg	Benzene	Toluene	Ethyl-benzene	Xylenes	MTBE (8020)	MTBE (8260)	TBA	ETBE	DIPE	TAME	1,2-DCA	EDB	Ethanol	TOG	Lead
			(Concentrations in mg/kg)															
SVS-15-4.5	11/11/1998	4.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-15-5	11/11/1998	5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-15-10	11/11/1998	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-15-10.5	11/11/1998	10.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-15-15	11/11/1998	15	<1.0	<0.0050	<0.0050	<0.0050	0.013	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-15-15.5	11/11/1998	15.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-15-19.5	11/11/1998	19.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-15-20	11/11/1998	20	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-16-5	11/11/1998	5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-16-5.5	11/11/1998	5.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-16-10	11/11/1998	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-16-10.5	11/11/1998	10.5	<1.0	<0.0050	<0.0050	<0.0050	0.0093	0.026	---	---	---	---	---	---	---	---	---	---
SVS-16-15	11/11/1998	15	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
SVS-16-15.5	11/11/1998	15.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	<0.025	---	---	---	---	---	---	---	---	---	---
2001 Monitoring Well Installation																		
MW-5-15.5	10/24/2001	15.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-6-5.5	10/24/2001	5.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	0.012	---	---	---	---	---	---	---	---	---
2002 Monitoring Well Installation																		
MW7@5'	10/3/2002	5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.5	---	---	---	---	---	---	---	---	---
MW7@10'	10/3/2002	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.5	---	---	---	---	---	---	---	---	---
MW7@15'	10/3/2002	15	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.5	---	---	---	---	---	---	---	---	---
MW7@20'	10/3/2002	20	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.5	---	---	---	---	---	---	---	---	---
MW7@25'	10/3/2002	25	11	<0.0050	0.0060	0.086	0.13	---	<0.5	---	---	---	---	---	---	---	---	---
MW7@30'	10/3/2002	30	68	<0.025	0.19	0.89	3.7	---	<0.5	---	---	---	---	---	---	---	---	---
MW7@32'	10/3/2002	32	1.2	<0.0050	0.0069	0.025	0.11	---	<0.5	---	---	---	---	---	---	---	---	---
MW8@5'	10/4/2002	5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.5	---	---	---	---	---	---	---	---	---
MW8@10'	10/4/2002	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.5	---	---	---	---	---	---	---	---	---
MW8@15'	10/4/2002	15	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.5	---	---	---	---	---	---	---	---	---
MW8@20'	10/4/2002	20	1.2	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.5	---	---	---	---	---	---	---	---	---
MW8@25'	10/4/2002	25	140	0.072	0.15	1.5	5.8	---	<0.5	---	---	---	---	---	---	---	---	---
SB9@22	10/4/2002	22	1.1	<0.0050	<0.0050	0.016	0.088	---	<0.5	---	---	---	---	---	---	---	---	---

Table 1. Historical Soil Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th St., San Leandro, California

Sample ID	Date	Depth (fbg)	TPHg	Benzene	Toluene	Ethyl-benzene	Xylenes	MTBE (8020)	MTBE (8260)	TBA	ETBE	DIPE	TAME	1,2-DCA	EDB	Ethanol	TOG	Lead
			(Concentrations in mg/kg)															
2003 Subsurface Investigation																		
SB-10-10'	6/23/2003	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-10-20'	6/23/2003	20	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-10-22'	6/23/2003	22	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-10-25'	6/23/2003	25	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-10-30	6/23/2003	30	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-10-37'	6/23/2003	37	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-10-39.5'	6/23/2003	39.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-11-10'	6/24/2003	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-11-15'	6/24/2003	15	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-11-20'	6/24/2003	20	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
2003 Subsurface Investigation - cont.																		
SB-11-24'	6/24/2003	24	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-11-28'	6/24/2003	28	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-11-30'	6/24/2003	30	**650**	<0.50	<0.50	3.5	9.9	---	<0.50	---	---	---	---	---	---	---	---	---
SB-12-10'	6/24/2003	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-12-20'	6/24/2003	20	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-12-25'	6/24/2003	25	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-12-30'	6/24/2003	30	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-12-35'	6/24/2003	35	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-12-39.5'	6/24/2003	39.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-13-10'	6/23/2003	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-13-20'	6/23/2003	20	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-13-24'	6/23/2003	24	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-13-30'	6/23/2003	30	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-13-35'	6/23/2003	35	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-13-39.5'	6/23/2003	39.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-14-10'	6/24/2003	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-14-20'	6/24/2003	20	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-14-24'	6/24/2003	24	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-14-30'	6/24/2003	30	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-14-35'	6/24/2003	35	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-14-39.5'	6/24/2003	39.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---

Table 1. Historical Soil Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th St., San Leandro, California

Sample ID	Date	Depth (fbg)	TPHg	Benzene	Toluene	Ethyl-benzene	Xylenes	MTBE (8020)	MTBE (8260)	TBA	ETBE	DIPE	TAME	1,2-DCA	EDB	Ethanol	TOG	Lead
			(Concentrations in mg/kg)															
SB-15-10'	6/26/2003	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-15-15'	6/26/2003	15	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-15-20'	6/26/2003	20	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-15-22.5'	6/26/2003	22.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-15-35'	6/26/2003	35	1.4	0.10	<0.0050	0.030	0.0055	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-16-10'	6/23/2003	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-16-20'	6/23/2003	20	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-16-24'	6/23/2003	24	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-16-28'	6/23/2003	28	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-16-35'	6/23/2003	35	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
SB-16-39.5'	6/23/2003	39.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
2003 Monitoring Well Installation																		
MW-9-5'	11/19/2003	5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-9-10'	11/19/2003	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-9-15'	11/19/2003	15	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-9-20'	11/19/2003	20	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-9-25'	11/19/2003	25	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-9-30'	11/19/2003	30	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-9-35'	11/19/2003	35	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-10-5'	11/20/2003	5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-10-10'	11/20/2003	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-10-15'	11/20/2003	15	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-10-20'	11/20/2003	20	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-10-25'	11/20/2003	25	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-10-30'	11/20/2003	30	14	<0.023	<0.023	<0.023	<0.023	---	<0.023	---	---	---	---	---	---	---	---	---
MW-10-31.5'	11/20/2003	31.5	230	<0.50	<0.50	2.2	1.5	---	<0.50	---	---	---	---	---	---	---	---	---
MW-11-5'	11/20/2003	5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-11-10'	11/20/2003	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-11-15'	11/20/2003	15	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	---	---	---	---	---	---	---	---	---
MW-11-20'	11/20/2003	20	1.8	<0.0050	<0.0050	0.0084	0.013	---	0.039	---	---	---	---	---	---	---	---	---
MW-11-24.5'	11/20/2003	24.5	330	<0.50	1.6	4.8	**29**	---	1.4	---	---	---	---	---	---	---	---	---
2004 Subsurface Investigation																		
SB-17-5'	9/13/2004	5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	<0.10	<0.0050	<0.10	<0.0050	<0.0050	<0.0050	<0.1	---	---
SB-17-10'	9/13/2004	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	<0.10	<0.0050	<0.10	<0.0050	<0.0050	<0.0050	<0.1	---	---

Table 1. Historical Soil Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th St., San Leandro, California

Sample ID	Date	Depth (fbg)	TPHg	Benzene	Toluene	Ethyl-benzene	Xylenes	MTBE (8020)	MTBE (8260)	TBA	ETBE	DIPE	TAME	1,2-DCA	EDB	Ethanol	TOG	Lead
			(Concentrations in mg/kg)															
SB-17-15'	9/13/2004	15	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	<0.10	<0.0050	<0.10	<0.0050	<0.0050	<0.0050	<0.1	---	---
SB-17-20'	9/13/2004	20	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	<0.10	<0.0050	<0.10	<0.0050	<0.0050	<0.0050	<0.1	---	---
SB-17-25'	9/13/2004	25	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	<0.10	<0.0050	<0.10	<0.0050	<0.0050	<0.0050	<0.1	---	---
SB-17-35.5'	9/13/2004	35.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	<0.10	<0.0050	<0.10	<0.0050	<0.0050	<0.0050	<0.1	---	---
SB-18-5'	9/13/2004	5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	<0.10	<0.0050	<0.10	<0.0050	<0.0050	<0.0050	<0.1	---	---
SB-18-10'	9/13/2004	10	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	<0.10	<0.0050	<0.10	<0.0050	<0.0050	<0.0050	<0.1	---	---
SB-18-15'	9/13/2004	15	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	<0.10	<0.0050	<0.10	<0.0050	<0.0050	<0.0050	<0.1	---	---
SB-18-20'	9/13/2004	20	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	<0.10	<0.0050	<0.10	<0.0050	<0.0050	<0.0050	<0.1	---	---
SB-18-25'	9/13/2004	25	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	<0.10	<0.0050	<0.10	<0.0050	<0.0050	<0.0050	<0.1	---	---
SB-18-30'	9/13/2004	30	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	<0.0050	<0.10	<0.0050	<0.10	<0.0050	<0.0050	<0.0050	<0.1	---	---
2005 Dispenser Upgrades																		
D-1-3.5	3/22/2005	3.5	**460**	**0.76**	0.17	16	8.1	---	0.18	<0.25	<0.050	<0.050	<0.050	<0.050	<0.050	---	---	75.7
D-1-5.0	4/4/2005	5	330	<0.50	0.75	3.2	0.91	---	<0.50	---	---	---	---	---	---	---	---	---
D-2-3.5	3/22/2005	3.5	**1,400**	**1.6**	**75**	18	**170**	---	0.066	<0.15	<0.25	<0.25	<0.25	<0.25	<0.25	---	---	2.06
D-2-5.0	4/4/2005	5	<50	<0.50	<0.50	<0.50	0.95	---	<0.50	---	---	---	---	---	---	---	---	---
D-3-3.5	3/22/2005	3.5	30	**0.78**	0.24	1.8	2.7	---	0.053	0.023	<0.050	<0.050	<0.050	<0.050	<0.050	---	---	5.19
D-4-3.5	3/22/2005	3.5	110	**0.52**	6.3	1.3	10	---	0.028	<0.25	<0.050	<0.050	<0.050	<0.050	<0.050	---	---	1.89
D-4-5.0	4/4/2005	5	290	<0.50	<0.50	6.3	3.6	---	<0.50	---	---	---	---	---	---	---	---	---
P-1-2.5	4/4/2005	2.5	<50	<0.50	<0.50	<0.50	0.87	---	<0.50	---	---	---	---	---	---	---	---	---
P-1-5.0	4/4/2005	5	69	<0.50	<0.50	1.1	5.0	---	<0.50	---	---	---	---	---	---	---	---	---
P-2-3.5	4/4/2005	3.5	<1.0	<0.0050	<0.0050	<0.0050	<0.0050	---	0.013	---	---	---	---	---	---	---	---	---
P-2-5.0	4/4/2005	5	85	<0.50	<0.50	0.84	0.50	---	<0.50	---	---	---	---	---	---	---	---	---
P-3-3.0	4/4/2005	3	**2,300**	<1.0	<1.0	<1.0	<1.0	---	<1.0	---	---	---	---	---	---	---	---	---
P-4-2.5	4/4/2005	2.5	**3,700**	**11**	**83**	**42**	**280**	---	<1.0	---	---	---	---	---	---	---	---	---
P-4-5.0	4/4/2005	5	**4,100**	**10**	**23**	**48**	**240**	---	<2.5	---	---	---	---	---	---	---	---	---
2006 Subsurface Investigation																		
SB-19-5	5/23/2006	5	<0.100	0.00270	<0.00200	<0.00200	<0.00500	---	<0.00200	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-19-10	5/24/2006	10	0.454	0.0155	0.00411	<0.00200	<0.00500	---	0.0117	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-19-15	5/24/2006	15	<0.100	0.00355	<0.00200	<0.00200	<0.00500	---	0.00473	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-19-19.5	5/24/2006	19.5	<0.100	0.00517	<0.00200	<0.00200	<0.00500	---	0.00236	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-19-25	5/24/2006	25	<0.100	0.01960	0.00643	<0.00200	0.00619	---	0.00406	0.0668	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-19-28.5	5/24/2006	28.5	**993**	0.239	<0.100	8.52	**34.6**	---	1.09	<2.50	<0.250	<0.100	<0.100	<0.100	<0.100	---	---	---

Table 1. Historical Soil Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th St., San Leandro, California

Sample ID	Date	Depth (fbg)	TPHg	Benzene	Toluene	Ethyl-benzene	Xylenes	MTBE (8020)	MTBE (8260)	TBA	ETBE	DIPE	TAME	1,2-DCA	EDB	Ethanol	TOG	Lead
			(Concentrations in mg/kg)															
SB-20-5	5/23/2006	5	61.1	0.0174	0.00952	0.00798	0.0170	---	<0.00200	0.0740	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-20-10	5/25/2006	10	3.48	0.0286	0.00982	<0.00200	<0.00500	---	<0.00200	0.0727	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-20-16.5	5/25/2006	16.5	1.27	0.00388	<0.00200	<0.00200	0.00576	---	0.00254	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-20-23.5	5/25/2006	23.5	**692**	0.0265	0.0772	6.48	**39.1**	---	0.142	0.177	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-21-5	5/23/2006	5	0.379	0.0133	0.00301	<0.00200	<0.00500	---	0.00520	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-21-10	5/24/2006	10	0.881	0.0273	0.0102	<0.00200	<0.00500	---	0.00347	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-21-15	5/24/2006	15	<0.100	0.00813	0.00286	<0.00200	<0.00500	---	<0.00200	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-21-20	5/24/2006	20	<0.100	0.00947	0.00330	<0.00200	<0.00500	---	0.00457	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-21-27.5	5/24/2006	27.5	**635**	0.0759	2.20	5.46	**27.5**	---	0.00963	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-22-5	5/23/2006	5	<0.100	0.00309	<0.00200	<0.00200	<0.00500	---	<0.00200	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-22-10	5/25/2006	10	<0.100	0.00292	<0.00200	<0.00200	<0.00500	---	<0.00200	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-22-15	5/25/2006	15	<0.100	0.00898	0.00279	<0.00200	<0.00500	---	<0.00200	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-22-20	5/25/2006	20	<0.100	0.00322	<0.00200	<0.00200	<0.00500	---	<0.00200	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-22-25	5/25/2006	25	0.127	0.00628	0.00226	<0.00200	<0.00500	---	<0.00200	0.0660	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-22-29.5	5/25/2006	29.5	7.23	0.0171	<0.00200	0.169	0.167	---	0.00334	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-23-5	5/23/2006	5	**517**	0.0654	0.100	3.34	7.71	---	<0.00200	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-23-10	5/24/2006	10	114	**1.49**	0.0582	1.22	0.468	---	0.00731	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-23-15	5/24/2006	15	102	0.458	0.0127	0.790	0.948	---	0.0118	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-23-20	5/24/2006	20	215	0.0154	0.00805	0.986	5.26	---	0.0490	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
SB-23-25	5/24/2006	25	**1,060**	0.498	4.77	8.99	**54.3**	---	<0.100	<2.50	<0.250	<0.100	<0.100	<0.100	<0.100	---	---	---
SB-23-29.5	5/24/2006	29.5	**526**	**0.716**	5.71	4.80	**27.9**	---	0.326	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
MW-12/SB-24-5	5/23/2006	5	2.39	0.0624	0.00307	<0.00200	<0.00500	---	<0.00200	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
MW-12/SB-24-10	5/26/2006	10	<0.100	0.0241	0.00776	<0.00200	<0.00500	---	<0.00200	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
MW-12/SB-24-15	5/26/2006	15	<0.100	0.00479	<0.00200	<0.00200	<0.00500	---	<0.00200	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
MW-12/SB-24-20	5/26/2006	20	0.288	0.0134	0.00609	<0.00200	<0.00500	---	<0.00200	<0.0500	<0.00500	<0.00200	<0.00200	<0.00200	<0.00200	---	---	---
MW-12/SB-24-24	5/26/2006	24	**848**	**1.38**	8.16	8.10	**41.5**	---	<0.100	<2.50	<0.250	<0.100	<0.100	<0.100	<0.100	---	---	---
Shallow Soil (≤10 fbg) ESL[1]:			**400**	**0.38**	**9.3**	**32**	**11**	**5.6**	**5.6**	**110**	**NA**	**NA**	**NA**	**NA**	**0.020**	**45**	**1,000**	**750**
Deep Soil (>10 fbg) ESL[1]:			**400**	**0.51**	**9.3**	**32**	**11**	**5.6**	**5.6**	**110**	**NA**	**NA**	**NA**	**NA**	**0.020**	**45**	**1,000**	**750**

Abbreviations:

TPHg = Total petroleum hydrocarbons as gasoline. From 1990 through 1998, analyzed by modified EPA Method 8015; from 2001 through 2006, analyzed by EPA Method 8260B.

Notes:

a = Petroleum oil and grease analyzed by American Public Health Association Standard Method 503E; no detections above 100 ppm detection limit. Total oil and grease analyzed by American Public Health Association Standard Method 503E; no

Table 1. Historical Soil Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th St., San Leandro, California

Sample ID	Date	Depth (fbg)	TPHg	Benzene	Toluene	Ethyl-benzene	Xylenes	MTBE (8020)	MTBE (8260)	TBA	ETBE	DIPE	TAME	1,2-DCA	EDB	Ethanol	TOG	Lead
			← (Concentrations in mg/kg) →															

Benzene, toluene, ethylbenzene, and total xylenes analyzed by EPA Method 8020 from 1990 through 1998; from 2001 through 2006, analyzed by EPA Method 8260B.
MTBE = Methyl tert-butyl ether analyzed by EPA Method 8020 or EPA Method 8260 (as indicated).
TBA = Tert-Butyl alcohol, analyzed by EPA Method 8260B.
ETBE = Ethyl tert butyl ether, analyzed by EPA Method 8260B.
DIPE = Di-isopropyl Ether, analyzed by EPA Method 8260B.
TAME = tert-Amyl methyl ether, analyzed by EPA Method 8260B.
1,2-DCA = 1,2-dichloroethane
EDB = Ethyl di-bromide, analyzed by EPA Method 8260B.
Ethanol analyzed by EPA Method 8260B.
fbg = Feet below grade
mg/kg = Milligrams per kilogram
<n = Below laboratory detection limit of n mg/kg
--- = Not analyzed

detections above 50 ppm detection limit.
b = Analyzed for halogenated volatile organic compounds by EPA Method 8010; none detected.
c = Total petroleum hydrocarbons as diesel (TPHd) and total petroleum hydrocarbons as motor oil (TPHmo) analyzed by modified EPA Method 8015; no TPHd detected at 1 ppm limit; no TPHmo detected at 10 ppm limit.
e = TPHd detected at 23 ppm by modified EPA Method 8015; lab characterized detected compounds as hydrocarbons lighter than diesel.
f = TPHd detected at 4.9 ppm by modified EPA Method 8015; lab characterized detected compounds as hydrocarbons lighter than diesel.
g = Analyzed for volatile organic compounds by EPA Method 8010; none detected above detection limits ranging from 0.005 to 0.050 ppm.
h = Sample saturated with perched water from beneath dispenser.
i = San Francisco Bay Regional Water Quality Control Board commercial/industrial Environmental Screening Level for soil where groundwater is not a source of drinking water

Table 2. Historical Grab Groundwater Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th Avenue, San Leandro, California

Sample ID	Sample Date	TPHg	Benzene	Toluene	Ethyl-benzene	Total Xylenes	MTBE	TBA	DIPE	ETBE	TAME	1,2 DCA	EDB	Ethanol
		←						(ppb)						→
1994 Subsurface Investigation														
BH-1	6/6/1994	<50	<0.50	<0.50	<0.50	<0.50	---	---	---	---	---	---	---	---
BH-2	6/6/1994	**5,200 a**	**8.8**	<0.50	**9.1**	<0.50	---	---	---	---	---	---	---	---
BH-3	6/6/1994	**120,000 b**	**25,000**	**14,000**	**3,100**	**13,000**	---	---	---	---	---	---	---	---
BH-4	6/7/1994	<50	<0.50	<0.50	<0.50	<0.50	---	---	---	---	---	---	---	---
BH-5	6/7/1994	<50	<0.50	<0.50	<0.50	<0.50	---	---	---	---	---	---	---	---
BH-6	6/7/1994	<50	<0.50	<0.50	<0.50	<0.50	---	---	---	---	---	---	---	---
1995 Monitoring Well Installation														
BH-7-17-W	2/14/1995	**100**	**1.0**	**1.0**	<0.5	<0.5	---	---	---	---	---	---	---	---
BH-9-20-W	2/14/1995	**90**	**0.9**	**0.9**	<0.5	<0.5	---	---	---	---	---	---	---	---
1998 Subsurface Investigation														
SVS-11-W1	11/10/1998	**130,000**	**18,000**	**1,800**	**5,700**	**31,000**	**1,500**	---	---	---	---	---	---	---
SVS-12-W1	11/11/1998	**64,000**	**1,800**	**770**	**2,700**	**17,000**	<250	---	---	---	---	---	---	---
SVS-14-W1	11/11/1998	<50	<0.50	<0.50	<0.50	<0.50	<2.5	---	---	---	---	---	---	---
SVS-15-W1	11/11/1998	<50	<0.50	<0.50	<0.50	**0.80**	<2.5	---	---	---	---	---	---	---
SVS-16-W1	11/11/1998	<50	<0.50	<0.50	<0.50	<0.50	<2.5	---	---	---	---	---	---	---
2002 Monitoring Well Installation														
MW7-W	10/3/2002	**60,000**	**59**	**590**	**1,900**	**7,300**	<100	---	---	---	---	---	---	---
MW8-W	10/4/2002	**83,000**	**810**	**2,000**	**3,700**	**17,000**	<500	---	---	---	---	---	---	---
SB9-W	10/4/2002	**78,000**	**2,200**	**8,200**	**2,300**	**13,000**	<500	---	---	---	---	---	---	---
2003 Subsurface Investigation														
SB-10-W	6/23/2003	<50	**1.1**	**0.84**	<0.50	**1.7**	<0.50	<5.0	<2.0	<2.0	<2.0	<0.50	<0.50	<50
SB-11-W	6/24/2003	**75**	**0.84**	**0.53**	**1.5**	**7.1**	<0.50	<5.0	<2.0	<2.0	<2.0	<0.50	<0.50	<50
SB-12-W	6/24/2003	<50	<0.50	<0.50	<0.50	<1.0	<0.50	<5.0	<2.0	<2.0	<2.0	<0.50	<0.50	<50
SB-13-W	6/23/2003	<50	**0.89**	**0.52**	<0.50	<1.0	<0.50	<5.0	<2.0	<2.0	<2.0	<0.50	<0.50	<50
SB-14-W	6/24/2003	**67,000**	<100	**280**	**3,800**	**16,000**	<100	<1000	<400	<400	<400	<100	<100	<1000
SB-15-W	6/26/2003	**6,800**	**530**	<25	**380**	**560**	**40**	<250	<100	<100	<100	<25	<25	<2500
SB-16-W	6/23/2003	<50	**0.67**	<0.50	<0.50	<1.0	<0.50	<5.0	<2.0	<2.0	<2.0	<0.50	<0.50	<50

Table 2. Historical Grab Groundwater Analytical Data - Shell-branded Service Station, Incident No.98996068, 1784 150th Avenue, San Leandro, California

Sample ID	Sample Date	TPHg	Benzene	Toluene	Ethyl-benzene	Total Xylenes	MTBE	TBA	DIPE	ETBE	TAME	1,2 DCA	EDB	Ethanol
		←						(ppb)						→
2004 Subsurface Investigation														
SB-17-W	9/13/2004	<50	<0.50	**4.2**	**2.0**	**7.9**	<0.50	<5.0	<2.0	<2.0	<2.0	<0.50	<0.50	<50
SB-18-W	9/13/2004	**55**	<0.50	**5.5**	**2.5**	**10.0**	<0.50	<5.0	<2.0	<2.0	<2.0	<0.50	<0.50	<50
2006 Subsurface Investigation														
SB-25W-20	5/24/2006	<50.0	0.570	0.650	1.69	3.28	<0.500	<10.0	<0.500	<0.500	<0.500	2.96	<0.500	---
SB-25W-31	5/24/2006	<50.0	<0.500	<0.500	0.520	<0.500	<0.500	<10.0	<0.500	<0.500	<0.500	3.10	<0.500	---
Groundwater ESL[c]:		**500**	**46**	**130**	**290**	**100**	**1,800**	**18,000**	**NA**	**NA**	**NA**	**200**	**150**	**5,000**

Abbreviations and Notes:

TPHg = Total petroleum hydrocarbons as gasoline by modified EPA Method 8015 in 1998, and by EPA Method 8260B thereafter
Benzene, toluene, ethylbenzene and total xylenes by EPA Method 8020 in 1998, and by EPA Method 8260B thereafter.
MTBE = Methyl tertiary butyl ether by EPA Method 8020 in 1998 and by EPA Method 8260B thereafter
TBA = Tert-Butyl alcohol, analyzed by EPA Method 8260B
ETBE = Ethyl tert butyl ether, analyzed by EPA Method 8260B
DIPE = Di-isopropyl Ether, analyzed by EPA Method 8260B
TAME = Tert-Amyl methyl ether, analyzed by EPA Method 8260B
1,2-DCA = 1,2-dichloroethane
EDB = Ethyl di-bromide, analyzed by EPA Method 8260B
Ethanol analyzed by EPA Method 8260B
ppb = Parts per billion
--- = Not analyzed
a = Chromatogram pattern as weathered gasoline
b = Chromatogram pattern as gasoline
c = San Francisco Bay Regional Water Quality Control Board Environmental Screening Level where groundwater is not a source of drinking water

Attachment B

Standard Field Procedures

CRA

STANDARD FIELD PROCEDURES FOR CONE PENETROMETER TESTING AND SAMPLING

This document describes Conestoga-Rovers & Associates (CRA's) standard field methods for Cone Penetrometer Testing (CPT) and direct-push soil and groundwater sampling. These procedures are designed to comply with Federal, State and local regulatory guidelines.

Use of CPT for logging and soil and groundwater sampling requires separate borings. Typically an initial boring is advanced to estimate soil and groundwater characteristics as described below. To collect soil samples a separate boring must be advanced using a soil sampling device. If groundwater samples are collected, another separate boring must be advanced using a groundwater sampling device. Specific field procedures are summarized below.

Cone Penetrometer Testing (CPT)

Cone Penetrometer Testing is performed by a trained geologist or engineer working under the supervision of a California Professional Geologist (PG) or a Certified Engineering Geologist (CEG). Cone Penetrometer Tests (CPT) are carried out by pushing an integrated electronic piezocone into the subsurface. The piezocone is pushed using a specially designed CPT rig with a force capacity of 20 to 25 tons. The piezocones are capable of recording the following parameters:

Tip Resistance (Qc)
Sleeve Friction (Fs)
Pore Water Pressure (U)
Bulk Soil Resistivity (rho) - with an added module

A compression cone is used for each CPT sounding. Piezocones with rated load capacities of 5, 10 or 20 tons are used depending on soil conditions. The 5 and 10 ton cones have a tip area of 10 sq. cm. and a friction sleeve area of 150 sq. cm. The 20 ton cones have a tip area of 15 sq. cm. and a friction sleeve area of 250 sq. cm. A pore water pressure filter is located directly behind the cone tip. Each of the filters is saturated in glycerin under vacuum pressure prior to penetration. Pore Pressure Dissipation Tests (PPDT) are recorded at 5 second intervals during pauses in penetration. The equilibrium pore water pressure from the dissipation test can be used to identify the depth to groundwater.

The measured parameters are printed simultaneously on a printer and stored on a computer disk for future analysis. All CPTs are carried out in accordance with ASTM D-3441. A complete set of baseline readings is taken prior to each sounding to determine any zero load offsets.

The inferred stratigraphic profile at each CPT location is included on the plotted CPT logs. The stratigraphic interpretations are based on relationships between cone bearing (Qc) and friction ratio (Rf). The friction ratio is a calculated parameter (Fs/Qc) used in conjunction with the cone bearing to identify the soil type. Generally, soft cohesive soils have low cone bearing pressures and high friction ratios. Cohesionless soils (sands) have high cone bearing pressures and low friction ratios. The classification of soils is based on correlations developed by Robertson et al (1986). It is not always possible to clearly identify a soil type based on Qc and Rf alone. Correlation with existing soils information and analysis of pore water pressure measurements should also be used in determining soil type.

CPT and sampling equipment are steam-cleaned or washed prior to work and between borings to prevent cross-contamination. Sampling equipment is washed between samples with trisodium phosphate or an equivalent EPA-approved detergent. Groundwater samples are decanted into appropriate containers supplied by the analytic laboratory. Samples are labeled, placed in protective foam sleeves, stored on crushed ice at or below 4° C, and transported under chain-of-custody to the laboratory.

After the CPT probes are removed, the borings are filled to the ground surface with cement grout poured or pumped through a tremie pipe.

Objectives

Soil samples are collected to characterize subsurface lithology, assess whether the soils exhibit obvious hydrocarbon or other compound vapor odor or staining, estimate groundwater depth and quality and to submit samples for chemical analysis.

Soil Classification/Logging

All soil samples are classified according to the Unified Soil Classification System by a trained geologist or engineer working under the supervision of a California Professional Geologist (PG) or a Certified Engineering Geologist (CEG). The following soil properties are noted for each soil sample:

- Principal and secondary grain size category (i.e., sand, silt, clay or gravel)
- Approximate percentage of each grain size category,
- Color,
- Approximate water or separate-phase hydrocarbon saturation percentage,
- Observed odor and/or discoloration,
- Other significant observations (i.e., cementation, presence of marker horizons, mineralogy), and
- Estimated permeability.

Soil Sampling

Soil samples are collected from borings driven using hydraulic push technologies. A minimum of one and one half ft of the soil column is collected for every five ft of drilled depth. Additional soil samples can be collected near the water table and at lithologic changes. Samples are collected using samplers lined with polyethylene or brass tubes driven into undisturbed sediments at the bottom of the borehole. The ground surface immediately adjacent to the boring is used as a datum to measure sample depth. The horizontal location of each boring is measured in the field relative to a permanent on-site reference using a measuring wheel or tape measure.

Drilling and sampling equipment is steam-cleaned or washed prior to drilling and between borings to prevent cross-contamination. Sampling equipment is washed between samples with trisodium phosphate or an equivalent EPA-approved detergent.

Sample Storage, Handling and Transport

Sampling tubes chosen for analysis are trimmed of excess soil and capped with Teflon[7] tape and plastic end caps. Soil samples are labeled and stored at or below 4°C on either crushed or dry ice, depending upon local regulations. Samples are transported under chain-of-custody to a State-certified analytic laboratory.

Field Screening

After a soil sample has been collected, soil from the remaining tubing is placed inside a sealed plastic bag and set aside to allow hydrocarbons to volatilize from the soil. After ten to fifteen minutes, a portable photoionization detector measures volatile hydrocarbon vapor concentrations in the bag=s headspace, extracting the vapor through a slit in the plastic bag. The measurements are used along with the field observations, odors, stratigraphy, and groundwater depth to select soil samples for analysis.

Grab Groundwater Sampling

Groundwater samples are collected from the open borehole using bailers, advancing disposable Tygon[7] tubing into the borehole and extracting groundwater using a diaphragm pump, or using a hydro-punch style sampler with a bailer or tubing. The groundwater samples are decanted into the appropriate containers supplied by the analytic laboratory. Samples are labeled, placed in protective foam sleeves, stored on crushed ice at or below 4° C, and transported under chain-of-custody to the laboratory.

Duplicates and Blanks

Blind duplicate water samples are usually collected only for monitoring well sampling programs, at a rate of one blind sample for every 10 wells sampled. Laboratory-supplied trip blanks accompany samples collected for all sampling programs to check for cross-contamination caused by sample handling and transport. These trip blanks are analyzed if the internal laboratory quality assurance/quality control (QA/QC) blanks contain the suspected field contaminants. An equipment blank may also be analyzed if non-dedicated sampling equipment is used.

Grouting

If the borings are not completed as wells, the borings are filled to the ground surface with cement grout poured or pumped through a tremie pipe.

STANDARD FIELD PROCEDURES FOR GEOPROBE® SAMPLING

This document describes Conestoga-Rovers & Associates' standard field methods for GeoProbe® soil and ground water sampling. These procedures are designed to comply with Federal, State and local regulatory guidelines. Specific field procedures are summarized below.

Objectives

Soil samples are collected to characterize subsurface lithology, assess whether the soils exhibit obvious hydrocarbon or other compound vapor odor or staining, estimate ground water depth and quality and to submit samples for chemical analysis.

Soil Classification/Logging

All soil samples are classified according to the Unified Soil Classification System by a trained geologist or engineer working under the supervision of a California Professional Geologist (PG) or a Certified Engineering Geologist (CEG). The following soil properties are noted for each soil sample:

- Principal and secondary grain size category (i.e., sand, silt, clay or gravel)
- Approximate percentage of each grain size category,
- Color,
- Approximate water or separate-phase hydrocarbon saturation percentage,
- Observed odor and/or discoloration,
- Other significant observations (i.e., cementation, presence of marker horizons, mineralogy), and
- Estimated permeability.

Soil Sampling

GeoProbe® soil samples are collected from borings driven using hydraulic push technologies. Prior to drilling, the first 8 ft of the boring are cleared using an air or water knife and vacuum extraction. This minimizes the potential for impacting utilities.

A minimum of one and one half ft of the soil column is collected for every five ft of drilled depth. Additional soil samples can be collected near the water table and at lithologic changes. Samples are collected using samplers lined with polyethylene or brass tubes driven into undisturbed sediments at the bottom of the borehole. The ground surface immediately adjacent to the boring is used as a datum to measure sample depth. The horizontal location of each boring is measured in the field relative to a permanent on-site reference using a measuring wheel or tape measure.

Drilling and sampling equipment is steam-cleaned or washed prior to drilling and between borings to prevent cross-contamination. Sampling equipment is washed between samples with trisodium phosphate or an equivalent EPA-approved detergent.

Sample Storage, Handling, and Transport

Sampling tubes chosen for analysis are trimmed of excess soil and capped with Teflon® tape and plastic end caps. Soil samples are labeled and stored at or below 4°C on either crushed or dry ice, depending upon local regulations. Samples are transported under chain-of-custody to a State-certified analytic laboratory.

Field Screening

After a soil sample has been collected, soil from the remaining tubing is placed inside a sealed plastic bag and set aside to allow hydrocarbons to volatilize from the soil. After ten to fifteen minutes, a portable GasTech® or photo ionization detector measures volatile hydrocarbon vapor concentrations in the bag's headspace, extracting the vapor through a slit in the plastic bag. The measurements are used along with the field observations, odors, stratigraphy and ground water depth to select soil samples for analysis.

Grab Ground Water Sampling

Ground water samples are collected from the open borehole using bailers, advancing disposable Tygon® tubing into the borehole and extracting ground water using a diaphragm pump, or using a hydro-punch style sampler with a bailer or tubing. The ground water samples are decanted into the appropriate containers supplied by the analytic laboratory. Samples are labeled, placed in protective foam sleeves, stored on crushed ice at or below 4° C, and transported under chain-of-custody to the laboratory.

Duplicates and Blanks

Blind duplicate water samples are usually collected only for monitoring well sampling programs, at a rate of one blind sample for every 10 wells sampled. Laboratory-supplied trip blanks accompany samples collected for all sampling programs to check for cross-contamination caused by sample handling and transport. These trip blanks are analyzed if the internal laboratory quality assurance/quality control (QA/QC) blanks contain the suspected field contaminants. An equipment blank may also be analyzed if non-dedicated sampling equipment is used.

Grouting

If the borings are not completed as wells, the borings are filled to the ground surface with cement grout poured or pumped through a tremie pipe.

STANDARD FIELD PROCEDURES FOR SOIL VAPOR PROBE INSTALLATION AND SAMPLING

DIRECT PUSH AND VAPOR POINT METHODS

This document describes Conestoga-Rovers & Associates' standard field methods for soil vapor sampling. These procedures are designed to comply with Federal, State and local regulatory guidelines. Specific field procedures are summarized below.

Objectives

Soil vapor samples are collected and analyzed to assess whether vapor-phase subsurface contaminants pose a threat to human health or the environment.

Direct Push Method for Soil Vapor Sampling

The direct push method for soil vapor sampling uses a hollow vapor probe, which is pushed into the ground, rather than augured, and the stratigraphy forms a vapor seal between the surface and subsurface environments ensuring that the surface and subsurface gases do not mix. Once the desired soil vapor sampling depth has been reached, the field technician installs disposable polyethylene tubing with a threaded adapter that screw into the bottom of the rods. The screw adapter ensures that the vapor sample comes directly from the bottom of the drill rods and does not mix with other vapor from inside the rod or from the ground surface. In addition, hydrated bentonite is placed around the sampling rod and the annulus of the boring to prevent ambient air from entering the boring. The operator then pulls up on the rods and exposes the desired stratigraphy by leaving an expendable drive point at the maximum depth. The required volume of soil vapor is then purged through the polyethylene tubing using a standard vacuum pump. The soil vapor can be sampled for direct injection into a field gas chromatograph, pumped into inert tedlar bags using a "bell jar" sampling device, or allowed to enter a Summa vacuum canister. Once collected, the vapor sample is transported under chain-of-custody to a state-certified laboratory. The ground surface immediately adjacent to the boring is used as a datum to measure sample depth. The horizontal location of each boring is measured in the field relative to a permanent on-site reference using a measuring wheel or tape measure. Drilling and sampling equipment is washed between samples with trisodium phosphate or

an equivalent EPA-approved detergent. Once the sampling is completed, the borings are filled to the ground surface with neat cement.

Shallow Soil Vapor Point Method for Soil Vapor Sampling

The shallow soil vapor point method for soil vapor sampling utilizes a hand auger or drill rig to advance a boring for the installation of a soil vapor sampling point. Once the boring is hand augered to the final depth, a 6-inch slotted probe, capped on either end with brass or Swagelok fittings, is placed within 12-inches of number 2/16 filter sand (Figure A). Nylon tubing of ¼-inch outer-diameter of known length is attached to the probe. A 2-inch to 12-inch layer of unhydrated bentonite chips is placed on top of the filter pack. Next pre-hydrated granular bentonite is then poured into the hole to approximately and topped with another 2-inch layer of unhydrated bentonite chips or concrete, depending if the boring will hold one probe or multiple probes. The tube is coiled and placed within a wellbox finished flush to the surface. Soil vapor samples will be collected no sooner than one week after installation of the soil-vapor points to allow adequate time for representative soil vapors to accumulate. Soil vapor sample collection will not be scheduled until after a minimum of three consecutive precipitation-free days and irrigation onsite has ceased. Figure B shows the soil vapor sampling apparatus. A measured volume of air will be purged from the tubing using a vacuum pump and a tedlar bag. Immediately after purging, soil-vapor samples will be collected using the appropriate size Summa canister with attached flow regulator and sediment filter. The soil-vapor points will be preserved until they are no longer needed for risk evaluation purposes. At that time, they will be destroyed by extracting the tubing, hand augering to remove the sand and bentonite, and backfilling the boring with neat cement. The boring will be patched with asphalt or concrete, as appropriate.

Vapor Sample Storage, Handling, and Transport

Samples are stored and transported under chain-of-custody to a state-certified analytic laboratory. Samples should never be cooled due to the possibility of condensation within the canister.

Attachment C

Drilling and Encroachment Permits

Alameda County Public Works Agency - Water Resources Well Permit

399 Elmhurst Street
Hayward, CA 94544-1395
Telephone: (510)670-6633 Fax:(510)782-1939

Application Approved on: 07/25/2007 By jamesy

Permit Numbers: W2007-0840 to W2007-0841
Permits Valid from 08/15/2007 to 10/31/2007

Application Id: 1185225915654
City of Project Site: San Leandro
Site Location: 1784 150th Avenue, San Leandro, CA
Project Start Date: 08/15/2007
Completion Date: 10/31/2007

Applicant: Consetoga-Rovers & Associates - Lauren Godlfinch
5900 Hollis St. #A, Emeryville, CA 94608
Phone: 510-420-3339

Property Owner: Shell Oil Products US
20945 S Wilmington Avenue, Carson, CA 90810
Phone: 707-865-0251

Client: ** same as Property Owner **

Total Due: $400.00
Receipt Number: WR2007-0334 **Total Amount Paid:** $400.00
Payer Name : Conestoga-Rovers Paid By: CHECK **PAID IN FULL**

Works Requesting Permits:

Remedian Well Construction-Extraction - 5 Wells
Driller: Gregg Drilling - Lic #: 485165 - Method: Hand **Work Total: $200.00**

Specifications

Permit #	Issued Date	Expire Date	Owner Well Id	Hole Diam.	Casing Diam.	Seal Depth	Max. Depth
W2007-0840	07/25/2007	11/13/2007	SVP-1	4.00 in.	0.25 in.	4.00 ft	5.25 ft
W2007-0840	07/25/2007	11/13/2007	SVP-2	4.00 in.	0.25 in.	4.00 ft	5.25 ft
W2007-0840	07/25/2007	11/13/2007	SVP-3	4.00 in.	0.25 in.	4.00 ft	5.25 ft
W2007-0840	07/25/2007	11/13/2007	SVP-4	4.00 in.	0.25 in.	4.00 ft	5.25 ft
W2007-0840	07/25/2007	11/13/2007	SVP-5	4.00 in.	0.25 in.	4.00 ft	5.25 ft

Specific Work Permit Conditions

1. Permittee shall assume entire responsibility for all activities and uses under this permit and shall indemnify, defend and save the Alameda County Public Works Agency, its officers, agents, and employees free and harmless from any and all expense, cost, liability in connection with or resulting from the exercise of this Permit including, but not limited to, properly damage, personal injury and wrongful death.

2. Permitte, permittee's contractors, consultants or agents shall be responsible to assure that all material or waters generated during drilling, boring destruction, and/or other activities associated with this Permit will be safely handled, properly managed, and disposed of according to all applicable federal, state, and local statutes regulating such. In no case shall these materials and/or waters be allowed to enter, or potentially enter, on or off-site storm sewers, dry wells, or waterways or be allowed to move off the property where work is being completed.

3. Compliance with the well-sealing specifications shall not exempt the well-sealing contractor from complying with appropriate State reporting-requirements related to well destruction (Sections 13750 through 13755 (Division 7, Chapter 10, Article 3) of the California Water Code). Contractor must complete State DWR Form 188 and mail original to the Alameda County Public Works Agency, Water Resources Section, within 60 days. Including permit number and site

map.

4. Applicant shall contact Vicky Hamlin for an inspection time at 510-670-5443 or email to vickyh@acpwa.org at least five (5) working days prior to starting, once the permit has been approved. Confirm the scheduled date(s) at least 24 hours prior to drilling.

5. Minimum seal depth (Neat Cement Seal) is 2 feet below ground surface (BGS).

6. Minimum surface seal thickness is two inches of cement grout placed by tremie

7. Copy of approved drilling permit must be on site at all times. Failure to present or show proof of the approved permit application on site shall result in a fine of $500.00.

Borehole(s) for Investigation-Geotechnical Study/CPT's - 6 Boreholes
Driller: Gregg Drilling - Lic #: 485165 - Method: DP **Work Total: $200.00**

Specifications

Permit Number	Issued Dt	Expire Dt	# Boreholes	Hole Diam	Max Depth
W2007-0841	07/25/2007	11/13/2007	6	2.00 in.	75.00 ft

Specific Work Permit Conditions

1. Backfill bore hole by tremie with cement grout or cement grout/sand mixture. Upper two-three feet replaced in kind or with compacted cuttings. All cuttings remaining or unused shall be containerized and hauled off site.

2. Boreholes shall not be left open for a period of more than 24 hours. All boreholes left open more than 24 hours will need approval from Alameda County Public Works Agency, Water Resources Section. All boreholes shall be backfilled according to permit destruction requirements and all concrete material and asphalt material shall be to Caltrans Spec or County/City Codes. No borehole(s) shall be left in a manner to act as a conduit at any time.

3. Permittee shall assume entire responsibility for all activities and uses under this permit and shall indemnify, defend and save the Alameda County Public Works Agency, its officers, agents, and employees free and harmless from any and all expense, cost, liability in connection with or resulting from the exercise of this Permit including, but not limited to, properly damage, personal injury and wrongful death.

4. Applicant shall contact Vicky Hamlin for an inspection time at 510-670-5443 or email to vickyh@acpwa.org at least five (5) working days prior to starting, once the permit has been approved. Confirm the scheduled date(s) at least 24 hours prior to drilling.

5. Permitte, permittee's contractors, consultants or agents shall be responsible to assure that all material or waters generated during drilling, boring destruction, and/or other activities associated with this Permit will be safely handled, properly managed, and disposed of according to all applicable federal, state, and local statutes regulating such. In no case shall these materials and/or waters be allowed to enter, or potentially enter, on or off-site storm sewers, dry wells, or waterways or be allowed to move off the property where work is being completed.

6. Copy of approved drilling permit must be on site at all times. Failure to present or show proof of the approved permit application on site shall result in a fine of $500.00.

7. Permit is valid only for the purpose specified herein. No changes in construction procedures, as described on this

permit application. Boreholes shall not be converted to monitoring wells, without a permit application process.

City of San Leandro
Engineering & Transportation Department
835 East 14th Street
San Leandro, CA 94577-3782
(510) 577-3428 (phone)
(510) 577-3294 (fax)

FAX TRANSMITTAL

DATE: 8/8/07 **NO. OF PAGES (including cover sheet):** 06

TO: LAUREN GOLDFINCH **FAX NO.:** (510) 420-9170

FROM: VICTOR LEMMON **PHONE:**

CC:

RE: ENCROACHMENT PERMIT FOR 1784 150th AVE.

PROJECT:

☐ Urgent ☐ For Review ☐ Please Comment ☐ Please Reply ☐ Other:
Originals will: ☐ not follow ☐ follow by mail ☐ follow by overnight

COMMENTS:

LAUREN,

PLEASE CALL INSPECTIONS NUMBER LOCATED NEAR BOTTOM OF PERMIT 24 HOURS PRIOR TO STARTING WORK AND WHEN FINISHED.

THANKS,

VICTOR.

If you have any problem receiving this transmission, please call:
Engineering & Transportation Department (510) 577-3428

City of San Leandro
Engineering and Transportation Department
835 East 14th Street
San Leandro, California 94577
(510) 577-3428

ENCROACHMENT PERMIT

Permit Type Environmental VL

Permit Number: ENC2007-00297 **Job Address:** 14939 Portofino Ci (150th AVE FRONTAGES). **Issued:** 8/7/2007

Project Name: CONESTOGA (1784 150th AVE. ACTUAL ADDRESS)

Description of Work: 1784 150th Ave. contamination site. Install 4" dia. vapor probe 5' deep with well box in sidewalk on North side 150th Ave. Sidewalk square to be replaced when done. WELL IS DEMOLISHED

Customer # 19314

Planned Start Date : August 07, 2007 **Planned Completion Date :** November 07, 2007 USA Tag No .

Emergency Contact Ana Friel Contact Phone Number (707) 845-4066

Applicant:
CONESTOGA
5900 HOLLIS ST, SUITE A
EMERYVILLE CA 94608

Owner:
Phan Phen
14939 Portofino Cir
San Leandro CA 94578-1872

Contractor:

Agent:
LAUREN GOLDFINCH
5900 HOLLIS ST., SUITE A
EMERYVILLE CA 94608

Associated Permits:
Building Permit No.
Ora Loma Permit No.
Cal State Permit No.
Ala County Permit No. W2007-0840
Grading Permit No.

PERMIT FEE: $55 — To Acct #3306
PLAN CHECKER Hrs
RESTORE/INSPECT DEPOSIT $800 —
To CN# 19314
STREET CUT FEE To Acct #3304
TOTAL: $855 —

Utility /Job Number

Environmental Report Required

Method of Repair
Backfill Required
Pavement Section Requir
Section 1
Section 2
Section 3
Min Depth of Cover

All work shall be per City Standard Curb, Gutter, Sidewalk & Driveway details and specifications. Pedestrian safety and access shall be maintained at all times.

Consent Form Pre Video Post Video

If using truck in parking strip - Work Hours to be 9:00am to 3:00pm. Pedestrian safety & access to be maintained at all times.

PLEASE CALL (510) 577-3408 FOR INSPECTIONS 24 HOURS PRIOR TO WORK (VM 24hr)

By the application and acceptance of this permit, the undersigned intending to be legally bound does hereby agree that all work performed will be in accordance with all applicable provisions of this permit and all regulations, provisions, and specifications as adopted by the City. Further, the undersigned agrees that this permit is to serve as a guaranty for payment for all permit and/or inspection charges as billed by the City. Any misrepresentation of information requested from the applicant on this form shall make this permit null and void.

Signature: Signed for Applicant **Print Name:** LAUREN GOLDFINCH **Date:** 8/7/2007 9:37:28AM

GENERAL PROVISIONS

(a) All work must be performed in accordance with City of San Leandro Standard Plans, Specifications, and Title V Chapter 1 of the Municipal Code.
(b) Twenty four hours notice prior to start and/or request for inspection. All work must be completed between the hours of 8:00AM to 4:00PM.
(c) City to be notified next working day (by permit application) of all emergency work performed.
(d) Permittee shall be responsible for all liability imposed by law for personal injury or property damage proximately caused by failure on permittee's part to perform his obligations under said permit respect to maintenance. If any claim of such liability is made against the City of San Leandro or it's officers or employees, permittee shall defend, indemnify and hold each of them harmless from such claim.
(e) Cost of emergency work required to restore unsatisfactorily construction that becomes hazardous will be charged to permittee.
(f) Permit void 90 days from issue date unless unless otherwise noted. Extension time may be granted when requested in writing.
(g) Permit must be readily available at work site. Permit is not assignable.
(h) Section 6500 of the Labor Code requires permit from the State Division of Industrial Safety (CAL OSHA) prior to an excavation five feet or deeper.
(i.) Prior to digging or drilling, permittee shall request Undergrounding Sevice Alert (USA) markings, phone #800-227-2600.
(j) Trenches to be inspeted prior to backfilling. Backfil compaction tests may be required.
(k) All tunneling prohibited. Pipe must be bored or jacked or open trenched - including under curb, gutter and/or sidewalk.
(l) Forms for concrete work must be inspected prior to placing concrete.
(m) All concrete, including concrete pavement (overlayed with A.C. or not), must be sawcut prior to breakout.
(n) All sawcuts must be along scorelines, 1.5" minimum depth (special conditions for concrete pavements.
(o) Concrete sections to be replaced shall be no smaller than 30 inches in either length or width.
(p) If a sawcut falls within 30 inches of a construction joint, expansion joint or edge, the concrete shall be removed to the joint or edge.
(q) Temporary paving is required in all street and sidewalk areas and is is to be placed the same day work is performed. From October 15 through April 15, only A.C. paving is to be used.
(r) Permanent paving or sidewalk is to be replaced within 30 days. Permittee shall notify City before placing surfacing.
(s) Permittee shall provide, erect, and/or maintain such lights, barriers, warning signs, patrols, watchmen and other safeguards as are necessary to protect the traveling public in accordance with the current State "Manual of Warning Sighns, Lights, and Devices for Use in Performance of Work Upon Highways".
(t) Before any work is begun that will interrupt the normal flow of public traffic, proposed lane closures and advanced warning light, sign, and barricade with flashing light details shall be submitted to the City.
(u) Open trench one lane at a time, necessary traffic control, to keep traffic moving both directions during working hours. If at the end of the work day backfilling operations have not been completed, steel bridging shall be required to make the entire traveled way available to the public traffic.
(v) Pedestrian safety shall be maintained at all times.
(w) Permittee shall contact City for final inspection and approval of completed work.

INSPECTION RECORD

Date	Comments	Inspector	Hours Charged
		Subtotal	

1. All work shall be done in accordance with the Standard Specifications for Public Works Construction, the "GREENBOOK", the most current edition and all supplements thereto, adopted by the Southern California Chapter of the American Public Works Association and the Special Provisions (Technical Specifications) thereto adopted by the City.
2. Concrete shall be 213-C-17 (470-C-2500, 5 sack, one inch maximum aggregate, 2500 psi). Aggregate base (AB) shall be Crushed AB (CAB) or Crushed Miscellaneous Base (CMB).
3. Concrete for curb, gutter, sidewalk and driveway shall contain 0.45kg (one (1) pound) of lampblack per cu. yd. (at batch plant). 1.8kg (4 pounds) of lampblack to be used in the basket weave sidewalk.
4. Subgrade and Crushed Aggregate Base or Crushed Misc. Base shall be compacted to not less than 90% relative compaction, as tested by a City approved lab at contractor's expense, except under Valley Gutter, which shall be compacted to 95% RC.
5. Expansion joints shall be constructed at the EC and BC of curb returns, at each side of driveways and at 6m (20') nominal intervals. 6.25mm (1/4") bituminous impregnated felt shall be installed vertically, shall extend through the full depth and width of the work and be installed perpendicular to the work. Weakened-plane joints, 50mm (2") deep for sidewalks, 75mm (3") deep for 150mm (6") thick driveways, and 100mm (4") deep for 200mm (8" thick driveways), shall be spaced at 3m (10') nominal intervals, and at each side of curb ramps, mid-points of driveways with curb cuts exceeding 6m (20') and as directed by the City Engineer. All joints shall extend through the curb and gutter.
6. Exposed surfaces of sidewalk, driveway, curb and gutter shall be steel trowled followed by a medium broom finish. Existing decorative finishes shall be matched in kind.
7. Except as shown, all exposed edges, including at expansion joints and weakened-plane joints, shall be tooled to 12.5mm (1/2") radius.
8. Sidewalk shall be score marked at 750mm (30") nominal intervals each way or to match existing score marks. Monolithic curb, sidewalk and driveway shall have a continuous score mark 150mm (6") from curb face.
9. All concrete shall be cured by keeping continuously moist for three days after pouring either by sprinkling, covering with a waterproof membrane, or applying TYPE I concrete curing compound.
10. Extruded curb or gutter requires PRIOR approval by the City Engineer. Extruded sidewalks or driveways are prohibited.
11. For existing AC overlayed gutter, flow line of new concrete gutter shall match existing concrete gutter flow line. Curb lip at driveways shall be increased to 12.5mm (1/2") higher than AC overlay. AC overlay shall be reinstated to establish flow line.
12. All gutter lips, sidewalk, curb ramp or driveway edges, or curbings constructed adjacent to AC, shall be formed, finished and tooled. A 600mm (24") wide full depth AC street structural section shall be constructed adjacent to the concrete improvement in accordance with Pavement Tie-In Dwg. 128 Case 3101. The AC shall be saw cut and the AC section shall be a minimum of 150mm (6") deep on minor streets, parking lots, pathways, etc., 225mm (9") deep on collector streets and 300mm (12") on arterial streets. All AC 95% RC SS-1h Tack Coat (paint binder) all hard surfaces (AC, Conc., etc.).
13. All concrete improvements shall be doweled to adjacent concrete improvements using 300mm (12") long 10M (#3) rebar dowels (2 dowels min. each side) at 900mm (36") OC max. 100mm (4") min. embedment. Drill for drive tight fit or epoxy in place.
14. Dowels shall be installed per Note 13 when planter strips are filled with concrete or when sidewalk is added to the back of the existing walk. Street tree wells shall be provided in accordance with City requirements.
15. All concrete improvements to be removed shall be saw cut along existing scorelines to a minimum depth of 1/2 the thickness of the concrete improvement. No section to be replaced shall be smaller than 750mm (30") in either length or width. If the saw cut in sidewalk or driveway would fall within 750mm (30") of a construction joint, expansion joint, cold joint, or edge, the concrete shall be removed to the joint or edge, including AB. All saw cut residue shall be vacuumed concurrently with sawing operation.
16. New imported full depth AB shall be placed under all new or replacement curb, gutter, sidewalk and driveway.
17. The typical City standard curb height is 150mm (6") and the typical City gutter width is 450mm (18"). However, existing curb heights 75mm (3") to 225mm (9") and gutter widths 300mm (12") to 600mm (24") shall be matched in kind when directed by the City Engineer.
18. Any acts of vandalism or deformation to finish of the concrete shall be repaired within the first 24 hrs. after placement. Repairs made after 24 hrs. of placement shall consist of complete removal and replacement of the affected area.
19. Suitable native soil backfill shall be flush with adjacent concrete finish grade along all form voids and planter strips. Reseed as appropriate.

ACAD FILE: C3101S104.DWG

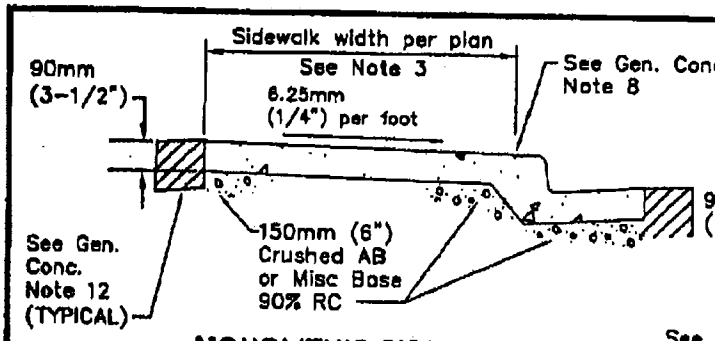
CITY OF SAN LEANDRO * STANDARD PLANS

NO.	REVISIONS	DATE

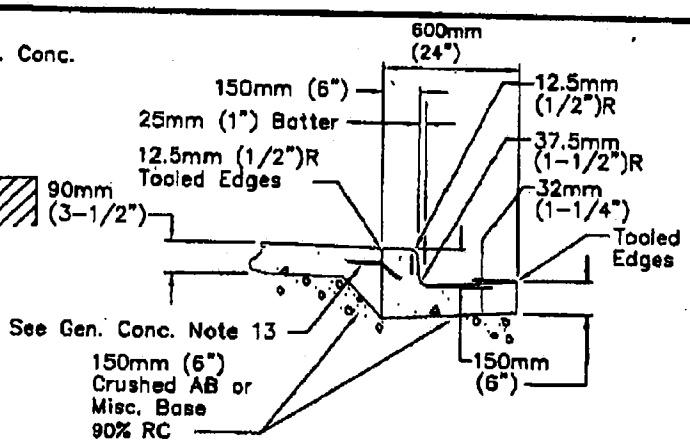
GENERAL CONCRETE NOTES

APPROVED
Kenneth Joseph, City Engineer R.C.E. No.34870
Expires 9/30/03

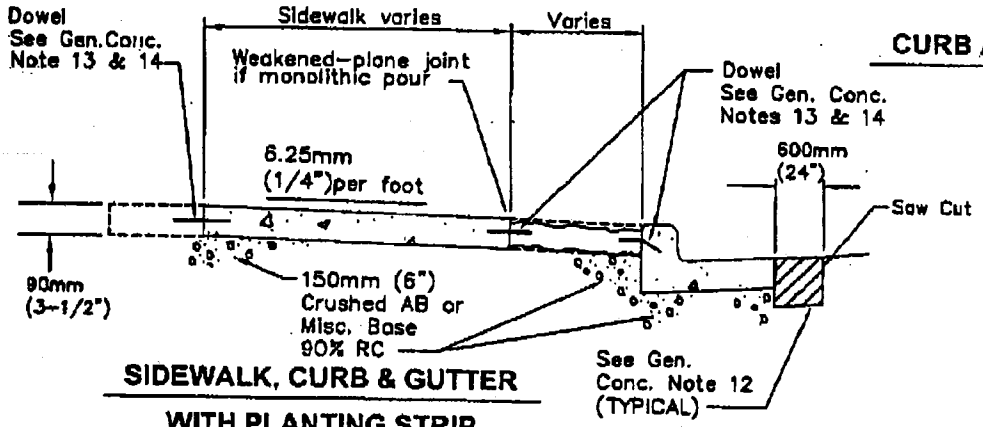
DRAWN	CHECKED	DATE	SCALE	SHEET	DWG. NO.	CASE
GF/MLWH/VL	KJ/KRC	May 2002	NONE	1 OF 1	104	3101



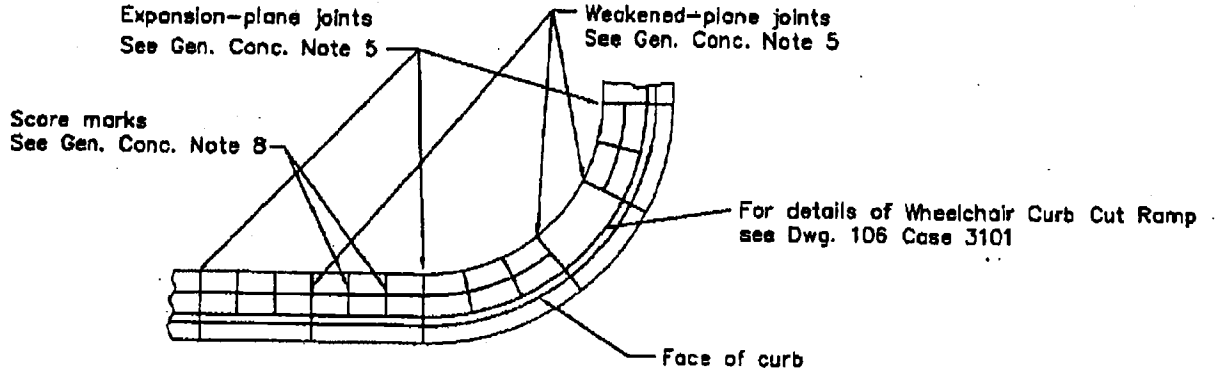
MONOLITHIC SIDEWALK, CURB AND GUTTER



CURB AND GUTTER DETAIL



SIDEWALK, CURB & GUTTER WITH PLANTING STRIP



SIDEWALK AND CURB RETURN

NOTES:

1. All work shall be done in accordance with the Standard Specifications for Public Works Construction, the "GREENBOOK", the most current edition and all supplements thereto, adopted by the Southern California Chapter of the American Public Works Association and the Special Provisions (Technical Specifications) thereto adopted by the City.
2. General Concrete Notes Dwg. 104 Case 3101 shall apply.
3. Minimum sidewalk width shall be 1.82m (6') for residential, 2.4m (8') for commercial areas unless approved otherwise by City Engineer.

ACAD FILE: C3101D100.DWG

CITY OF SAN LEANDRO * STANDARD PLANS

NO.	REVISIONS	DATE

CONCRETE CURB, GUTTER AND SIDEWALK

APPROVED Kenneth Joseph, City Engineer R.C.E. No.54870 Expires 9/30/03 6/24/03

DRAWN	CHECKED	DATE	SCALE	SHEET	DWG. NO.	CASE
GF/MLWH/VL	KJ/KRC	May 2002	NONE	1 OF 1	100	3101

CITY OF SAN LEANDRO

835 EAST 14th STREET • SAN LEANDRO, CALIFORNIA 94577

RECEIPT NO. 74705

Taxpayer ID# 94-6000421

ENG2007-00291
(510) 420-3339

RECEIVED
CITY OF SAN LEANDRO
AUG - 7 2007
ENG'G / TRANS.

Date 8/7 20 07

Received From CONESTOGA-ROVERS & ASSOCIATES $ 855—

Address 5900 HOLLIS ST., SUITE A, EMERYVILLE, CA, 94608

For 1784 150th AVE, SAN LEANDRO, CA.

ACCT# 3306 #55—

CN 19314 #800—

TOTAL #855—

Account No. CK# 10125 By Victor Semmon

NOT VALID UNTIL RECEIPTED BY CASHIER

ORM 095

Printed on Recycled Paper

~FAX_5 00001 USAN 08/13/07 15:33:10 0297317 NORMAL NOTICE

Message Number: 0297317 Received by USAN at 15:13 on 08/13/07 by RLN

Work Begins: 08/15/07 at 15:30 Notice: 020 hrs Priority: 2

Expires: 09/10/07 at 17:00 Update By: 09/06/07 at 16:59

Caller: LAUREN GOLDFITCH
Company: CONESTOGA / ROVERS & ASSOCIATES
Address: 5900 HOLLIS ST STE A
City: EMERYVILLE State: CA Zip: 94608
Business Tel: 510-420-3339 Fax: 510-420-9170
Email Address:

Nature of Work: VERTICAL BORING FOR SOIL SAMPLES
Done for: SHELL Explosives: N
Foreman: SCOTT LEWIS
Field Tel: Cell Tel: 707-249-0697
Area Premarked: Y Premark Method: WHITE PAINT
Permit Type: COUNTY Number: UNK
Vac / Pwr Equip Use In The Approx Location Of Member Facilities Requested: Y
Excavation Enters Into Street Or Sidewalk Area: Y

Location:
Street Address: 1784 150TH AVE
Between: PORTOFINO CIR
And: FREEDOM AVE
WRK ENT PROP & IN SI/WLK ACROSS FR ADDR

Place: SAN LEANDRO County: ALAMEDA State: CA

Long/Lat Long: -122.127600 Lat: 37.706922 Long: -122.122335 Lat: 37.711471

Sent to:
√ATTCAL = AT&T COMM CALIFORNIA
COMHAY = COMCAST-HAYWARD
√EBWOK3 = EAST BAY WATER OAKLAND 3
√PBTHAY = PACIFIC BELL HAYWARD
COALAM = COUNTY ALAMEDA
√CTYSLE = CITY SAN LEANDRO
√OLOSAN = ORO LOMA SANITARY DIST
√PGEHAY = PGE DISTR HAYWARD

Water Main offsite
1784 150th Ave
San Leandro

Attachment D

CPT Logs and Boring Logs

GREGG IN SITU, INC.

GEOTECHNICAL AND ENVIRONMENTAL INVESTIGATION SERVICES

SEP 20 2007

RECEIVED

September 4, 2007

CRA
Attn: Scott Lewis
408 Seventh St., Suite A
Eureka, California 95501

Subject: CPT Site Investigation
Shell Branded Station
San Leandro, California
GREGG Project Number: 07-260MA
1784 150th Ave, SL

Dear Mr. Lewis:

The following report presents the results of GREGG Drilling & Testing's Cone Penetration Test investigation for the above referenced site. The following testing services were performed:

1	Cone Penetration Tests	(CPTU)	☒
2	Pore Pressure Dissipation Tests	(PPD)	☒
3	Seismic Cone Penetration Tests	(SCPTU)	☐
4	Resistivity Cone Penetration Tests	(RCPTU)	☐
5	UVIF Cone Penetration Tests	(UVIFCPTU)	☐
6	Groundwater Sampling	(GWS)	☒
7	Soil Sampling	(SS)	☐
8	Vapor Sampling	(VS)	☐
9	Vane Shear Testing	(VST)	☐
10	SPT Energy Calibration	(SPTE)	☐

A list of reference papers providing additional background on the specific tests conducted is provided in the bibliography following the text of the report. If you would like a copy of any of these publications or should you have any questions or comments regarding the contents of this report, please do not hesitate to contact our office at (925) 313-5800.

Sincerely,
GREGG Drilling & Testing, Inc.

Mary Walden
Operations Manager

Cone Penetration Test Sounding Summary

-Table 1-

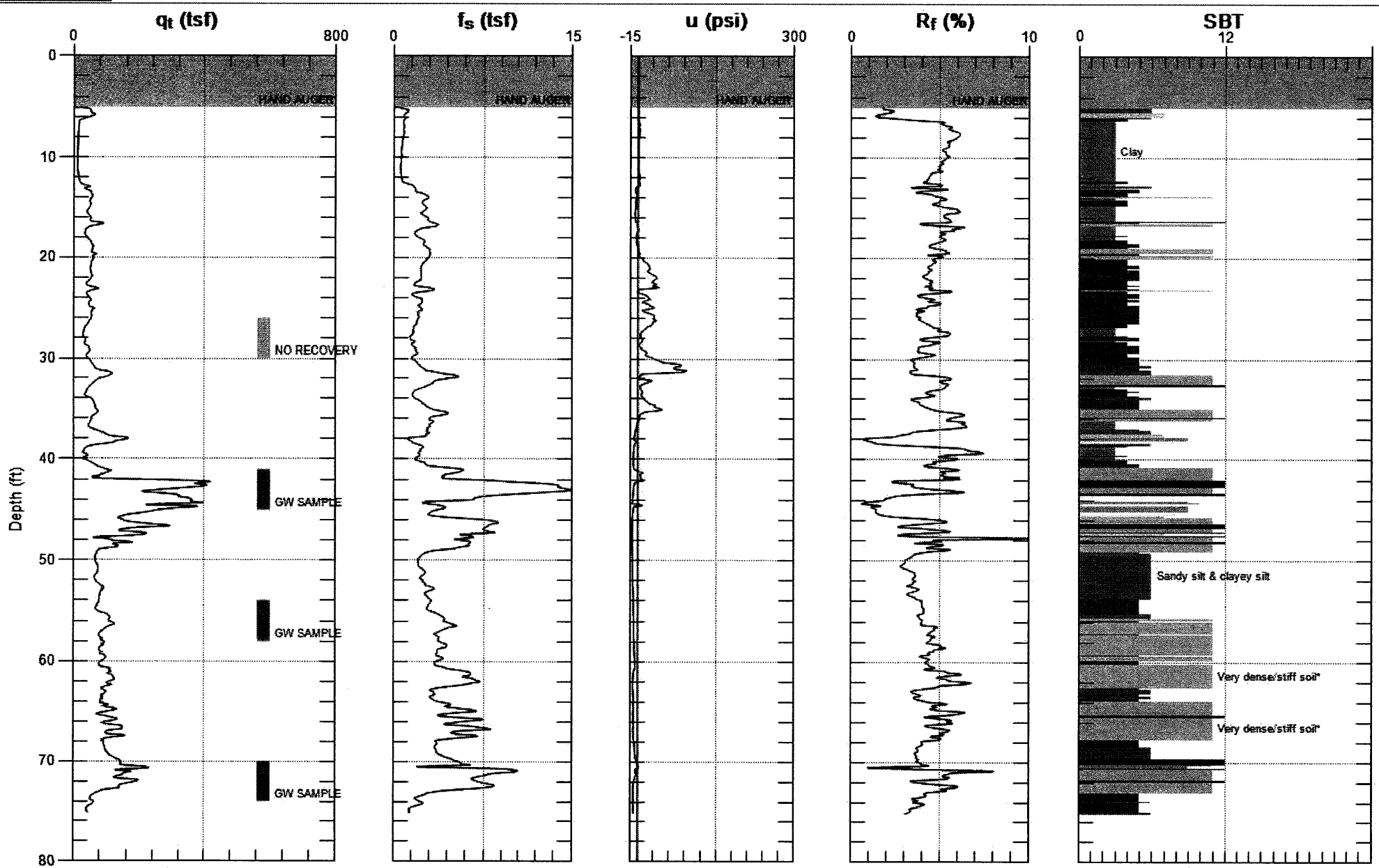
CPT Sounding Identification	Date	Termination Depth (Feet)	Depth of Groundwater Samples (Feet)	Depth of Soil Samples (Feet)	Depth of Pore Pressure Dissipation Tests (Feet)
CPT-01	8/30/07	75	30NR, 45, 58, 74	-	38.1
CPT-02	8/29/07	75	25NR, 39	-	56.3
CPT-03	8/29/07	75	27, 53, 73	-	25.1, 63.2
CPT-05	8/30/07	75	32NR, 45, 57, 74	-	39.7
CPT-06	8/30/07	75	25NR, 30NR, 44, 56NR, 74	-	39.0, 59.2

GREGG

CRA

Site: SHELL BRANDED STATION Engineer: S.LEWIS

Sounding: CPT-01 Date: 8/30/2007 02:19



Max. Depth: 75.131 (ft)
Avg. Interval: 0.164 (ft)

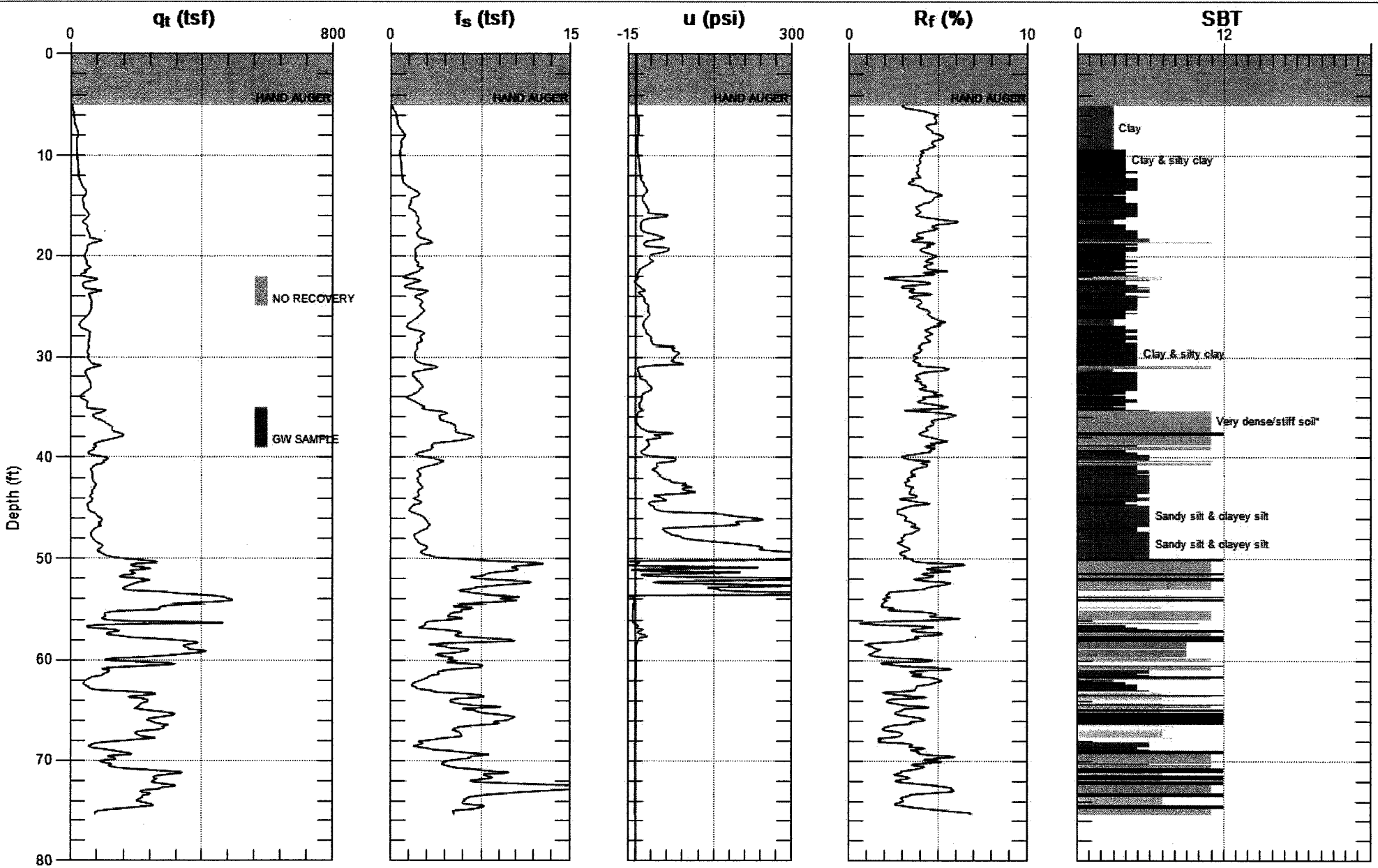
SBT: Soil Behavior Type (Robertson 1990)

GREGG

CRA

Site: SHELL BRANDED STATION Engineer: S.LEWIS

Sounding: CPT-02 Date: 8/29/2007 01:58



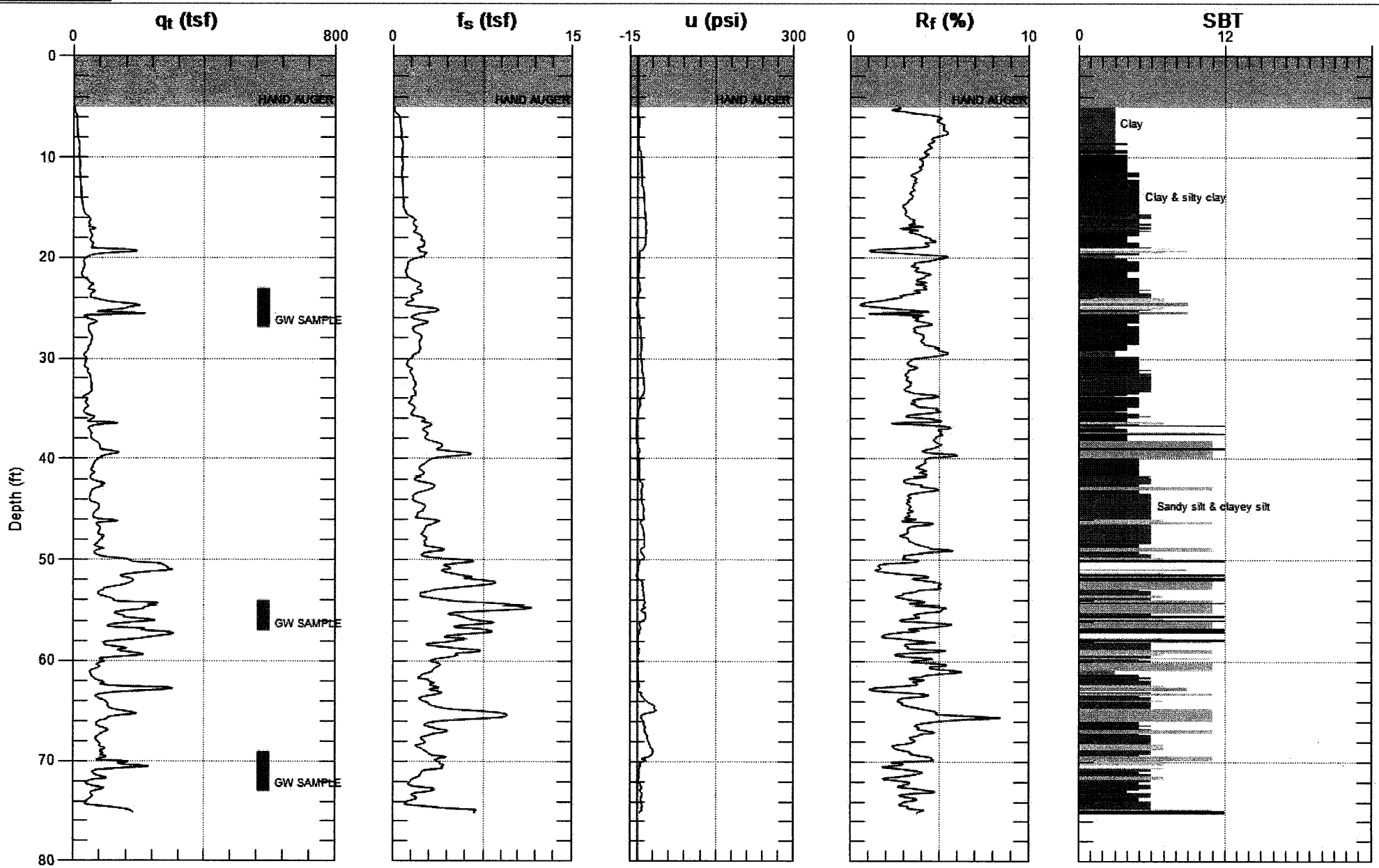
Max. Depth: 75.295 (ft)
Avg. Interval: 0.164 (ft)

SBT: Soil Behavior Type (Robertson 1990)

GREGG **CRA**

Site: SHELL BRANDED STATION **Engineer: S.LEWIS**

Sounding: CPT-03 **Date: 8/29/2007 08:43**



Max. Depth: 75.131 (ft)
Avg. Interval: 0.164 (ft)

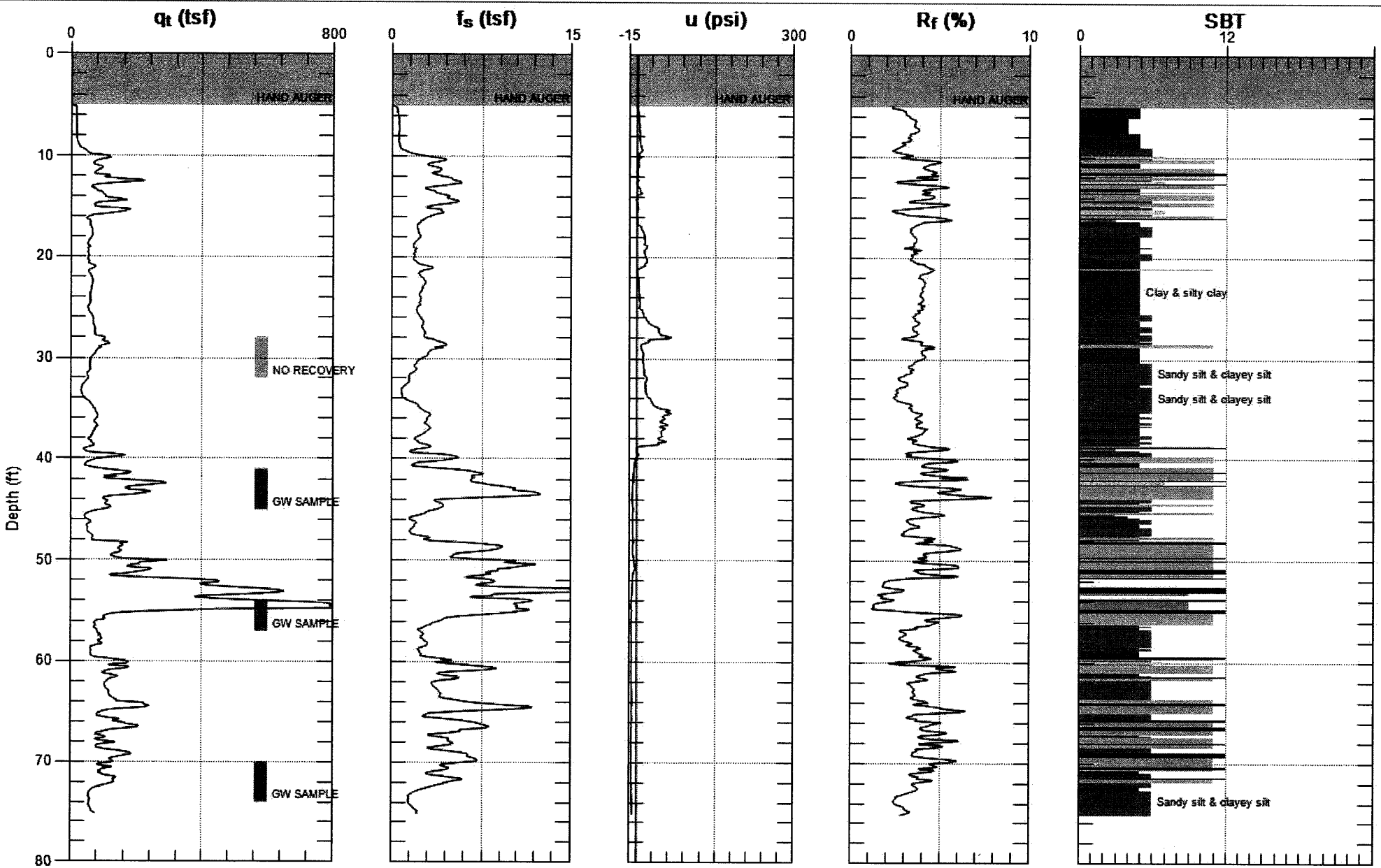
SBT: Soil Behavior Type (Robertson 1990)

GREGG

CRA

Site: SHELL BRANDED STATION Engineer: S.LEWIS

Sounding: CPT-05 Date: 8/31/2007 08:15



Max. Depth: 75.131 (ft)
Avg. Interval: 0.164 (ft)

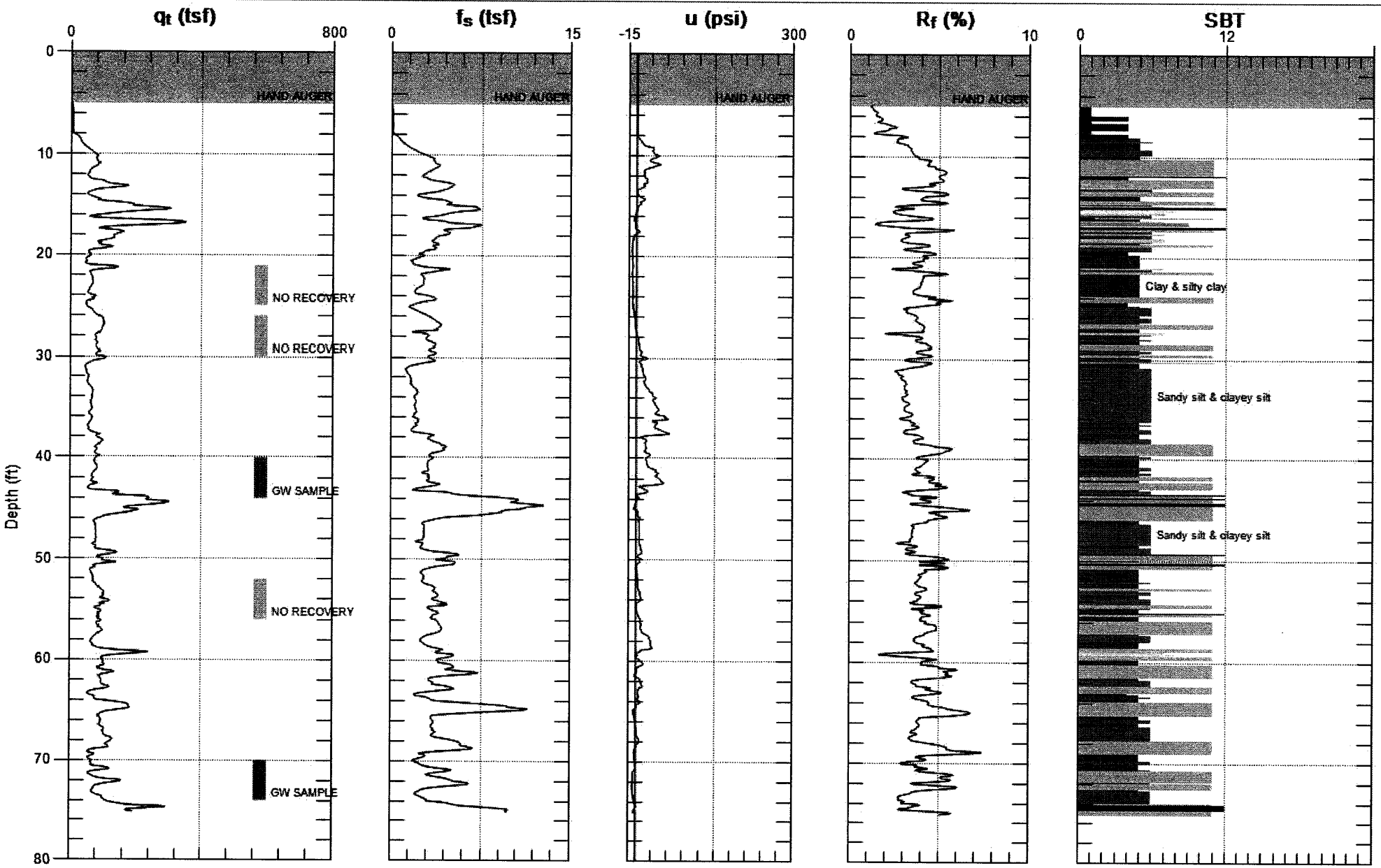
SBT: Soil Behavior Type (Robertson 1990)

GREGG

CRA

Site: SHELL BRANDED STATION Engineer: S.LEWIS

Sounding: CPT-06 Date: 8/30/2007 08:47



Max. Depth: 75.131 (ft)
Avg. Interval: 0.164 (ft)

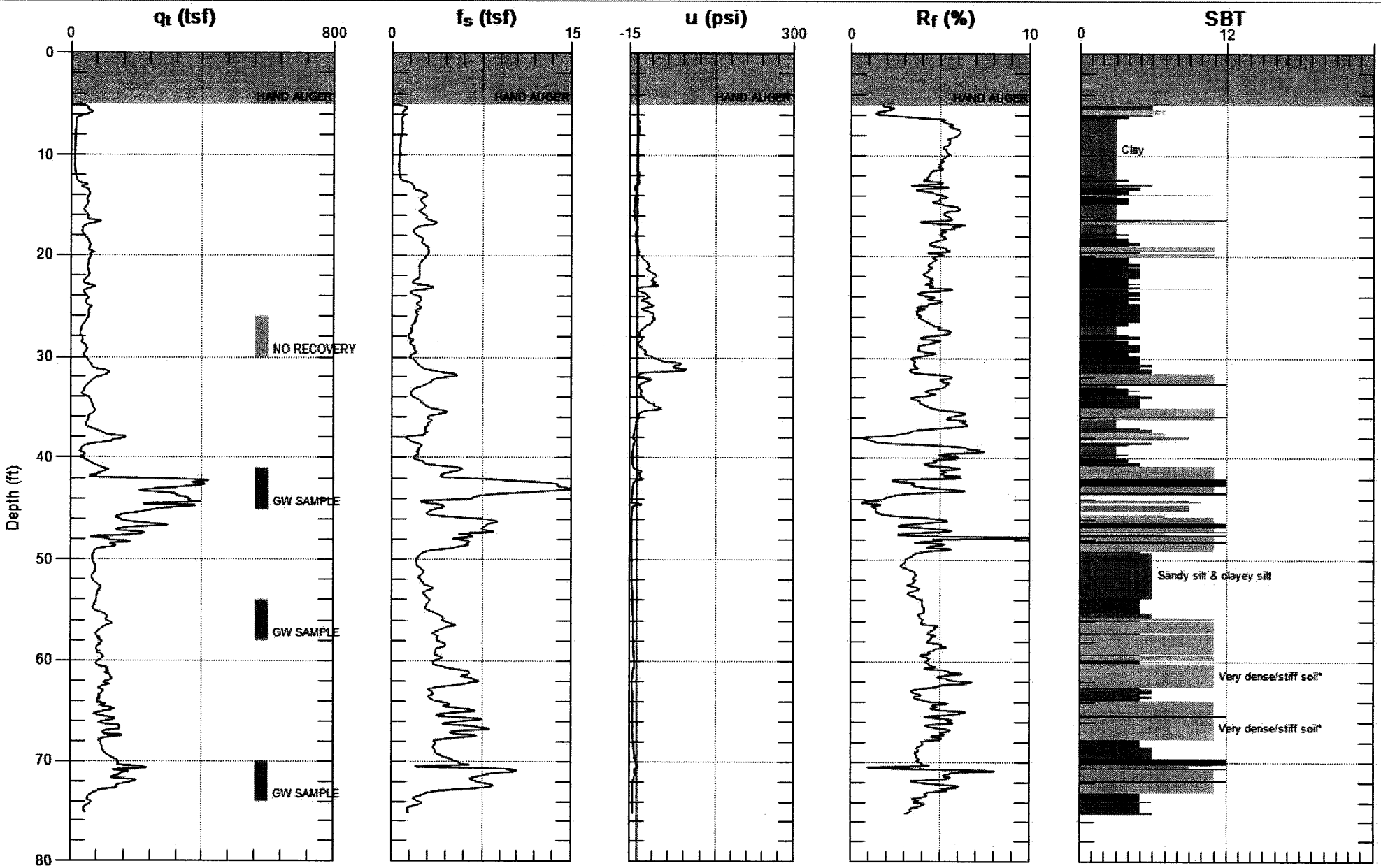
SBT: Soil Behavior Type (Robertson 1990)

GREGG

CRA

Site: SHELL BRANDED STATION Engineer: S.LEWIS

Sounding: CPT-01 Date: 8/30/2007 02:19



Max. Depth: 75.131 (ft)
Avg. Interval: 0.164 (ft)

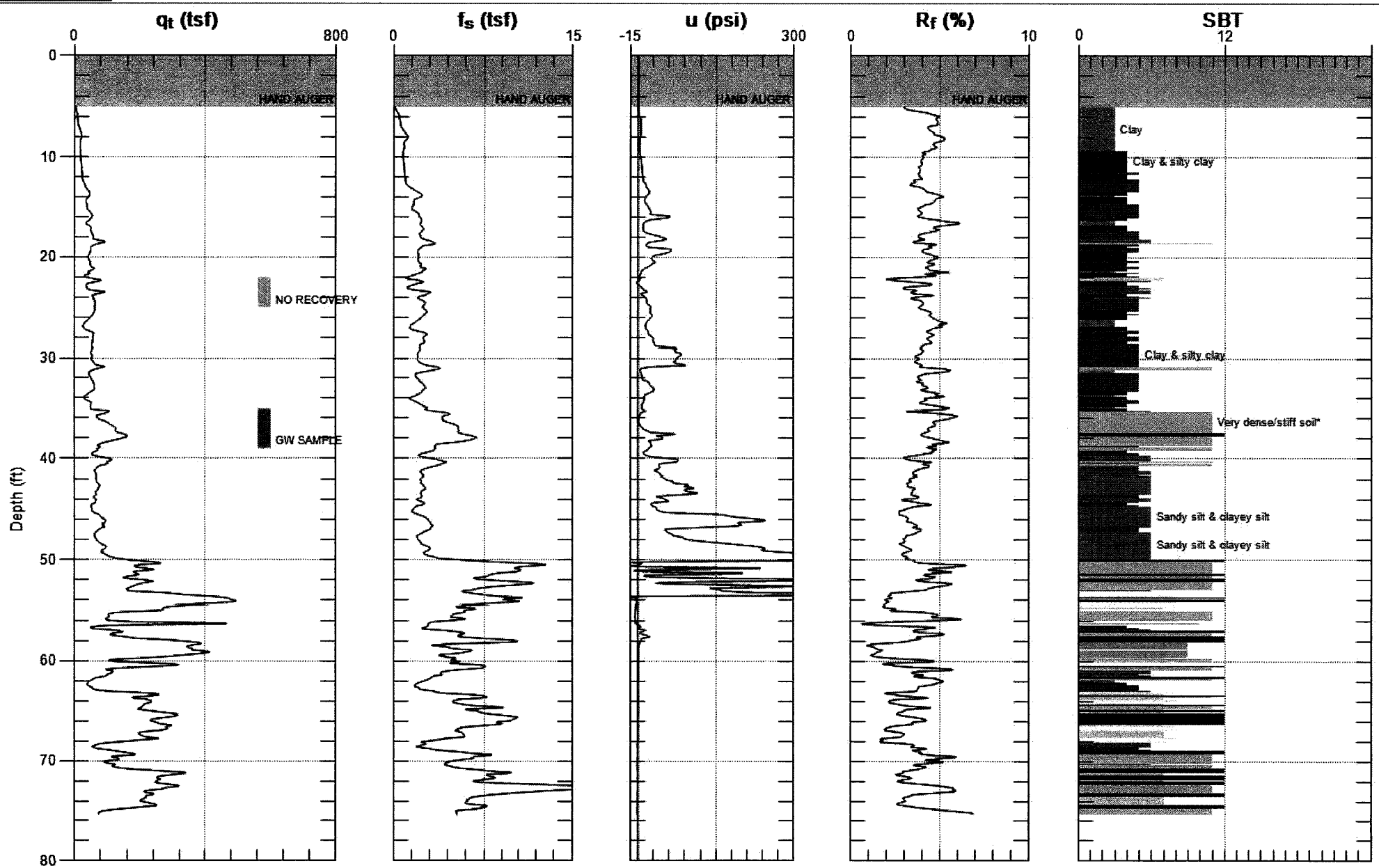
SBT: Soil Behavior Type (Robertson 1990)

GREGG

CRA

Site: SHELL BRANDED STATION Engineer: S.LEWIS

Sounding: CPT-02 Date: 8/29/2007 01:58



Max. Depth: 75.295 (ft)
Avg. Interval: 0.164 (ft)

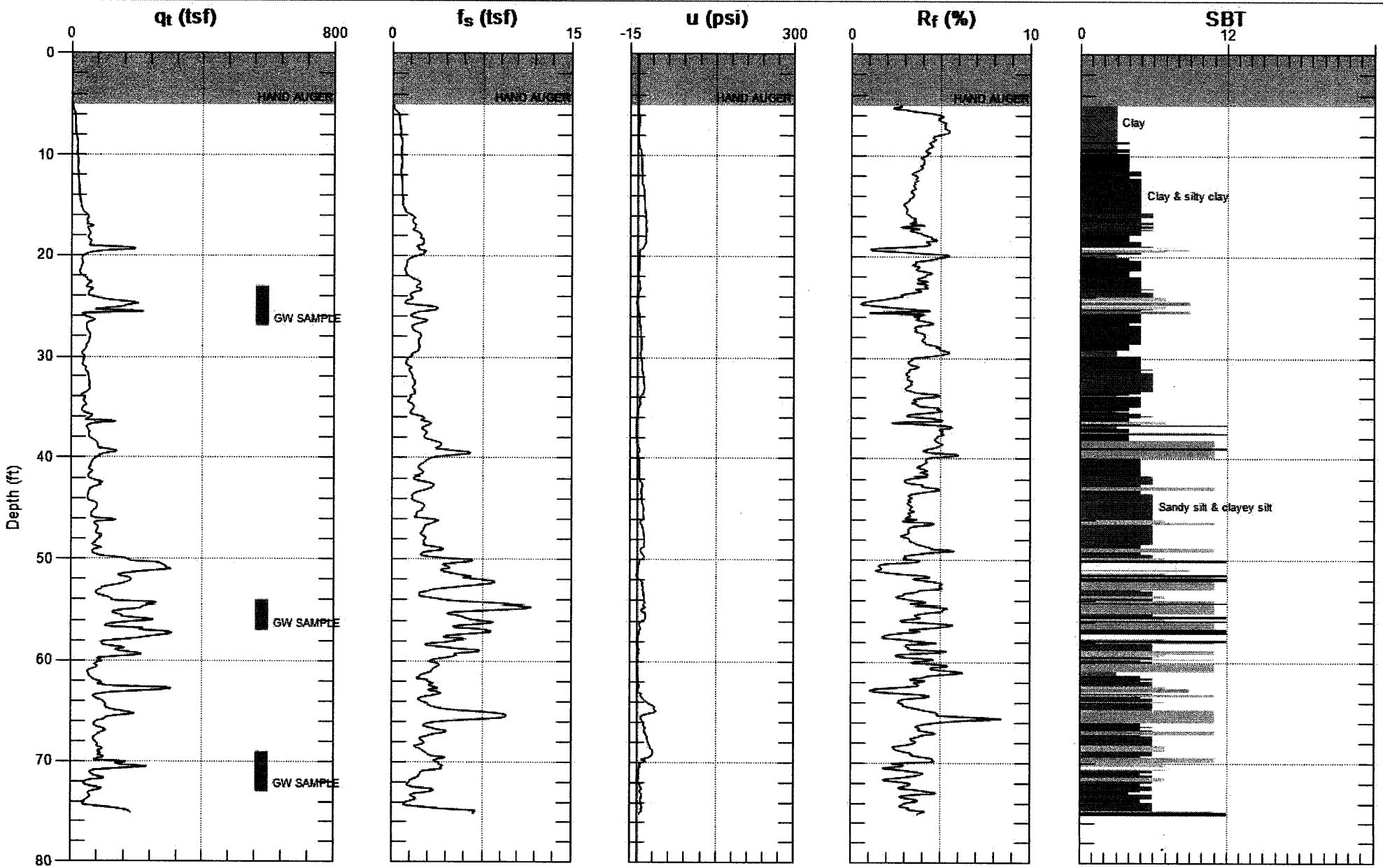
SBT: Soil Behavior Type (Robertson 1990)

GREGG

CRA

Site: SHELL BRANDED STATION Engineer: S.LEWIS

Sounding: CPT-03 Date: 8/29/2007 08:43



Max. Depth: 75.131 (ft)
Avg. Interval: 0.164 (ft)

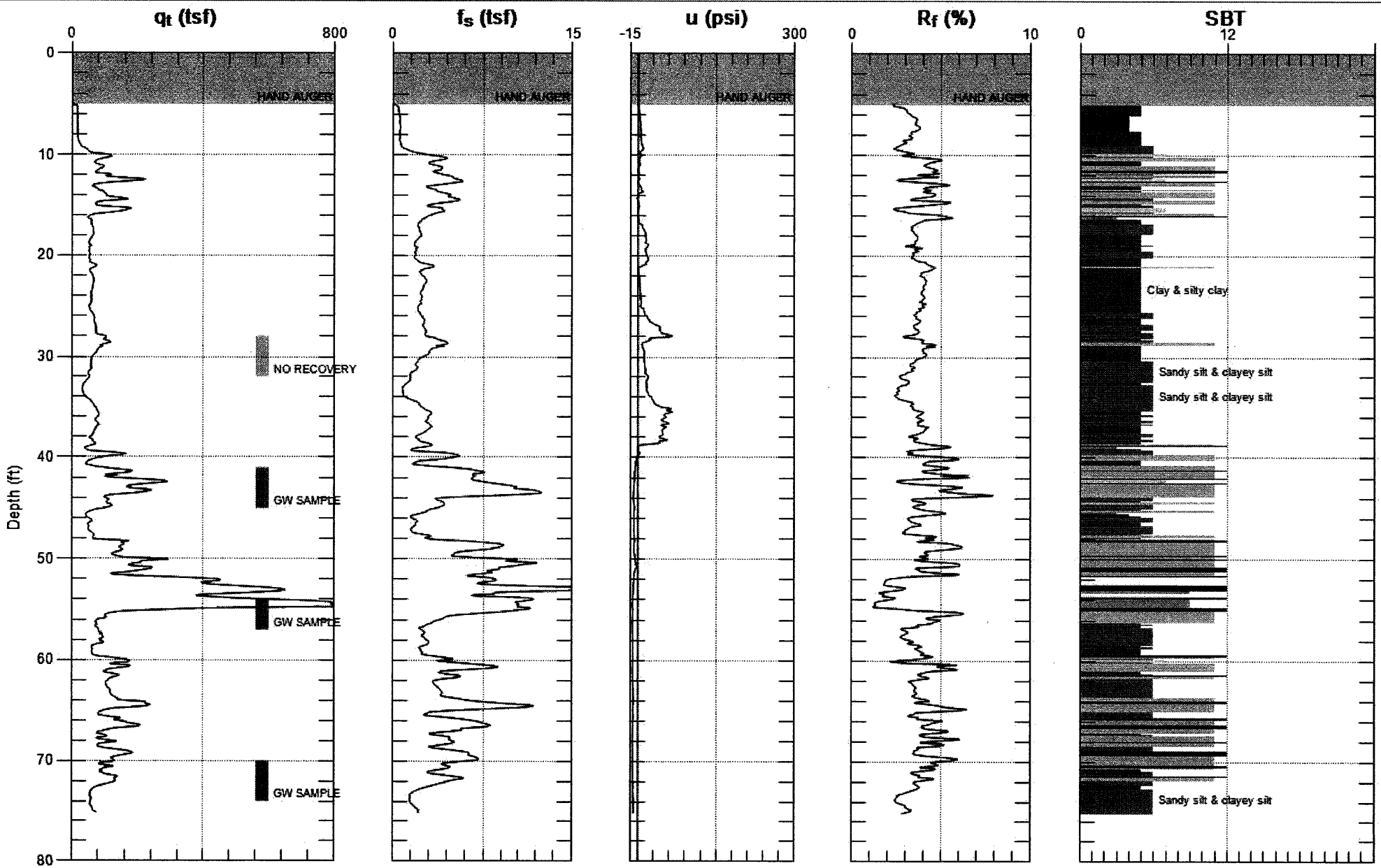
SBT: Soil Behavior Type (Robertson 1990)

GREGG

CRA

Site: SHELL BRANDED STATION Engineer: S.LEWIS

Sounding: CPT-05 Date: 8/31/2007 08:15



Max. Depth: 75.131 (ft)
Avg. Interval: 0.164 (ft)

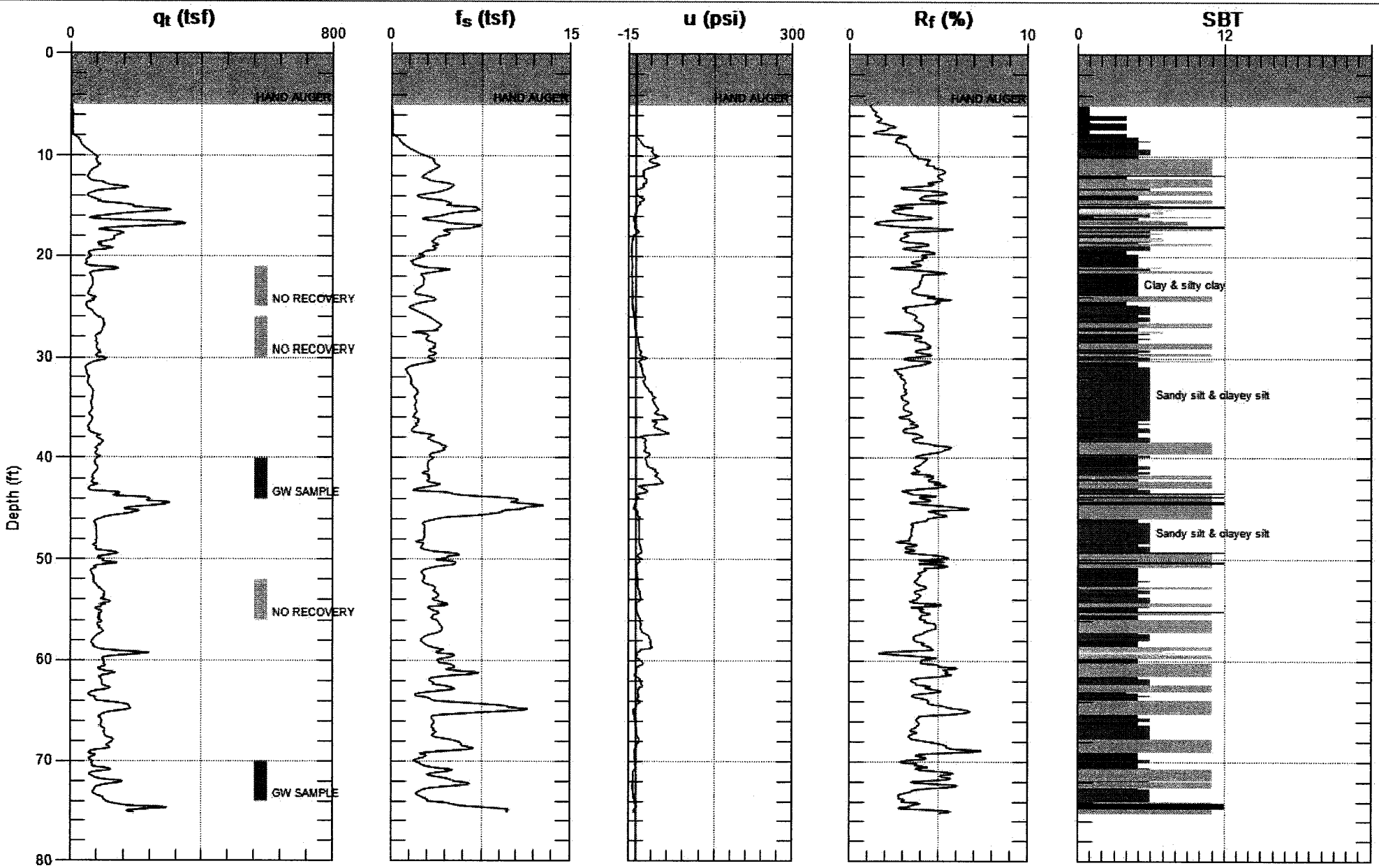
SBT: Soil Behavior Type (Robertson 1990)

GREGG

CRA

Site: SHELL BRANDED STATION Engineer: S.LEWIS

Sounding: CPT-06 Date: 8/30/2007 08:47



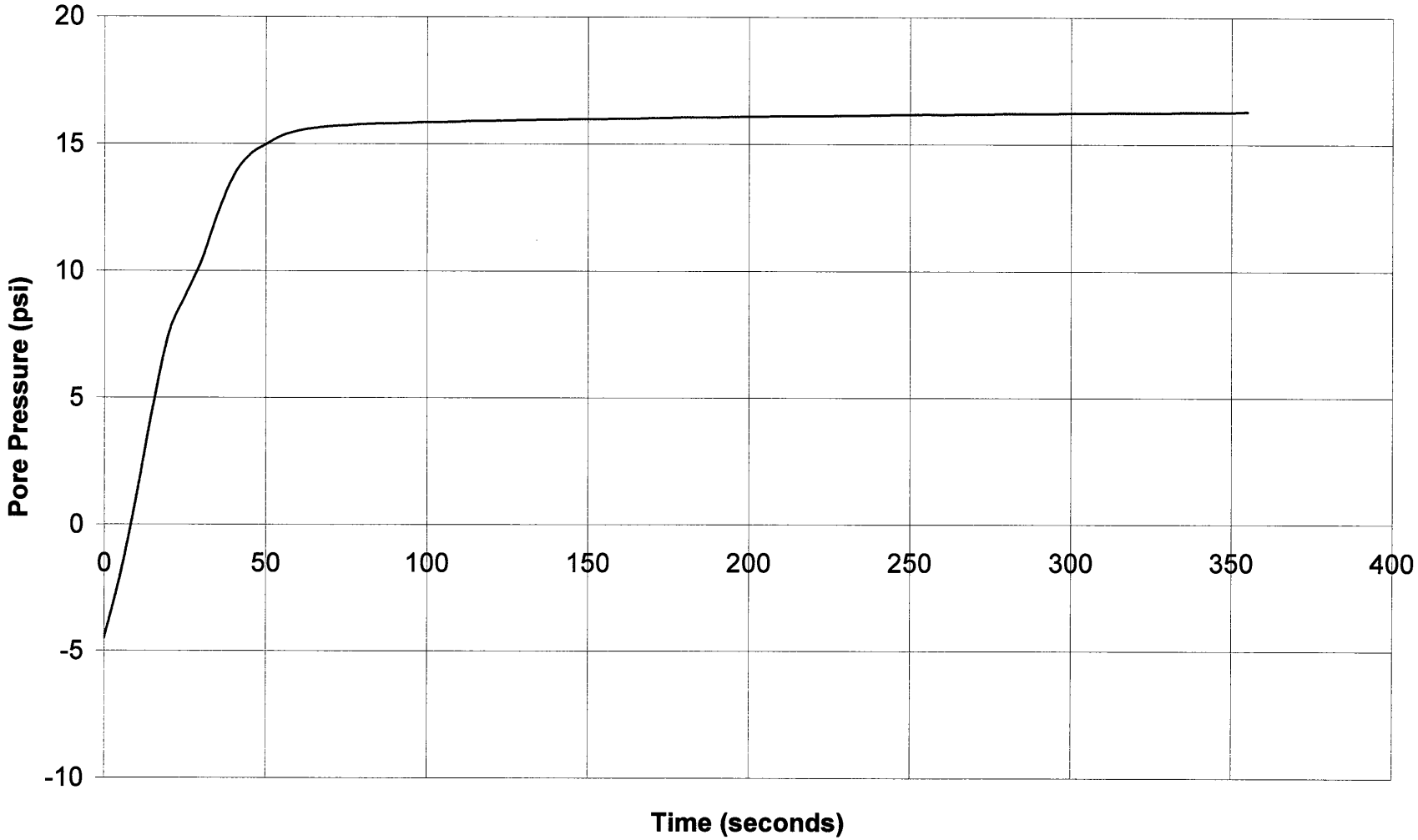
Max. Depth: 75.131 (ft)
Avg. Interval: 0.164 (ft)

SBT: Soil Behavior Type (Robertson 1990)

GREGG DRILLING & TESTING

Pore Pressure Dissipation Test

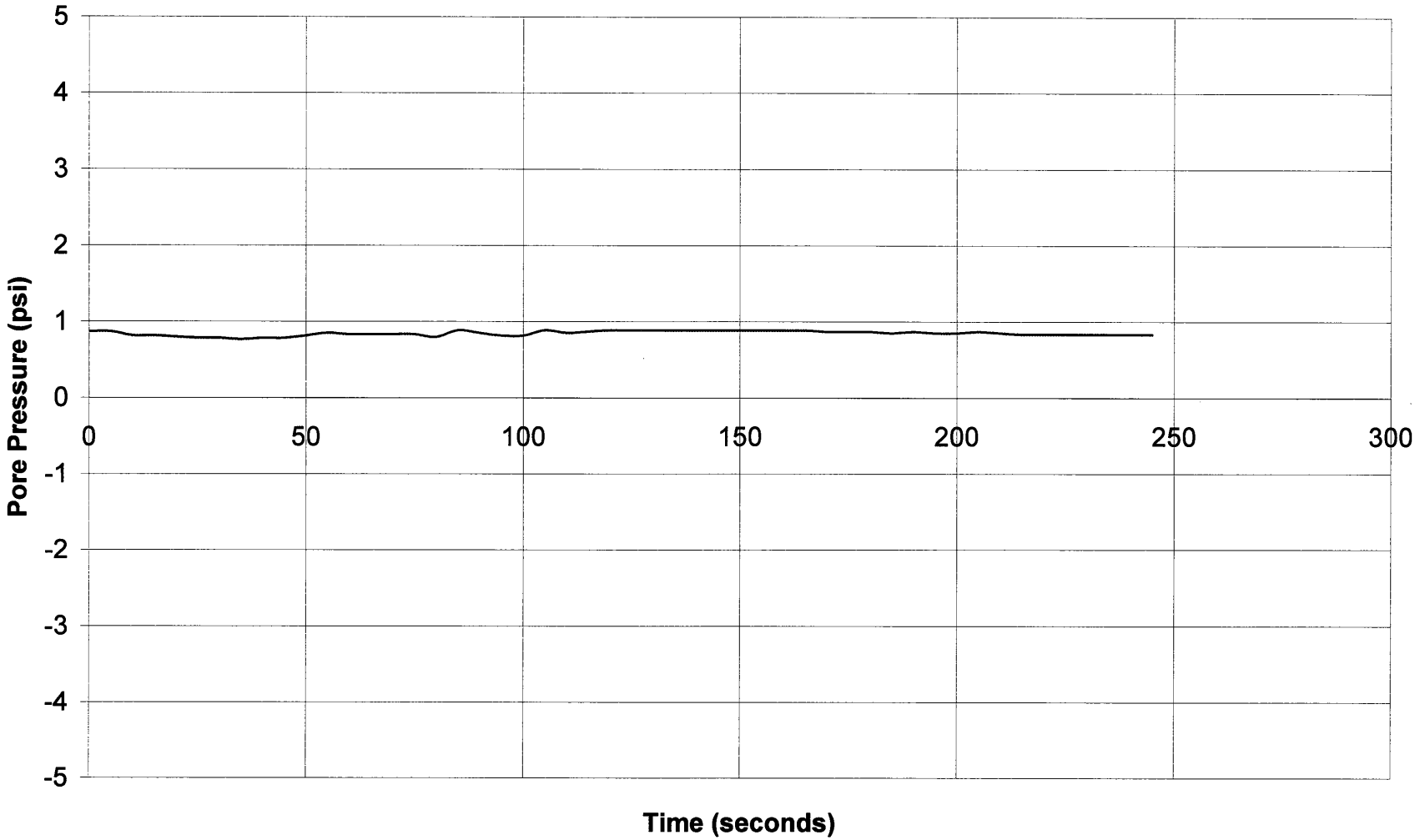
Sounding: CPT-02
Depth: 56.266
Site: SHELL STATION
Engineer: S.LEWIS



GREGG DRILLING & TESTING

Pore Pressure Dissipation Test

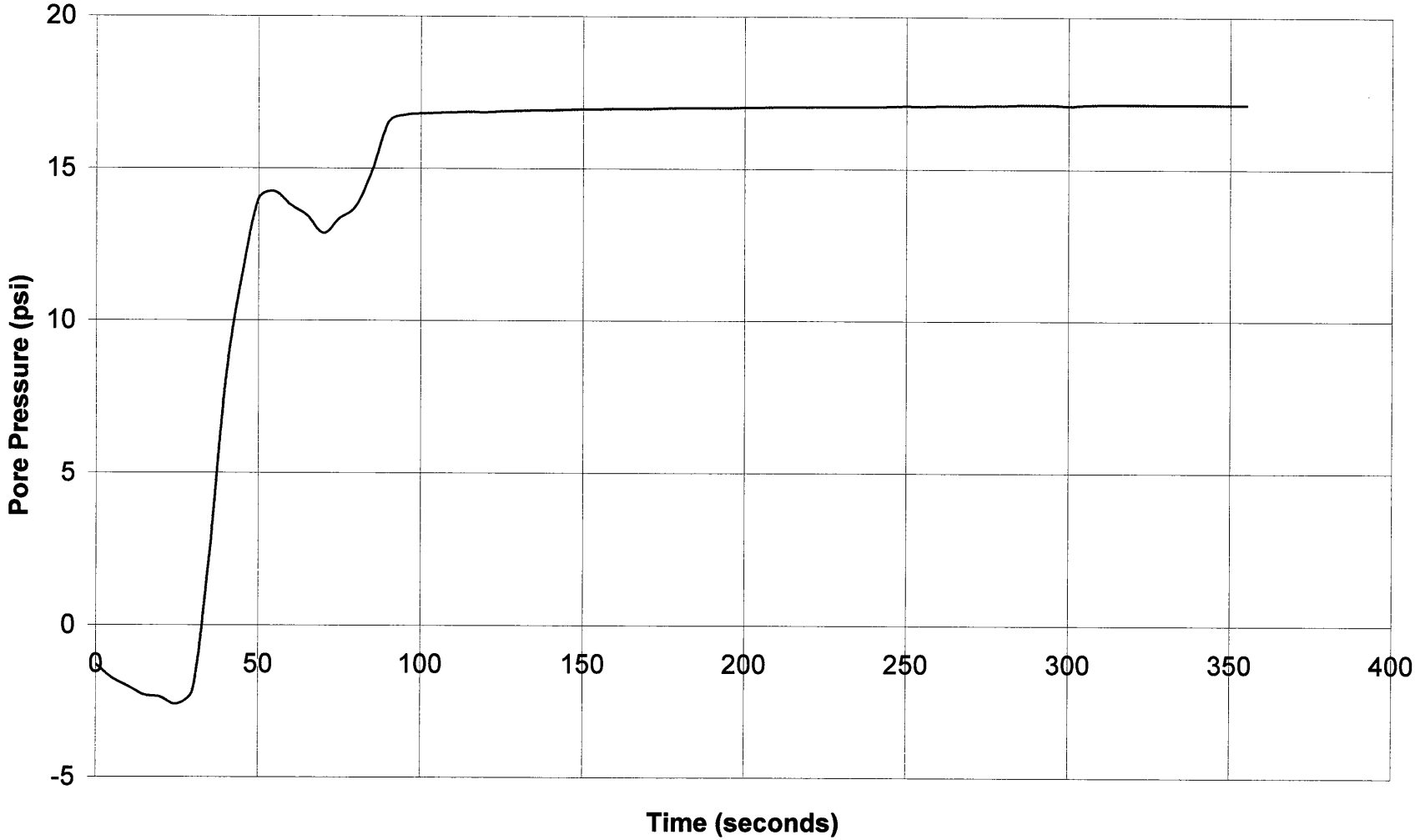
Sounding: CPT-03
Depth: 25.098
Site: SHELL STATION
Engineer: S.LEWIS



GREGG DRILLING & TESTING

Pore Pressure Dissipation Test

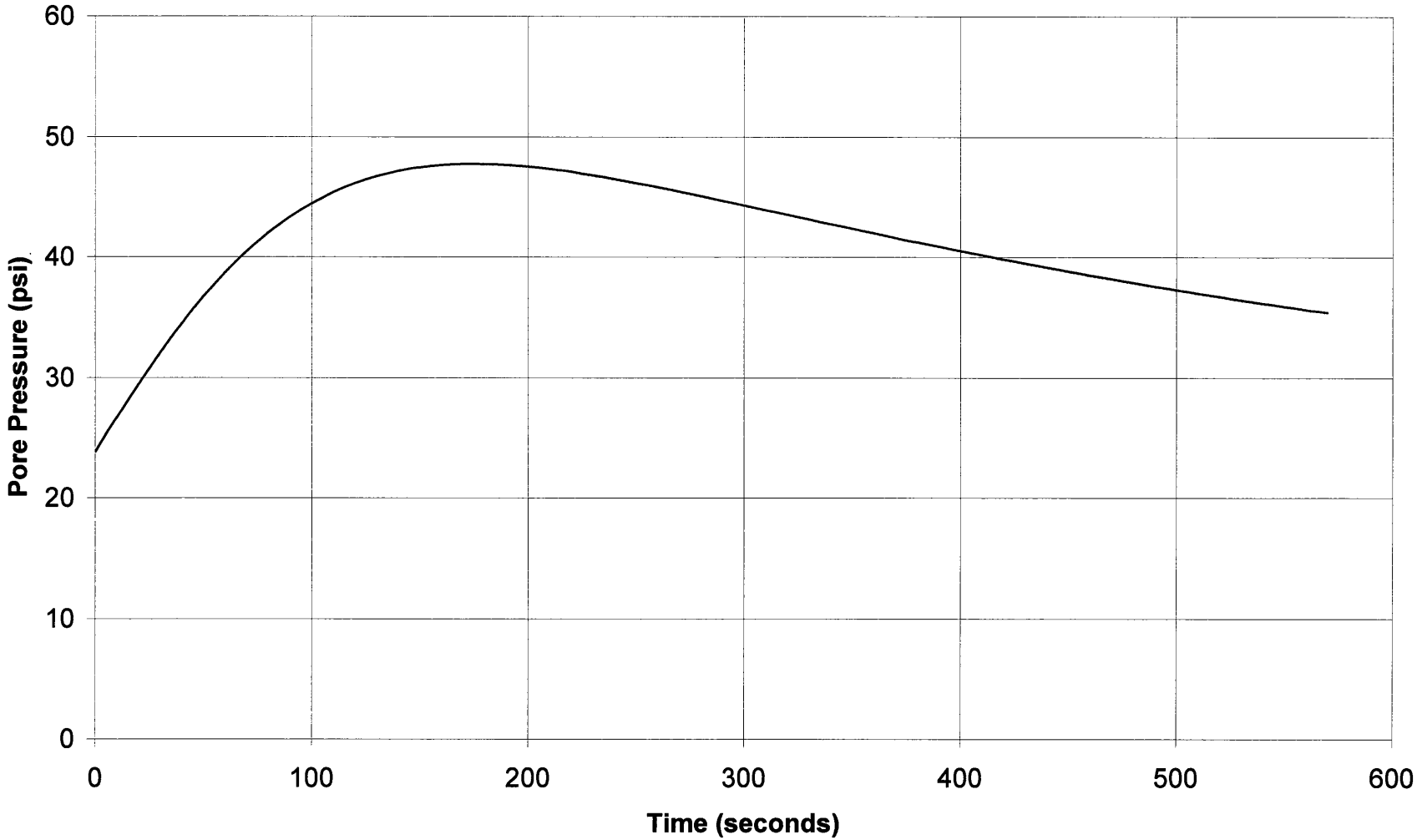
Sounding: CPT-03
Depth: 63.156
Site: SHELL STATION
Engineer: S.LEWIS



GREGG DRILLING & TESTING

Pore Pressure Dissipation Test

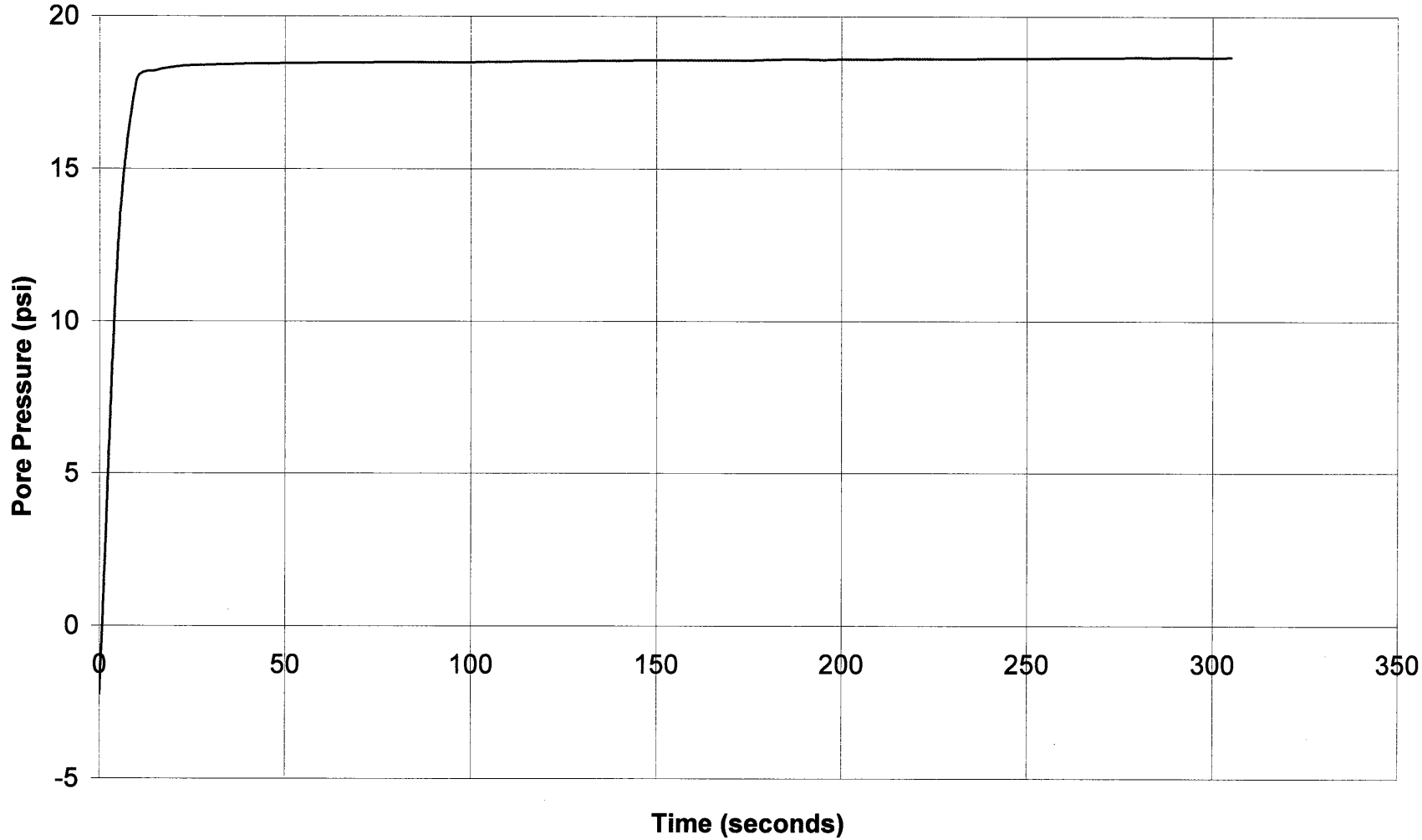
Sounding: CPT-06
Depth: 39.042
Site: SHELL STATION
Engineer: S.LEWIS



GREGG DRILLING & TESTING

Pore Pressure Dissipation Test

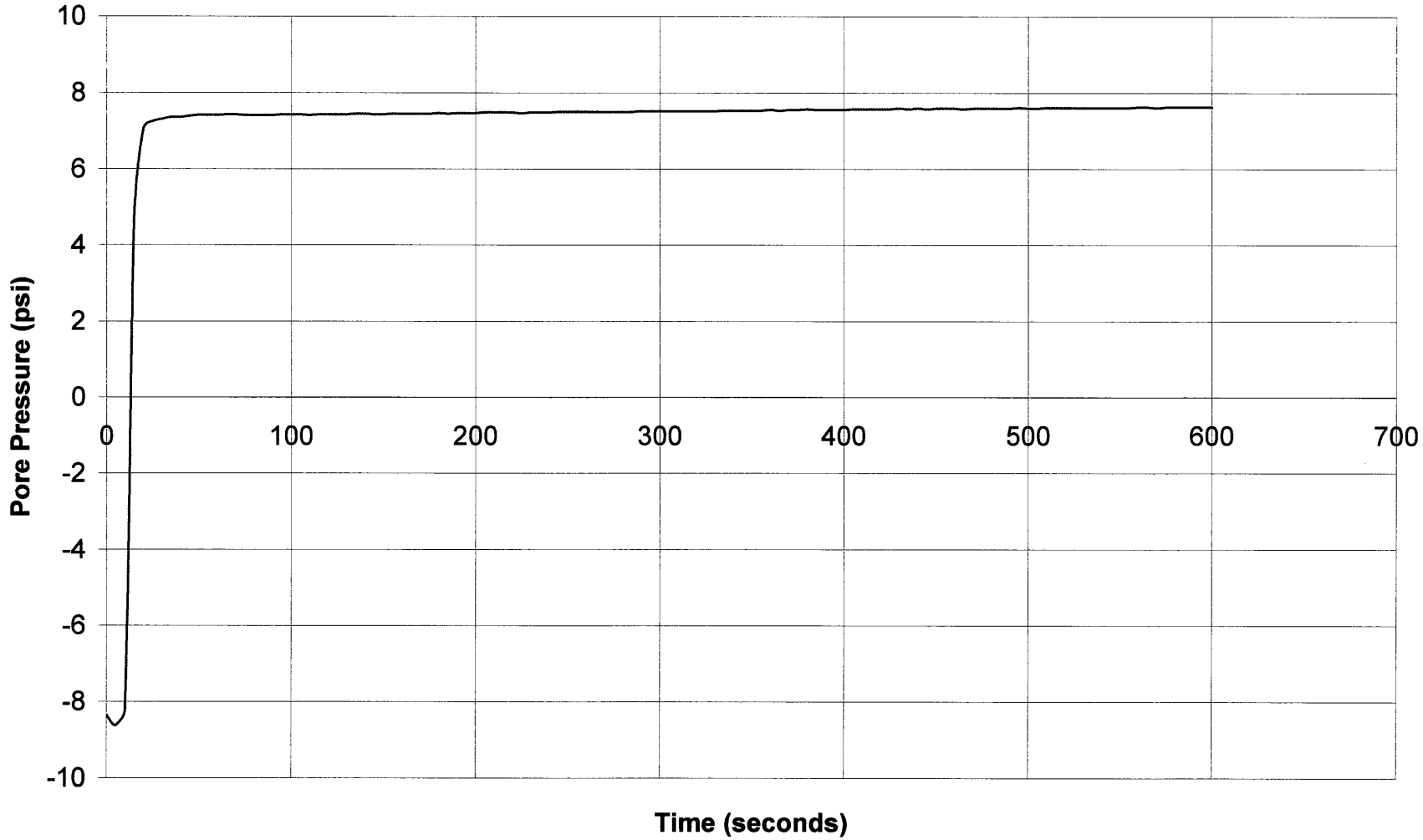
Sounding: CPT-06
Depth: 59.219
Site: SHELL STATION
Engineer: S.LEWIS



GREGG DRILLING & TESTING

Pore Pressure Dissipation Test

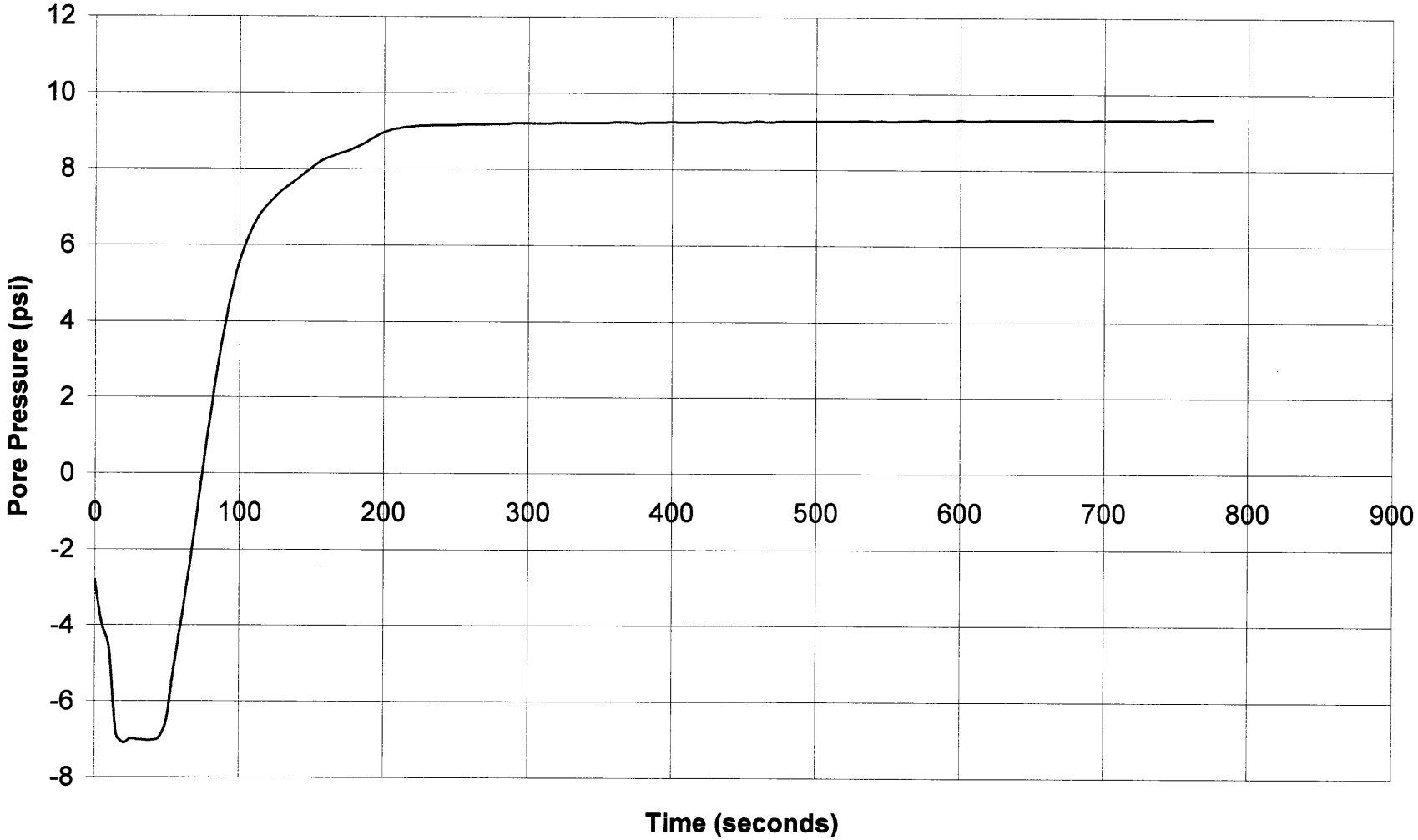
Sounding: CPT-01
Depth: 38.058
Site: SHELL STATION
Engineer: S.LEWIS



GREGG DRILLING & TESTING

Pore Pressure Dissipation Test

Sounding: CPT-05
Depth: 39.698
Site: SHELL STATION
Engineer: S.LEWIS



APPENDIX CPT

Cone Penetration Testing Procedure (CPT)

Gregg In Situ, Inc. carries out all Cone Penetration Tests (CPT) using an integrated electronic cone system, *Figure CPT*. The soundings were conducted using a 20 ton capacity cone with a tip area of 15 cm^2 and a friction sleeve area of 225 cm^2. The cone is designed with an equal end area friction sleeve and a tip end area ratio of 0.80.

The cone takes measurements of cone bearing (q_c), sleeve friction (f_s) and penetration pore water pressure (u_2) at 5-cm intervals during penetration to provide a nearly continuous hydrogeologic log. CPT data reduction and interpretation is performed in real time facilitating on-site decision making. The above mentioned parameters are stored on disk for further analysis and reference. All CPT soundings are performed in accordance with revised (2002) ASTM standards (D 5778-95).

The cone also contains a porous filter element located directly behind the cone tip (u_2), *Figure CPT*. It consists of porous plastic and is 5.0mm thick. The filter element is used to obtain penetration pore pressure as the cone is advanced as well as Pore Pressure Dissipation Tests (PPDT's) during appropriate pauses in penetration. It should be noted that prior to penetration, the element is fully saturated with silicon oil under vacuum pressure to ensure accurate and fast dissipation.

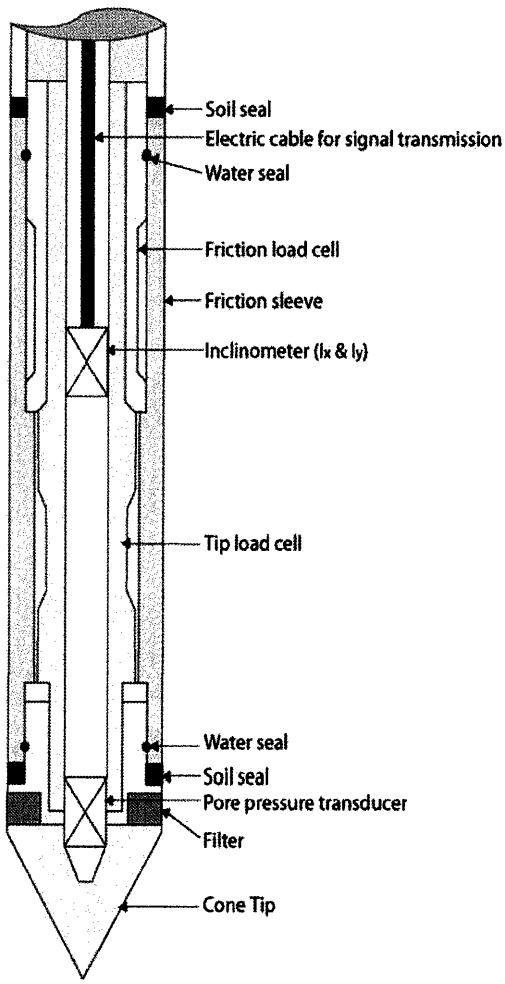


Figure CPT

When the soundings are complete, the test holes are grouted using a Gregg In Situ support rig. The grouting procedures generally consist of pushing a hollow CPT rod with a "knock out" plug to the termination depth of the test hole. Grout is then pumped under pressure as the tremie pipe is pulled from the hole. Disruption or further contamination to the site is therefore minimized.

Cone Penetration Test Data & Interpretation

Soil behavior type and stratigraphic interpretation is based on relationships between cone bearing (q_c), sleeve friction (f_s), and pore water pressure (u_2). The friction ratio (R_f) is a calculated parameter defined by $100 f_s/q_c$ and is used to infer soil behavior type. Generally:

Cohesive soils (clays)

- High friction ratio (R_f) due to small cone bearing (q_c)
- Generate large excess pore water pressures (u_2)

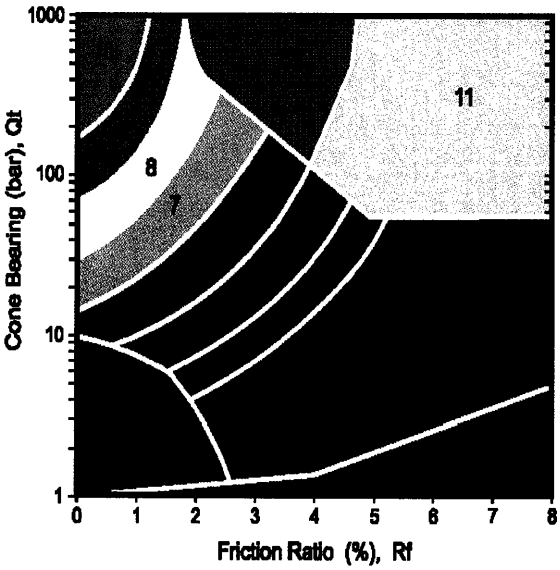
Cohesionless soils (sands)

- Low friction ratio (R_f) due to large cone bearing (q_c)
- Generate very little excess pore water pressures (u_2)

A complete set of baseline readings are taken prior to and at the completion of each sounding to determine temperature shifts and any zero load offsets. Corrections for temperature shifts and zero load offsets can be extremely important, especially when the recorded loads are relatively small. In sandy soils, however, these corrections are generally negligible.

The cone penetration test data collected from your site is presented in graphical form in Appendix CPT. The data includes CPT logs of measured soil parameters, computer calculations of interpreted soil behavior types (SBT), and additional geotechnical parameters. A summary of locations and depths is available in Table 1. Note that all penetration depths referenced in the data are with respect to the existing ground surface.

Soil interpretation for this project was conducted using recent correlations developed by Robertson, 1990, *Figure SBT*. Note that it is not always possible to clearly identify a soil type based solely on q_c, f_s, and u_2. In these situations, experience, judgment, and an assessment of the pore pressure dissipation data should be used to infer the soil behavior type.



ZONE	Qt/N	SBT
1	2	Sensitive, fine grained
2	1	Organic materials
3	1	Clay
4	1.5	Silty clay to clay
5	2	Clayey silt to silty clay
6	2.5	Sandy silt to clayey silt
7	3	Silty sand to sandy silt
8	4	Sand to silty sand
9	5	Sand
10	6	Gravely sand to sand
11	1	Very stiff fine grained*
12	2	Sand to clayey sand*

*over consolidated or cemented

Figure SBT

Cone Penetration Test (CPT) Interpretation

Gregg have recently updated their CPT interpretation and plotting software (2007). The software takes the CPT data and performs basic interpretation in terms of soil behavior type (SBT) and various geotechnical parameters using current published empirical correlations based on the comprehensive review by Lunne, Robertson and Powell (1997). The interpretation is presented in tabular format using MS Excel. The interpretations are presented only as a guide for geotechnical use and should be carefully reviewed. Gregg does not warranty the correctness or the applicability of any of the geotechnical parameters interpreted by the software and does not assume any liability for any use of the results in any design or review. The user should be fully aware of the techniques and limitations of any method used in the software.

The following provides a summary of the methods used for the interpretation. Many of the empirical correlations to estimate geotechnical parameters have constants that have a range of values depending on soil type, geologic origin and other factors. The software uses 'default' values that have been selected to provide, in general, conservatively low estimates of the various geotechnical parameters.

Input:

1 Units for display (Imperial or metric) (atm. pressure, pa = 0.96 tsf or 0.1 MPa)
2 Depth interval to average results,(ft or m). Data are collected at either 0.02 or 0.05m and can be averaged every 1, 3 or 5 intervals.
3 Elevation of ground surface (ft or m)
4 Depth to water table, z_w (ft or m) – input required
5 Net area ratio for cone, a (default to 0.80)
6 Relative Density constant, C_{Dr} (default to 350)
7 Young's modulus number for sands, α (default to 5)
8 Small strain shear modulus number
  a. for sands, S_G (default to 180 for SBT_n 5, 6, 7)
  b. for clays, C_G (default to 50 for SBT_n 1, 2, 3 & 4)
9 Undrained shear strength cone factor for clays, N_{kt} (default to 15)
10 Over Consolidation ratio number, k_{ocr} (default to 0.3)
11 Unit weight of water, (default to γ_w = 62.4 lb/ft^3 or 9.81 kN/m^3)

Column

1 Depth, z, (m) – CPT data is collected in meters
2 Depth (ft)
3 Cone resistance, q_c (tsf or MPa)
4 Sleeve friction, f_s (tsf or MPa)
5 Penetration pore pressure, u (psi or MPa), measured behind the cone (i.e. u_2)
6 Other – any additional data, if collected, e.g. electrical resistivity or UVIF
7 Total cone resistance, q_t (tsf or MPa) $q_t = q_c + u(1-a)$

8	Friction Ratio, R_f (%)	$R_f = (f_s/q_t) \times 100\%$
9	Soil Behavior Type (non-normalized), SBT	see note
10	Unit weight, γ (pcf or kN/m^3)	based on SBT, see note
11	Total overburden stress, σ_v (tsf)	$\sigma_{vo} = \gamma z$
12	Insitu pore pressure, u_o (tsf)	$u_o = \gamma_w (z - z_w)$
13	Effective overburden stress, σ'_{vo} (tsf)	$\sigma'_{vo} = \sigma_{vo} - u_o$
14	Normalized cone resistance, Q_{t1}	$Q_{t1} = (q_t - \sigma_{vo}) / \sigma'_{vo}$
15	Normalized friction ratio, F_r (%)	$F_r = f_s / (q_t - \sigma_{vo}) \times 100\%$
16	Normalized Pore Pressure ratio, B_q	$B_q = u - u_o / (q_t - \sigma_{vo})$
17	Soil Behavior Type (normalized), SBT_n	see note
18	SBT_n Index, I_c	see note
19	Normalized Cone resistance, Q_{tn} (n varies with Ic)	see note
20	Estimated permeability, k_{SBT} (cm/sec or ft/sec)	see note
21	Equivalent SPT N_{60}, blows/ft	see note
22	Equivalent SPT $(N_1)_{60}$ blows/ft	see note
23	Estimated Relative Density, D_r, (%)	see note
24	Estimated Friction Angle, ϕ', (degrees)	see note
25	Estimated Young's modulus, E_s (tsf)	see note
26	Estimated small strain Shear modulus, Go (tsf)	see note
27	Estimated Undrained shear strength, s_u (tsf)	see note
28	Estimated Undrained strength ratio	s_u/σ_v'
29	Estimated Over Consolidation ratio, OCR	see note

Notes:

1 Soil Behavior Type (non-normalized), SBT — Lunne et al. (1997) listed below

2 Unit weight, γ either constant at 119 pcf or based on Non-normalized SBT (Lunne et al., 1997 and table below)

3 Soil Behavior Type (Normalized), SBT_n — Lunne et al. (1997)

4 SBT_n Index, I_c — $I_c = ((3.47 - \log Q_{t1})^2 + (\log F_r + 1.22)^2)^{0.5}$

5 Normalized Cone resistance, Q_{tn} (n varies with Ic)

$Q_{tn} = ((q_t - \sigma_{vo})/pa)\ (pa/(\sigma'_{vo})^n$ and recalculate I_c, then iterate:

When $I_c < 1.64$, $n = 0.5$ (clean sand)
When $I_c > 3.30$, $n = 1.0$ (clays)
When $1.64 < I_c < 3.30$, $n = (I_c - 1.64)0.3 + 0.5$
Iterate until the change in n, $\Delta n < 0.01$

6 Estimated permeability, k_{SBT} (based on Normalized SBT_n) (Lunne et al., 1997 and table below)

7 Equivalent SPT N_{60}, blows/ft — Lunne et al. (1997)

$$\frac{(q_t/p_a)}{N_{60}} = 8.5\left(1 - \frac{I_c}{4.6}\right)$$

8 Equivalent SPT $(N_1)_{60}$ blows/ft — $(N_1)_{60} = N_{60} C_N$,
where $C_N = (pa/\sigma'_{vo})^{0.5}$

9 Relative Density, D_r, (%) — $D_r^2 = Q_{tn} / C_{Dr}$
Only SBT_n 5, 6, 7 & 8 — *Show 'N/A' in zones 1, 2, 3, 4 & 9*

10 Friction Angle, ϕ', (degrees) — $\tan\phi' = \frac{1}{2.68}\left[\log\left(\frac{q_c}{\sigma'_{vo}}\right) + 0.29\right]$
Only SBT_n 5, 6, 7 & 8 — *Show 'N/A' in zones 1, 2, 3, 4 & 9*

11 Young's modulus, E_s — $E_s = \alpha\, q_t$
Only SBT_n 5, 6, 7 & 8 — *Show 'N/A' in zones 1, 2, 3, 4 & 9*

12 Small strain shear modulus, Go
a. $G_o = S_G (q_t\ \sigma'_{vo}\ pa)^{1/3}$ — *For SBT_n 5, 6, 7*
b. $G_o = C_G\, q_t$ — *For SBT_n 1, 2, 3& 4*
Show 'N/A' in zones 8 & 9

13 Undrained shear strength, s_u — $s_u = (q_t - \sigma_{vo}) / N_{kt}$
Only SBT_n 1, 2, 3, 4 & 9 — *Show 'N/A' in zones 5, 6, 7 & 8*

14 Over Consolidation ratio, OCR — $OCR = k_{ocr}\, Q_{t1}$
Only SBT_n 1, 2, 3, 4 & 9 — *Show 'N/A' in zones 5, 6, 7 & 8*

SBT Zones **SBT_n Zones**

The following updated and simplified SBT descriptions have been used in the software:

	SBT Zones		SBT_n Zones
1	sensitive fine grained	1	sensitive fine grained
2	organic soil	2	organic soil
3	clay	3	clay
4	clay & silty clay	4	clay & silty clay
5	clay & silty clay		
6	sandy silt & clayey silt		
7	silty sand & sandy silt	5	silty sand & sandy silt
8	sand & silty sand	6	sand & silty sand
9	sand		
10	sand	7	sand
11	very dense/stiff soil*	8	very dense/stiff soil*
12	very dense/stiff soil*	9	very dense/stiff soil*

* heavily overconsolidated and/or cemented

Track when soils fall with zones of same description and print that description (i.e. if soils fall only within SBT zones 4 & 5, print 'clays & silty clays')

Estimated Permeability (see Lunne et al., 1997)

SBT_n	Permeability (ft/sec)	(m/sec)
1	$3x\ 10^{-8}$	$1x\ 10^{-8}$
2	$3x\ 10^{-7}$	$1x\ 10^{-7}$
3	$1x\ 10^{-9}$	$3x\ 10^{-10}$
4	$3x\ 10^{-8}$	$1x\ 10^{-8}$
5	$3x\ 10^{-6}$	$1x\ 10^{-6}$
6	$3x\ 10^{-4}$	$1x\ 10^{-4}$
7	$3x\ 10^{-2}$	$1x\ 10^{-2}$
8	$3x\ 10^{-6}$	$1x\ 10^{-6}$
9	$1x\ 10^{-8}$	$3x\ 10^{-9}$

Estimated Unit Weight (see Lunne et al., 1997)

SBT	Approximate Unit Weight (lb/ft^3)	(kN/m^3)
1	111.4	17.5
2	79.6	12.5
3	111.4	17.5
4	114.6	18.0
5	114.6	18.0
6	114.6	18.0
7	117.8	18.5
8	120.9	19.0
9	124.1	19.5
10	127.3	20.0
11	130.5	20.5
12	120.9	19.0

APPENDIX PPD

Pore Pressure Dissipation Tests (PPDT)

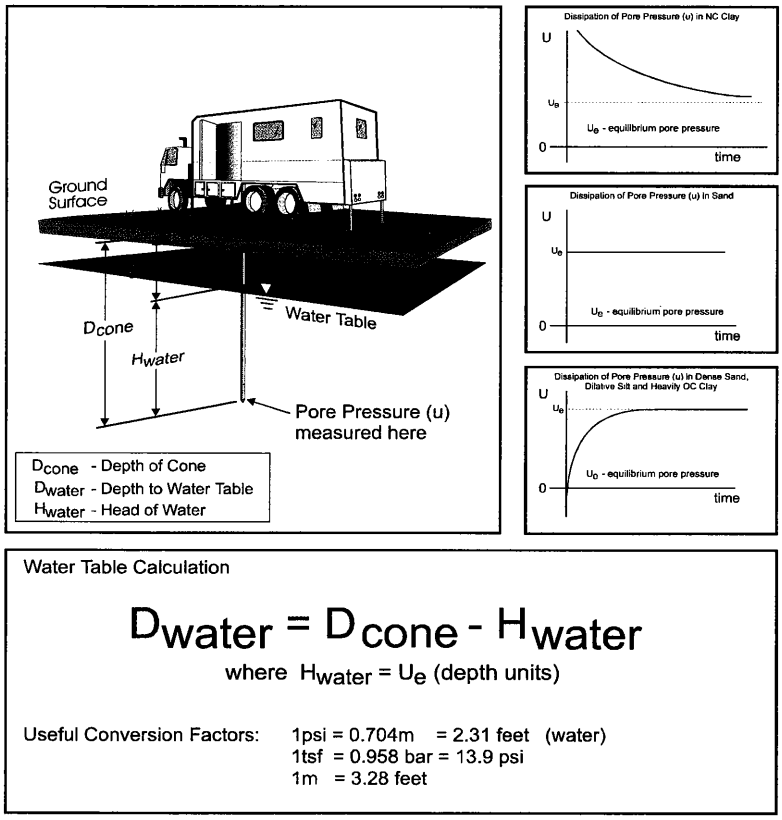
Pore Pressure Dissipation Tests (PPDT's) conducted at various intervals measured hydrostatic water pressures and determined the approximate depth of the ground water table. A PPaT is conducted when the cone is halted at specific intervals determined by the field representative. The variation of the penetration pore pressure (u) with time is measured behind the tip of the cone and recorded by a computer system.
Pore pressure dissipation data can be interpreted to provide estimates of:

- Equilibrium piezometric pressure
- Phreatic Purface
- In situ horizontal coefficient of consolidation (c_h)
- In situ horizontal coefficient of permeability (k_h)

In order to correctly interpret the equilibrium piezometric pressure and/or the phreatic surface, the pore pressure must be monitored until such time as there is no variation in pore pressure with time, *Figure PPDT*. This time is commonly referred to as t_{100}, the point at which 100% of the excess pore pressure has dissipated.

A complete reference on pore pressure dissipation tests is presented by obertson et al. 1992.

A summary of the pore pressure dissipation tests is summarized in Table 1. Pore pressure dissipation data is presented in graphical form in Appendix PPaT.



Water Table Calculation

$$D_{water} = D_{cone} - H_{water}$$

where $H_{water} = U_e$ (depth units)

Useful Conversion Factors: 1psi = 0.704m = 2.31 feet (water)
1tsf = 0.958 bar = 13.9 psi
1m = 3.28 feet

Figure PPDT

APPENDIX GWS

Groundwater Sampling (GWS)

Gregg In Situ, Inc. conducts groundwater sampling using a Hydropunch® type groundwater sampler, *Figure GWS*. The groundwater sampler has a retrievable stainless steel or disposable PVC screen with steel drop off tip. This allows for samples to be taken at multiple depth intervals within the same sounding location. In areas of slower water recharge, provisions may be made to set temporary PVC well screens during sampling to allow the drill rig to advance to the next sample location while the groundwater is allowed to infiltrate.

The groundwater sampler operates by advancing 1 ¾ inch hollow push rods with the filter tip in a closed configuration to the base of the desired sampling interval. Once at the desired sample depth, the push rods are retracted; exposing the encased filter screen and allowing groundwater to infiltrate hydrostatically from the formation into the inlet screen. A small diameter bailer (approximately ½ or ¾ inch) is lowered through the push rods into the screen section for sample collection. The number of downhole trips with the bailer and time necessary to complete the sample collection at each depth interval is a function of sampling protocols, volume requirements, and the yield characteristics and storage capacity of the formation. Upon completion of sample collection, the push rods and sampler, with the exception of the PVC screen and steel drop off tip are retrieved to the ground surface, decontaminated and prepared for the next sampling event.

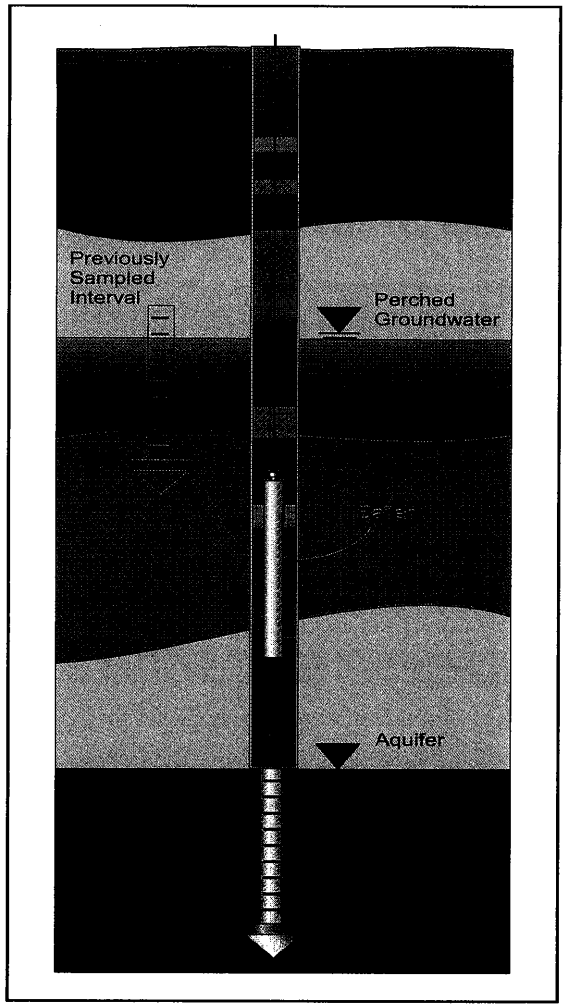


Figure GWS

A summary of the groundwater samples collected, including the sampling date, depth and location identification, is presented in Table 1 and the corresponding CPT plot.

For a detailed reference on direct push groundwater sampling, refer to Zemo et. al., 1992.

Bibliography

Lunne, T., Robertson, P.K. and Powell, J.J.M., "Cone Penetration Testing in Geotechnical Practice" E & FN Spon. ISBN 0 419 23750, 1997

Roberston, P.K., "Soil Classification using the Cone Penetration Test", Canadian Geotechnical Journal, Vol. 27, 1990 pp. 151-158.

Mayne, P.W., "NHI (2002) Manual on Subsurface Investigations: Geotechnical Site Characterization", available through www.ce.gatech.edu/~geosys/Faculty/Mayne/papers/index.html, Section 5.3, pp. 107-112.

Robertson, P.K., R.G. Campanella, D. Gillespie and A. Rice, "Seismic CPT to Measure In-Situ Shear Wave Velocity", Journal of Geotechnical Engineering ASCE, Vol. 112, No. 8, 1986 pp. 791-803.

Robertson, P.K., Sully, J., Woeller, D.J., Lunne, T., Powell, J.J.M., and Gillespie, D.J., "Guidelines for Estimating Consolidation Parameters in Soils from Piezocone Tests", Canadian Geotechnical Journal, Vol. 29, No. 4, August 1992, pp. 539-550.

Robertson, P.K., T. Lunne and J.J.M. Powell, "Geo-Environmental Application of Penetration Testing", Geotechnical Site Characterization, Robertson & Mayne (editors), 1998 Balkema, Rotterdam, ISBN 90 5410 939 4 pp 35-47.

Campanella, R.G. and I. Weemees, "Development and Use of An Electrical Resistivity Cone for Groundwater Contamination Studies", Canadian Geotechnical Journal, Vol. 27 No. 5, 1990 pp. 557-567.

DeGroot, D.J. and A.J. Lutenegger, "Reliability of Soil Gas Sampling and Characterization Techniques", International Site Characterization Conference - Atlanta, 1998.

Woeller, D.J., P.K. Robertson, T.J. Boyd and Dave Thomas, "Detection of Polyaromatic Hydrocarbon Contaminants Using the UVIF-CPT", 53rd Canadian Geotechnical Conference Montreal, QC October pp. 733-739, 2000.

Zemo, D.A., T.A. Delfino, J.D. Gallinatti, V.A. Baker and L.R. Hilpert, "Field Comparison of Analytical Results from Discrete-Depth Groundwater Samplers" BAT EnviroProbe and QED HydroPunch, Sixth national Outdoor Action Conference, Las Vegas, Nevada Proceedings, 1992, pp 299-312.

Copies of ASTM Standards are available through www.astm.org

Boring/Well Log Legend

KEY TO SYMBOLS/ABBREVIATIONS

- First encountered groundwater
- Static groundwater
- Soils logged by hand-auger or air-knife cuttings
- Soils logged by drill cuttings or disturbed sample
- Undisturbed soil sample interval
- Soil sample retained for submittal to analytical laboratory
- No recovery within interval
- Hydropunch or vapor sample screen interval

PID = Photo-ionization detector or organic vapor meter reading in parts per million (ppm)

fbg = Feet below grade

Blow Counts = Number of blows required to drive a California-modified split-spoon sampler using a 140-pound hammer falling freely 30 inches, recorded per 6-inch interval of a total 18-inch sample interval

(10YR 4/4) = Soil color according to Munsell Soil Color Charts

msl = Mean sea level

Soils logged according to the USCS.

UNIFIED SOILS CLASSIFICATION SYSTEM (USCS) SUMMARY

Major Divisions			Graphic	Group Symbol	Typical Description
Coarse-Grained Soils (>50% Sands and/or Gravels)	Gravel and Gravelly Soils	Clean Gravels (≤5% fines)		GW	Well-graded gravels, gravel-sand mixtures, little or no fines
				GP	Poorly-graded gravels, gravel-sand mixtures, little or no fines
		Gravels with Fines (≥15% fines)		GM	Silty gravels, gravel-sand-silt mixtures
				GC	Clayey gravels, gravel-sand-clay mixtures
	Sand and Sandy Soils	Clean Sands (≤5% fines)		SW	Well-graded sands, gravelly sands, little or no fines
				SP	Poorly-graded sands, gravelly sand, little or no fines
		Sands with Fines (≥15% fines)		SM	Silty sands, sand-silt mixtures
				SC	Clayey sands, sand-clay mixtures
Fine-Grained Soils (>50% Silts and/or Clays)	Silts and Clays			ML	Inorganic silts, very fine sands, silty or clayey fine sands, clayey silts with slight plasticity
				CL	Inorganic clays of low to medium plasticity, gravelly clays, sandy clays, silty clays, lean clays
				OL	Organic silts and organic silty clays of low plasticity
	Silts and Clays			MH	Inorganic silts, micaceous or diatomaceous fine sand or silty soils
				CH	Inorganic clays of high plasticity
				OH	Organic clays of medium to high plasticity, organic silts
Highly Organic Soils				PT	Peat, humus, swamp soils with high organic contents

M:\Templates & Forms\Boring Logs\Boring Log Legend

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BORING/WELL LOG

CLIENT NAME	Shell Oil Products Company (US)	**BORING/WELL NAME**	SVP-1
JOB/SITE NAME	1784 150th Avenue	**DRILLING STARTED**	27-Aug-07
LOCATION	San Leandro, California	**DRILLING COMPLETED**	28-Aug-07
PROJECT NUMBER	240612	**WELL DEVELOPMENT DATE (YIELD)**	NA
DRILLER	Gregg Drilling	**GROUND SURFACE ELEVATION**	Not Surveyed
DRILLING METHOD	Hand Auger	**TOP OF CASING ELEVATION**	Not Surveyed
BORING DIAMETER	3.5"	**SCREENED INTERVAL**	4.6 to 4.9 fbg
LOGGED BY	S. Lewis	**DEPTH TO WATER (First Encountered)**	NA ▽
REVIEWED BY	A. Friel, PG 6452	**DEPTH TO WATER (Static)**	NA ▼
REMARKS			

PID (ppm)	BLOW COUNTS	SAMPLE ID	EXTENT	DEPTH (fbg)	U.S.C.S.	GRAPHIC LOG	SOIL DESCRIPTION	CONTACT DEPTH (fbg)	WELL DIAGRAM
					ASPHALT		**ASPHALT**	0.7	Bentonite Slurry with Pellet Base
					SM		**Silty SAND with Gravel (SM)**; yellowish brown (10YR 5/4); dry to moist; 15% silt, 65% fine to coarse sand, 20% fine gravel. @ 1' - 15% silt, 70% fine to coarse sand, 15% fine gravel.	2.5	1/4" - Diameter Teflon Tubing
					ML		**SILT (ML)**; very dark gray (10YR 3/1); moist; 30% clay, 70% silt; medium plasticity.		
0.0		SVP-1-4.5'		5				5.2	2/16 Sand 3" - length Stainless Steel Screen Bottom of Boring @ 5.2 ft
				10					

WELL LOG (PID) I:\SONOMA-1.SHE\SANLEA-2\GINT\SNL1784.GPJ DEFAULT.GDT 10/3/07

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BORING/WELL LOG

CLIENT NAME	Shell Oil Products Company (US)	**BORING/WELL NAME**	SVP-2
JOB/SITE NAME	1784 150th Avenue	**DRILLING STARTED**	28-Aug-07
LOCATION	San Leandro, California	**DRILLING COMPLETED**	28-Aug-07
PROJECT NUMBER	240612	**WELL DEVELOPMENT DATE (YIELD)**	NA
DRILLER	Gregg Drilling	**GROUND SURFACE ELEVATION**	Not Surveyed
DRILLING METHOD	Hand Auger	**TOP OF CASING ELEVATION**	Not Surveyed
BORING DIAMETER	3.5"	**SCREENED INTERVAL**	4.6 to 4.9 fbg
LOGGED BY	S. Lewis	**DEPTH TO WATER (First Encountered)**	NA ▽
REVIEWED BY	A. Friel, PG 6452	**DEPTH TO WATER (Static)**	NA ▼
REMARKS			

PID (ppm)	BLOW COUNTS	SAMPLE ID	EXTENT	DEPTH (fbg)	U.S.C.S.	GRAPHIC LOG	SOIL DESCRIPTION	CONTACT DEPTH (fbg)	WELL DIAGRAM
					ASPHALT		**ASPHALT**	0.7	
					SM		**Silty SAND with Gravel (SM)** ; olive (5Y 4/3); dry to moist; 15% silt, 60% fine to coarse sand, 25% fine gravel.		Bentonite Slurry with Pellet Base
							Silty SAND (SM) ; olive (5Y 4/3); dry; 15% silt, 80% fine to coarse sand, 5% fine gravel.		1/4" - Diameter Teflon Tubing
0.0		SVP-2-4.5'		5	ML		**SILT (ML)** ; very dark grayish brown (10YR 3/2); moist; 15% clay, 80% fine to coarse sand, 5% fine to coarse sand; low plasticity.	4.5 / 5.2	2/16 Sand; 3" - length Stainless Steel Screen; Bottom of Boring @ 5.2 ft
				10					

WELL LOG (PID) I:\SONOMA~1.SHE\SANLEA~2\GINT\SNL1784.GPJ DEFAULT.GDT 10/3/07

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BORING/WELL LOG

CLIENT NAME	Shell Oil Products Company (US)	**BORING/WELL NAME**	SVP-3
JOB/SITE NAME	1784 150th Avenue	**DRILLING STARTED**	28-Aug-07
LOCATION	San Leandro, California	**DRILLING COMPLETED**	28-Aug-07
PROJECT NUMBER	240612	**WELL DEVELOPMENT DATE (YIELD)**	NA
DRILLER	Gregg Drilling	**GROUND SURFACE ELEVATION**	Not Surveyed
DRILLING METHOD	Hand Auger	**TOP OF CASING ELEVATION**	Not Surveyed
BORING DIAMETER	3.5"	**SCREENED INTERVAL**	4.6 to 4.9 fbg
LOGGED BY	S. Lewis	**DEPTH TO WATER (First Encountered)**	NA ▽
REVIEWED BY	A. Friel, PG 6452	**DEPTH TO WATER (Static)**	NA ▼
REMARKS			

PID (ppm)	BLOW COUNTS	SAMPLE ID	EXTENT	DEPTH (fbg)	U.S.C.S.	GRAPHIC LOG	SOIL DESCRIPTION	CONTACT DEPTH (fbg)	WELL DIAGRAM
					ASPHALT		**ASPHALT**	0.7	Bentonite Slurry with Pellet Base
					ML		**SILT (ML)**; very dark grayish brown (10YR 3/2); moist; 20% clay, 75% silt, 5% fine to coarse sand; low plasticity.	1.0	
					SM		**Silty SAND with Gravel (SM)**; light brownish gray (2.5Y 6/2); dry; 15% silt, 70% fine to coarse sand, 15% fine gravel.		1/4" - Diameter Teflon Tubing
0.0		SVP-3-4.5'		5				5.0	2/16 Sand 3" - length Stainless Steel Screen
				10					Bottom of Boring @ 5.2 ft

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BORING/WELL LOG

CLIENT NAME	Shell Oil Products Company (US)	**BORING/WELL NAME**	SVP-4
JOB/SITE NAME	1784 150th Avenue	**DRILLING STARTED**	28-Aug-07
LOCATION	San Leandro, California	**DRILLING COMPLETED**	28-Aug-07
PROJECT NUMBER	240612	**WELL DEVELOPMENT DATE (YIELD)**	NA
DRILLER	Gregg Drilling	**GROUND SURFACE ELEVATION**	Not Surveyed
DRILLING METHOD	Hand auger	**TOP OF CASING ELEVATION**	Not Surveyed
BORING DIAMETER	3.5"	**SCREENED INTERVAL**	4.6 to 4.9 fbg
LOGGED BY	S. Lewis	**DEPTH TO WATER (First Encountered)**	2.5 ft (28-Aug-07) ▽
REVIEWED BY	A. Friel, PG 6452	**DEPTH TO WATER (Static)**	NA ▼
REMARKS			

PID (ppm)	BLOW COUNTS	SAMPLE ID	EXTENT	DEPTH (fbg)	U.S.C.S.	GRAPHIC LOG	SOIL DESCRIPTION	CONTACT DEPTH (fbg)	WELL DIAGRAM
					CONCRETE		**CONCRETE**	0.5	Bentonite Slurry with Pellet Base
6.3					SM		**Silty SAND with Gravel (SM)**; light olive brown (2.5Y 5/4); dry to moist; 15% silt, 60% fine to coarse sand, 25% fine gravel. @ 1' - moist. @ 2.5' - wet; perched. ▽	3.0	1/4" - Diameter Teflon Tubing
623		SVP-4-4.5'		5	ML		**SILT (ML)**; very dark grayish brown (10YR 3/2); moist; 25% clay, 70% silt, 5% fine to coarse sand; medium plasticity. @ 4' - dark greenish gray (10Y 4/1).	5.4	2/16 Sand 3" - length Stainless Steel Screen Bottom of Boring @ 5.4 ft
				10					

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BORING/WELL LOG

CLIENT NAME	Shell Oil Products Company (US)	**BORING/WELL NAME**	SVP-5
JOB/SITE NAME	1784 150th Avenue	**DRILLING STARTED**	28-Aug-07
LOCATION	San Leandro, California	**DRILLING COMPLETED**	28-Aug-07
PROJECT NUMBER	240612	**WELL DEVELOPMENT DATE (YIELD)**	NA
DRILLER	Gregg Drilling	**GROUND SURFACE ELEVATION**	Not Surveyed
DRILLING METHOD	Hand Auger	**TOP OF CASING ELEVATION**	Not Surveyed
BORING DIAMETER	3.5"	**SCREENED INTERVAL**	4.6 to 4.9 fbg
LOGGED BY	S. Lewis	**DEPTH TO WATER (First Encountered)**	NA ▽
REVIEWED BY	A. Friel, PG 6452	**DEPTH TO WATER (Static)**	NA ▼
REMARKS			

PID (ppm)	BLOW COUNTS	SAMPLE ID	EXTENT	DEPTH (fbg)	U.S.C.S.	GRAPHIC LOG	SOIL DESCRIPTION	CONTACT DEPTH (fbg)	WELL DIAGRAM
					CONCRETE		**CONCRETE**	0.5	Bentonite Slurry with Pellet Base
					SM		**Silty SAND with Gravel (SM)**; dark yellowish brown (10YR 3/4); dry to moist; 15% silt, 60% fine to coarse sand, 25% fine gravel.	1.0	
							SILT (ML); very dark gray (10YR 3/1); moist; 25% clay, 75% silt; medium plasticity.		
					ML				1/4" - Diameter Teflon Tubing
1.4		SVP-5-4.5'		5				5.2	2/16 Sand
									3" - length Stainless Steel Screen
				10					Bottom of Boring @ 5.2 ft

WELL LOG (PID) I:\SONOMA~1.SHE\SANLEA~2\GINT\SNL1784.GPJ DEFAULT.GDT 10/3/07

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BORING/WELL LOG

CLIENT NAME	Shell Oil Products Company (US)	**BORING/WELL NAME**	B-1
JOB/SITE NAME	1784 150th Avenue	**DRILLING STARTED**	14-Sep-07
LOCATION	San Leandro, California	**DRILLING COMPLETED**	14-Sep-07
PROJECT NUMBER	240612	**WELL DEVELOPMENT DATE (YIELD)**	NA
DRILLER	Gregg Drilling	**GROUND SURFACE ELEVATION**	Not Surveyed
DRILLING METHOD	Hydraulic push	**TOP OF CASING ELEVATION**	Not Surveyed
BORING DIAMETER	2	**SCREENED INTERVAL**	NA
LOGGED BY	L. Goldfinch	**DEPTH TO WATER (First Encountered)**	NA ▽
REVIEWED BY	A. Friel, PG 6452	**DEPTH TO WATER (Static)**	NA ▼
REMARKS	Hand augered to 5' bgs on 8/28/2007. Located between dispensers & station building.		

PID (ppm)	BLOW COUNTS	SAMPLE ID	DEPTH (fbg)	U.S.C.S.	SOIL DESCRIPTION	CONTACT DEPTH (fbg)
			CONCRETE		**CONCRETE**	0.5
				SM	**Silty SAND with Gravel (SM)**; reddish brown (2.5Y 5/4); dry to moist; 15% silt, 60% fine to coarse sand, 25% fine gravel.	3.0
				ML	**SILT (ML)**; very dark grayish brown (10YR 3/2); moist; 25% clay, 70% silt, 5% fine to coarse sand; medium plasticity.	5.0
486		B-1-5	5	ML	**Gravelly SILT with Sand (ML)**; black (2.5Y 2.5/1); wet; 25% clay, 40% silt, 15% fine sand, 20% fine to medium gravel; low plasticity.	9.0
78		B-1-10	10	ML	**SILT (ML)**; black (2.5Y 2.5/1); moist 30% clay, 65% silt, 5% fine sand; medium plasticity.	12.0
				ML	**SILT with Gravel (ML)**; dark gray (2.5Y 4/1); 30% clay, 55% silt, 5% fine sand, 10% fine to medium gravel.	16.0
106.5		B-1-15	15			
83.3				ML	**Gravelly SILT with Sand (ML)**; dark gray (2.5Y 4/1); moist; 10% clay, 35% silt, 25% fine to coarse sand, 30% fine to medium gravel; low plasticity.	17.0
865		B-1-17		ML	**SILT (ML)**; olive gray (5Y 4/2); dry to moist; 5% clay, 90% silt, 5% fine sand.	19.0
				ML	@18' - moist; 30% clay, 65% silt, 5% fine sand; medium plasticity.	20.0
9,289		B-1-20	20	ML	**SILT with Sand (ML)**; olive gray (5Y 5/2); wet; 15% clay, 65% silt, 20% fine to medium sand; low plasticity.	22.0
1,342				ML	**Sandy SILT with Gravel (ML)**; olive gray (5Y 4/2); dry to moist; 65% silt, 20% fine to coarse sand, 15% fine gravel.	24.0
5,172					@ 21' - moist; 50% silt, 35% fine to coarse sand, 15% fine gravel.	
					SILT (ML); dry; 5% clay, 85% silt, 10% fine sand.	
167.1		B-1-25	25	ML	**SILT with Sand (ML)**; dark gray (2.5Y 4/1); moist to wet; 20% clay, 60% silt, 15% fine to medium sand, 5% fine gravel.	
6,783					@ 27' - olive gray (5Y 5/2); dry; 5% clay, 75% silt, 10% fine to coarse sand, 10% fine gravel.	
					@ 28' - dark gray (5Y 4/1); moist to wet; 20% clay, 55% silt, 15% fine to coarse sand, 10% fine gravel.	29.0
7,234		B-1-29.5	30	ML	**SILT (ML)**; grayish brown (2.5Y 5/2); dry; 20% clay, 75% silt, 5% fine sand.	30.0
			35			

WELL DIAGRAM: Portland Type I/II

Bottom of Boring @ 30 ft

WELL LOG (PID) I:\SONOMA~1.SHE\SANLEA~2\GINT\SNL1784.GPJ DEFAULT.GDT 10/3/07

Attachment E

Laboratory Analytical Reports

Calscience
Environmental
Laboratories, Inc.

ACCREDITED IN ACCORDANCE WITH nelac

September 12, 2007

Ana Friel
Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Subject: **Calscience Work Order No.: 07-09-0108**
Client Reference: 1784 150th Ave., San Leandro, CA

Dear Client:

Enclosed is an analytical report for the above-referenced project. The samples included in this report were received 9/5/2007 and analyzed in accordance with the attached chain-of-custody.

Unless otherwise noted, all analytical testing was accomplished in accordance with the guidelines established in our Quality Systems Manual, applicable standard operating procedures, and other related documentation. The original report of subcontracted analysis, if any, is provided herein, and follows the standard Calscience data package. The results in this analytical report are limited to the samples tested and any reproduction thereof must be made in its entirety.

If you have any questions regarding this report, please do not hesitate to contact the undersigned.

Sincerely,

Calscience Environmental
Laboratories, Inc.
Danielle Gonsman
Project Manager

Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/05/07
Work Order No: 07-09-0108
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-5-54'-57'	**07-09-0108-1**	**08/31/07**	**Aqueous**	**GC 1**	**09/06/07**	**09/07/07**	**070906B01**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	102	38-134	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-5-70'-74'	**07-09-0108-2**	**08/31/07**	**Aqueous**	**GC 1**	**09/06/07**	**09/07/07**	**070906B01**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	98	38-134	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-1-54'-58'	**07-09-0108-3**	**08/31/07**	**Aqueous**	**GC 1**	**09/06/07**	**09/07/07**	**070906B01**

Comment(s): -The sample chromatographic pattern for TPH does not match the chromatographic pattern of the specified standard. Quantitation of the unknown hydrocarbon(s) in the sample was based upon the specified standard.

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	150	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	103	38-134	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-1-70'-74'	**07-09-0108-4**	**08/31/07**	**Aqueous**	**GC 1**	**09/06/07**	**09/07/07**	**070906B01**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	100	38-134	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received:	09/05/07
Work Order No:	07-09-0108
Preparation:	EPA 5030B
Method:	EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
Method Blank	**099-12-436-882**	**N/A**	**Aqueous**	**GC 1**	**09/06/07**	**09/06/07**	**070906B01**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	97	38-134	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/05/07
Work Order No: 07-09-0108
Preparation: EPA 5030B
Method: EPA 8260B
Units: ug/L

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-5-54'-57'	**07-09-0108-1**	**08/31/07**	**Aqueous**	**GC/MS T**	**09/11/07**	**09/11/07**	**070911L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.50	0.14	1		o-Xylene	ND	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	ND	1.0	0.26	1	
1,2-Dichloroethane	6.6	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	ND	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	ND	1.0	0.27	1		Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	ND	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	106	74-140		1,2-Dichloroethane-d4	119	74-146	
Toluene-d8	103	88-112		1,4-Bromofluorobenzene	100	74-110	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-5-70'-74'	**07-09-0108-2**	**08/31/07**	**Aqueous**	**GC/MS T**	**09/11/07**	**09/11/07**	**070911L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.50	0.14	1		o-Xylene	ND	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	ND	1.0	0.26	1	
1,2-Dichloroethane	ND	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	ND	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	ND	1.0	0.27	1		Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	ND	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	88	74-140		1,2-Dichloroethane-d4	122	74-146	
Toluene-d8	104	88-112		1,4-Bromofluorobenzene	102	74-110	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-1-54'-58'	**07-09-0108-3**	**08/31/07**	**Aqueous**	**GC/MS T**	**09/11/07**	**09/11/07**	**070911L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	8.0	0.50	0.14	1		o-Xylene	0.69	1.0	0.17	1	J
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	120	1.0	0.26	1	
1,2-Dichloroethane	97	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	2.6	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	0.64	1.0	0.27	1	J	Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	4.7	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	112	74-140		1,2-Dichloroethane-d4	122	74-146	
Toluene-d8	103	88-112		1,4-Bromofluorobenzene	104	74-110	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/05/07
Work Order No: 07-09-0108
Preparation: EPA 5030B
Method: EPA 8260B
Units: ug/L

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-1-70'-74'	**07-09-0108-4**	**08/31/07**	**Aqueous**	**GC/MS T**	**09/11/07**	**09/11/07**	**070911L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	4.1	0.50	0.14	1		o-Xylene	0.37	1.0	0.17	1	J
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	2.1	1.0	0.26	1	
1,2-Dichloroethane	ND	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	1.0	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	0.62	1.0	0.27	1	J	Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	1.6	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	110	74-140		1,2-Dichloroethane-d4	122	74-146	
Toluene-d8	103	88-112		1,4-Bromofluorobenzene	99	74-110	

Method Blank	**099-10-006-22,754**	**N/A**	**Aqueous**	**GC/MS T**	**09/11/07**	**09/11/07**	**070911L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.50	0.14	1		o-Xylene	ND	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	ND	1.0	0.26	1	
1,2-Dichloroethane	ND	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	ND	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	ND	1.0	0.27	1		Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	ND	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	107	74-140		1,2-Dichloroethane-d4	119	74-146	
Toluene-d8	103	88-112		1,4-Bromofluorobenzene	100	74-110	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/05/07
Work Order No: 07-09-0108
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-09-0168-1	**Aqueous**	**GC 1**	**09/06/07**	**09/07/07**	**070906S01**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	111	114	68-122	3	0-18	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/05/07
Work Order No: 07-09-0108
Preparation: EPA 5030B
Method: EPA 8260B

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-09-0472-1	**Aqueous**	**GC/MS T**	**09/11/07**	**09/11/07**	**070911S01**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	104	104	88-118	1	0-7	
Carbon Tetrachloride	101	95	67-145	6	0-11	
Chlorobenzene	103	102	88-118	1	0-7	
1,2-Dibromoethane	101	103	70-130	2	0-30	
1,2-Dichlorobenzene	102	104	86-116	2	0-8	
1,1-Dichloroethene	105	107	70-130	2	0-25	
Ethylbenzene	110	109	70-130	1	0-30	
Toluene	106	105	87-123	1	0-8	
Trichloroethene	104	104	79-127	1	0-10	
Vinyl Chloride	88	93	69-129	6	0-13	
Methyl-t-Butyl Ether (MTBE)	95	94	71-131	0	0-13	
Tert-Butyl Alcohol (TBA)	79	83	36-168	5	0-45	
Diisopropyl Ether (DIPE)	96	96	81-123	0	0-9	
Ethyl-t-Butyl Ether (ETBE)	97	95	72-126	2	0-12	
Tert-Amyl-Methyl Ether (TAME)	97	97	72-126	0	0-12	
Ethanol	80	83	53-149	3	0-31	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates		Date Received:	N/A
19449 Riverside Drive, Suite 230		Work Order No:	07-09-0108
Sonoma, CA 95476-6955		Preparation:	EPA 5030B
		Method:	EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-436-882	**Aqueous**	**GC 1**	**09/06/07**	**09/06/07**	**070906B01**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	111	117	78-120	6	0-10	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: N/A
Work Order No: 07-09-0108
Preparation: EPA 5030B
Method: EPA 8260B

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-10-006-22,754	**Aqueous**	**GC/MS T**	**09/11/07**	**09/11/07**	**070911L01**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	106	103	84-120	3	0-8	
Carbon Tetrachloride	105	102	63-147	3	0-10	
Chlorobenzene	104	103	89-119	0	0-7	
1,2-Dibromoethane	98	98	80-120	0	0-20	
1,2-Dichlorobenzene	101	104	89-119	2	0-9	
1,1-Dichloroethene	111	105	77-125	6	0-16	
Ethylbenzene	109	110	80-120	1	0-20	
Toluene	106	104	83-125	2	0-9	
Trichloroethene	104	101	89-119	3	0-8	
Vinyl Chloride	94	94	63-135	0	0-13	
Methyl-t-Butyl Ether (MTBE)	100	96	82-118	3	0-13	
Tert-Butyl Alcohol (TBA)	81	85	46-154	5	0-32	
Diisopropyl Ether (DIPE)	100	97	81-123	3	0-11	
Ethyl-t-Butyl Ether (ETBE)	101	98	74-122	3	0-12	
Tert-Amyl-Methyl Ether (TAME)	98	99	76-124	0	0-10	
Ethanol	90	83	60-138	8	0-32	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Glossary of Terms and Qualifiers

Work Order Number: 07-09-0108

Qualifier	Definition
*	See applicable analysis comment.
1	Surrogate compound recovery was out of control due to a required sample dilution, therefore, the sample data was reported without further clarification.
2	Surrogate compound recovery was out of control due to matrix interference. The associated method blank surrogate spike compound was in control and, therefore, the sample data was reported without further clarification.
3	Recovery of the Matrix Spike (MS) or Matrix Spike Duplicate (MSD) compound was out of control due to matrix interference. The associated LCS and/or LCSD was in control and, therefore, the sample data was reported without further clarification.
4	The MS/MSD RPD was out of control due to matrix interference. The LCS/LCSD RPD was in control and, therefore, the sample data was reported without further clarification.
5	The PDS/PDSD associated with this batch of samples was out of control due to a matrix interference effect. The associated batch LCS/LCSD was in control and, hence, the associated sample data was reported with no further corrective action required.
A	Result is the average of all dilutions, as defined by the method.
B	Analyte was present in the associated method blank.
C	Analyte presence was not confirmed on primary column.
E	Concentration exceeds the calibration range.
H	Sample received and/or analyzed past the recommended holding time.
J	Analyte was detected at a concentration below the reporting limit and above the laboratory method detection limit. Reported value is estimated.
N	Nontarget Analyte.
ND	Parameter not detected at the indicated reporting limit.
Q	Spike recovery and RPD control limits do not apply resulting from the parameter concentration in the sample exceeding the spike concentration by a factor of four or greater.
U	Undetected at the laboratory method detection limit.
X	% Recovery and/or RPD out-of-range.
Z	Analyte presence was not confirmed by second column or GC/MS analysis.

SHELL Chain Of Custody Record

LAB: Calscience

- ☐ TA - Irvine, California
- ☐ TA - Morgan Hill, California
- ☐ TA - Sacramento, California
- ☐ TA - Nashville, Tennesee
- ☒ Calscience
- ☐ Other_____

NAME OF PERSON TO BILL: Denis Brown

- ☒ ENVIRONMENTAL SERVICES
- ☐ NETWORK DEV / FE
- ☐ COMPLIANCE
- ☐ BILL CONSULTANT
- ☐ RMT/CRMT

☐ CHECK BOX TO VERIFY IF NO INCIDENT # APPLIES

INCIDENT # (ES ONLY): 9 8 9 9 6 0 6 8

PO #:

SAP or CRMT #:

DATE: 8-31-07

PAGE: 1 of 1

SAMPLING COMPANY: Conestoga-Rovers & Associates (CRA)

LOG CODE: CETS

SITE ADDRESS: Street and City: 1784 150th Ave San Leandro

State: CA

GLOBAL ID NO.: T0600101230

ADDRESS: 19449 Riverside Drive, Suite 230, Sonoma, CA 95476

EDF DELIVERABLE TO (Name, Company, Office Location): Felicia Ballard, CRA, Sonoma

PHONE NO.: 707-935-4850

E-MAIL: sonomaedf@craworld.com

CONSULTANT PROJECT NO.: 240612

PROJECT CONTACT (Hardcopy or PDF Report to): Ana Friel

TELEPHONE: 707-268-3812

FAX: 707-935-6649

E-MAIL: afriel@craworld.com

SAMPLER NAME(S) (Print): Scott Lewis + Carmen Rodriguez

LAB USE ONLY: 09 08 0108

TAT (STD IS 10 BUSINESS DAYS / RUSH IS CALENDAR DAYS):

☒ STD ☐ 5 DAY ☐ 3 DAY ☐ 2 DAY ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY: _____

SPECIAL INSTRUCTIONS OR NOTES:

- ☐ EDD NOT NEEDED
- ☑ SHELL CONTRACT RATE APPLIES
- ☐ STATE REIMB RATE APPLIES
- ☑ RECEIPT VERIFICATION REQUESTED

REQUESTED ANALYSIS

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	NO. OF CONT.	TPH - Purgeable (8260B)	TPH - Extractable (8015M) w/SGC	BTEX (8260B)	5 Oxygenates (8260B) (MTBE, TBA, DIPE, TAME, ETBE)	MTBE (8260B)	TBA (8260B)	DIPE (8260B)	TAME (8260B)	ETBE (8260B)	1,2 DCA (8260B)	EDB (8260B)	Ethanol (8260B)	Methanol (8015M)	VOCs by 8260B	Semi-Volatiles by 8270C	Lead ☐ Total ☐ STLC ☐ TCLP	LUFT5 ☐ Total ☐ STLC ☐ TCLP	CAM17 ☐ Total ☐ STLC ☐ TCLP	Test for Disposal (see attached)		TEMPERATURE ON RECEIPT C°
1	CPT-5-54'-57'	8/31/07	1110	GW	5	X		X	X						X	X										
2	CPT-5-70'-74'	8-31-07	1150	GW	5	X		X	X						X	X										
3	CPT-1-54'-58'	8-31-07	1415	GW	5	X		X	X						X	X										
4	CPT-1-70'-74'	8-31-07	1515	GW	5	X		X	X						X	X										

FIELD NOTES:

Container/Preservative or PID Readings or Laboratory Notes

Relinquished by: (Signature) Scott Lewis	Received by: (Signature) Sonoma Office	Date: 8-31-07	Time: 1800
Relinquished by: (Signature) Sonoma Office (to CTSO)	Received by: (Signature)	Date: 9-4-07	Time: 1400
Relinquished by: (Signature)	Received by: (Signature)	Date: 9/5/07	Time: 1000

05/02/06 Revision

Rev. 05-May-06

Q&Q Graphic (714) 898-9702

Calscience Environmental Laboratories, Inc.

WORK ORDER #: 07 - 09 - 0108

Cooler 1 of 1

SAMPLE RECEIPT FORM

CLIENT: CRA DATE: 9/5/07

TEMPERATURE – SAMPLES RECEIVED BY:

CALSCIENCE COURIER:

_____ Chilled, cooler with temperature blank provided.
_____ Chilled, cooler without temperature blank.
_____ Chilled and placed in cooler with wet ice.
_____ Ambient and placed in cooler with wet ice.
_____ Ambient temperature.
_____ °C Temperature blank.

LABORATORY (Other than Calscience Courier):

3.6 °C Temperature blank.
_____ °C IR thermometer.
_____ Ambient temperature.

Initial: JP

CUSTODY SEAL INTACT:

Sample(s): _____ Cooler: _____ No (Not Intact) : _____ Not Present: ✓

Initial: JP

SAMPLE CONDITION:

	Yes	No	N/A
Chain-Of-Custody document(s) received with samples	✓		
Sampler's name indicated on COC	✓		
Sample container label(s) consistent with custody papers	✓		
Sample container(s) intact and good condition	✓		
Correct containers and volume for analyses requested	✓		
Proper preservation noted on sample label(s)	✓		
VOA vial(s) free of headspace.	✓		
Tedlar bag(s) free of condensation			✓

Initial: JP

COMMENTS:

Calscience
Environmental
Laboratories, Inc.

ACCREDITED IN ACCORDANCE WITH nelac

September 11, 2007

Ana Friel
Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Subject: **Calscience Work Order No.: 07-09-0031**
Client Reference: 1784 150th Ave., San Leandro, CA

Dear Client:

Enclosed is an analytical report for the above-referenced project. The samples included in this report were received 9/1/2007 and analyzed in accordance with the attached chain-of-custody.

Unless otherwise noted, all analytical testing was accomplished in accordance with the guidelines established in our Quality Systems Manual, applicable standard operating procedures, and other related documentation. The original report of subcontracted analysis, if any, is provided herein, and follows the standard Calscience data package. The results in this analytical report are limited to the samples tested and any reproduction thereof must be made in its entirety.

If you have any questions regarding this report, please do not hesitate to contact the undersigned.

Sincerely,

Calscience Environmental
Laboratories, Inc.
Danielle Gonsman
Project Manager

Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/01/07
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
SVP-1-4.5'	**07-09-0031-1**	**08/28/07**	**Solid**	**GC 22**	**09/04/07**	**09/04/07**	**070904B02**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	0.50	1		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	76	42-126	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
SVP-5-4.5'	**07-09-0031-2**	**08/28/07**	**Solid**	**GC 18**	**09/05/07**	**09/05/07**	**070905B01**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	0.50	1		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	50	42-126	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
SVP-2-4.5'	**07-09-0031-3**	**08/28/07**	**Solid**	**GC 22**	**09/04/07**	**09/04/07**	**070904B02**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	0.50	1		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	73	42-126	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
SVP-3-4.5'	**07-09-0031-4**	**08/28/07**	**Solid**	**GC 22**	**09/04/07**	**09/04/07**	**070904B02**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	0.50	1		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	72	42-126	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/01/07
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
SVP-4-4.5'	**07-09-0031-5**	**08/28/07**	**Solid**	**GC 22**	**09/04/07**	**09/05/07**	**070904B03**

Comment(s): -The sample chromatographic pattern for TPH does not match the chromatographic pattern of the specified standard. Quantitation of the unknown hydrocarbon(s) in the sample was based upon the specified standard.

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	150	62	125		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	75	42-126	

Method Blank	**099-12-279-1,054**	**N/A**	**Solid**	**GC 22**	**09/04/07**	**09/04/07**	**070904B02**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	0.50	1		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	80	42-126	

Method Blank	**099-12-279-1,055**	**N/A**	**Solid**	**GC 22**	**09/04/07**	**09/04/07**	**070904B03**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	5.0	10		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	78	42-126	

Method Blank	**099-12-279-1,057**	**N/A**	**Solid**	**GC 18**	**09/05/07**	**09/05/07**	**070905B01**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	0.50	1		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	92	42-126	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/01/07
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-3-23'-27'	**07-09-0031-6**	**08/28/07**	**Aqueous**	**GC 24**	**09/04/07**	**09/05/07**	**070904B03**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	3600	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	117	38-134	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-3-49'-53'	**07-09-0031-7**	**08/29/07**	**Aqueous**	**GC 24**	**09/04/07**	**09/05/07**	**070904B03**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	80	38-134	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-3-69'-73'	**07-09-0031-8**	**08/29/07**	**Aqueous**	**GC 24**	**09/04/07**	**09/05/07**	**070904B03**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	50	1		ug/L

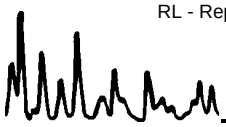
Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	80	38-134	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-2-35'-39'	**07-09-0031-9**	**08/29/07**	**Aqueous**	**GC 24**	**09/04/07**	**09/05/07**	**070904B03**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	310	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	80	38-134	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers



Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/01/07
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-2-53'-57'	**07-09-0031-10**	**08/29/07**	**Aqueous**	**GC 24**	**09/04/07**	**09/05/07**	**070904B03**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	80	38-134	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-2-68'-72'	**07-09-0031-11**	**08/29/07**	**Aqueous**	**GC 24**	**09/04/07**	**09/05/07**	**070904B03**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	77	38-134	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-6-40'-44'	**07-09-0031-12**	**08/30/07**	**Aqueous**	**GC 24**	**09/04/07**	**09/05/07**	**070904B03**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	81	38-134	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-6-70'-74'	**07-09-0031-13**	**08/30/07**	**Aqueous**	**GC 24**	**09/04/07**	**09/05/07**	**070904B03**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	80	38-134	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/01/07
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-1-41'-45'	**07-09-0031-14**	**08/30/07**	**Aqueous**	**GC 24**	**09/04/07**	**09/05/07**	**070904B03**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	650	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	83	38-134	

CPT-5-41'-45'	**07-09-0031-15**	**08/30/07**	**Aqueous**	**GC 24**	**09/04/07**	**09/05/07**	**070904B03**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	81	38-134	

Method Blank	**099-12-436-865**	**N/A**	**Aqueous**	**GC 24**	**09/04/07**	**09/05/07**	**070904B03**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	50	1		ug/L

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene	78	38-134	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Conestoga-Rovers & Associates	Date Received:	09/01/07
19449 Riverside Drive, Suite 230	Work Order No:	07-09-0031
Sonoma, CA 95476-6955	Preparation:	EPA 5030B
	Method:	EPA 8260B
	Units:	mg/kg

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
SVP-1-4.5'	**07-09-0031-1**	**08/28/07**	**Solid**	**GC/MS S**	**09/08/07**	**09/08/07**	**070908L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.0050	1		o-Xylene	ND	0.0050	1	
1,2-Dibromoethane	ND	0.0050	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	1	
1,2-Dichloroethane	ND	0.0050	1		Tert-Butyl Alcohol (TBA)	ND	0.050	1	
Ethylbenzene	ND	0.0050	1		Diisopropyl Ether (DIPE)	ND	0.010	1	
Toluene	ND	0.0050	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.010	1	
p/m-Xylene	ND	0.0050	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.010	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	113	73-139			1,2-Dichloroethane-d4	113	73-145		
Toluene-d8	99	90-108			1,4-Bromofluorobenzene	88	71-113		

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
SVP-5-4.5'	**07-09-0031-2**	**08/28/07**	**Solid**	**GC/MS S**	**09/08/07**	**09/08/07**	**070908L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.0050	1		o-Xylene	ND	0.0050	1	
1,2-Dibromoethane	ND	0.0050	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	1	
1,2-Dichloroethane	ND	0.0050	1		Tert-Butyl Alcohol (TBA)	ND	0.050	1	
Ethylbenzene	ND	0.0050	1		Diisopropyl Ether (DIPE)	ND	0.010	1	
Toluene	ND	0.0050	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.010	1	
p/m-Xylene	ND	0.0050	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.010	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	114	73-139			1,2-Dichloroethane-d4	118	73-145		
Toluene-d8	98	90-108			1,4-Bromofluorobenzene	86	71-113		

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
SVP-2-4.5'	**07-09-0031-3**	**08/28/07**	**Solid**	**GC/MS S**	**09/08/07**	**09/08/07**	**070908L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.0050	1		o-Xylene	ND	0.0050	1	
1,2-Dibromoethane	ND	0.0050	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	1	
1,2-Dichloroethane	ND	0.0050	1		Tert-Butyl Alcohol (TBA)	ND	0.050	1	
Ethylbenzene	ND	0.0050	1		Diisopropyl Ether (DIPE)	ND	0.010	1	
Toluene	ND	0.0050	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.010	1	
p/m-Xylene	ND	0.0050	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.010	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	114	73-139			1,2-Dichloroethane-d4	115	73-145		
Toluene-d8	97	90-108			1,4-Bromofluorobenzene	86	71-113		

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Conestoga-Rovers & Associates	Date Received:	09/01/07
19449 Riverside Drive, Suite 230	Work Order No:	07-09-0031
Sonoma, CA 95476-6955	Preparation:	EPA 5030B
	Method:	EPA 8260B
	Units:	mg/kg

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
SVP-3-4.5'	**07-09-0031-4**	**08/28/07**	**Solid**	**GC/MS S**	**09/08/07**	**09/08/07**	**070908L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.0050	1		o-Xylene	ND	0.0050	1	
1,2-Dibromoethane	ND	0.0050	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	1	
1,2-Dichloroethane	ND	0.0050	1		Tert-Butyl Alcohol (TBA)	ND	0.050	1	
Ethylbenzene	ND	0.0050	1		Diisopropyl Ether (DIPE)	ND	0.010	1	
Toluene	ND	0.0050	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.010	1	
p/m-Xylene	ND	0.0050	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.010	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	111	73-139			1,2-Dichloroethane-d4	111	73-145		
Toluene-d8	101	90-108			1,4-Bromofluorobenzene	94	71-113		

SVP-4-4.5'	**07-09-0031-5**	**08/28/07**	**Solid**	**GC/MS S**	**09/08/07**	**09/08/07**	**070908L02**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.12	25		o-Xylene	0.13	0.12	25	
1,2-Dibromoethane	ND	0.12	25		Methyl-t-Butyl Ether (MTBE)	ND	0.12	25	
1,2-Dichloroethane	ND	0.12	25		Tert-Butyl Alcohol (TBA)	ND	1.2	25	
Ethylbenzene	3.8	0.12	25		Diisopropyl Ether (DIPE)	ND	0.25	25	
Toluene	0.24	0.12	25		Ethyl-t-Butyl Ether (ETBE)	ND	0.25	25	
p/m-Xylene	12	0.12	25		Tert-Amyl-Methyl Ether (TAME)	ND	0.25	25	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	95	73-139			1,2-Dichloroethane-d4	98	73-145		
Toluene-d8	108	90-108			1,4-Bromofluorobenzene	96	71-113		

Method Blank	**099-10-005-14,725**	**N/A**	**Solid**	**GC/MS S**	**09/08/07**	**09/08/07**	**070908L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.0050	1		o-Xylene	ND	0.0050	1	
1,2-Dibromoethane	ND	0.0050	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	1	
1,2-Dichloroethane	ND	0.0050	1		Tert-Butyl Alcohol (TBA)	ND	0.050	1	
Ethylbenzene	ND	0.0050	1		Diisopropyl Ether (DIPE)	ND	0.010	1	
Toluene	ND	0.0050	1		Ethyl-t-Butyl Ether (ETBE)	ND	0.010	1	
p/m-Xylene	ND	0.0050	1		Tert-Amyl-Methyl Ether (TAME)	ND	0.010	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	103	73-139			1,2-Dichloroethane-d4	104	73-145		
Toluene-d8	99	90-108			1,4-Bromofluorobenzene	97	71-113		

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Conestoga-Rovers & Associates	Date Received:	09/01/07
19449 Riverside Drive, Suite 230	Work Order No:	07-09-0031
Sonoma, CA 95476-6955	Preparation:	EPA 5030B
	Method:	EPA 8260B
	Units:	mg/kg

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
Method Blank	**099-10-005-14,727**	**N/A**	**Solid**	**GC/MS S**	**09/08/07**	**09/08/07**	**070908L02**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.12	25		o-Xylene	ND	0.12	25	
1,2-Dibromoethane	ND	0.12	25		Methyl-t-Butyl Ether (MTBE)	ND	0.12	25	
1,2-Dichloroethane	ND	0.12	25		Tert-Butyl Alcohol (TBA)	ND	1.2	25	
Ethylbenzene	ND	0.12	25		Diisopropyl Ether (DIPE)	ND	0.25	25	
Toluene	ND	0.12	25		Ethyl-t-Butyl Ether (ETBE)	ND	0.25	25	
p/m-Xylene	ND	0.12	25		Tert-Amyl-Methyl Ether (TAME)	ND	0.25	25	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	97	73-139			1,2-Dichloroethane-d4	99	73-145		
Toluene-d8	104	90-108			1,4-Bromofluorobenzene	92	71-113		

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Conestoga-Rovers & Associates		Date Received:	09/01/07
19449 Riverside Drive, Suite 230		Work Order No:	07-09-0031
Sonoma, CA 95476-6955		Preparation:	EPA 5030B
		Method:	EPA 8260B
		Units:	ug/L
Project: 1784 150th Ave., San Leandro, CA			Page 1 of 4

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-3-23'-27'	**07-09-0031-6**	**08/28/07**	**Aqueous**	**GC/MS FF**	**09/09/07**	**09/10/07**	**070909L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	0.94	0.50	0.14	1		o-Xylene	ND	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	35	1.0	0.26	1	
1,2-Dichloroethane	8.2	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	11	10	5.4	1	
Ethylbenzene	18	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	0.32	1.0	0.27	1	J	Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	8.8	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	108	74-140		1,2-Dichloroethane-d4	118	74-146	
Toluene-d8	103	88-112		1,4-Bromofluorobenzene	104	74-110	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-3-49'-53'	**07-09-0031-7**	**08/29/07**	**Aqueous**	**GC/MS FF**	**09/09/07**	**09/10/07**	**070909L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	1.5	0.50	0.14	1		o-Xylene	ND	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	ND	1.0	0.26	1	
1,2-Dichloroethane	ND	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	0.43	1.0	0.23	1	J	Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	0.51	1.0	0.27	1	J	Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	ND	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	108	74-140		1,2-Dichloroethane-d4	115	74-146	
Toluene-d8	101	88-112		1,4-Bromofluorobenzene	102	74-110	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-3-69'-73'	**07-09-0031-8**	**08/29/07**	**Aqueous**	**GC/MS FF**	**09/09/07**	**09/10/07**	**070909L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	0.42	0.50	0.14	1	J	o-Xylene	ND	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	ND	1.0	0.26	1	
1,2-Dichloroethane	ND	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	ND	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	ND	1.0	0.27	1		Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	ND	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	109	74-140		1,2-Dichloroethane-d4	116	74-146	
Toluene-d8	100	88-112		1,4-Bromofluorobenzene	100	74-110	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Conestoga-Rovers & Associates		Date Received:	09/01/07
19449 Riverside Drive, Suite 230		Work Order No:	07-09-0031
Sonoma, CA 95476-6955		Preparation:	EPA 5030B
		Method:	EPA 8260B
		Units:	ug/L
Project: 1784 150th Ave., San Leandro, CA			Page 2 of 4

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-2-35'-39'	**07-09-0031-9**	**08/29/07**	**Aqueous**	**GC/MS FF**	**09/09/07**	**09/10/07**	**070909L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	41	0.50	0.14	1		o-Xylene	14	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	54	1.0	0.26	1	
1,2-Dichloroethane	11	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	12	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	4.7	1.0	0.27	1		Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	36	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	109	74-140		1,2-Dichloroethane-d4	118	74-146	
Toluene-d8	99	88-112		1,4-Bromofluorobenzene	102	74-110	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-2-53'-57'	**07-09-0031-10**	**08/29/07**	**Aqueous**	**GC/MS FF**	**09/09/07**	**09/10/07**	**070909L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	1.5	0.50	0.14	1		o-Xylene	1.2	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	2.1	1.0	0.26	1	
1,2-Dichloroethane	13	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	1.1	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	0.83	1.0	0.27	1	J	Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	3.5	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	110	74-140		1,2-Dichloroethane-d4	118	74-146	
Toluene-d8	101	88-112		1,4-Bromofluorobenzene	100	74-110	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-2-68'-72'	**07-09-0031-11**	**08/29/07**	**Aqueous**	**GC/MS FF**	**09/09/07**	**09/10/07**	**070909L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	5.3	0.50	0.14	1		o-Xylene	4.3	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	0.63	1.0	0.26	1	J
1,2-Dichloroethane	ND	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	4.2	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	1.8	1.0	0.27	1		Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	12	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	109	74-140		1,2-Dichloroethane-d4	118	74-146	
Toluene-d8	101	88-112		1,4-Bromofluorobenzene	101	74-110	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Conestoga-Rovers & Associates		Date Received:	09/01/07
19449 Riverside Drive, Suite 230		Work Order No:	07-09-0031
Sonoma, CA 95476-6955		Preparation:	EPA 5030B
		Method:	EPA 8260B
		Units:	ug/L
Project: 1784 150th Ave., San Leandro, CA			Page 3 of 4

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-6-40'-44'	**07-09-0031-12**	**08/30/07**	**Aqueous**	**GC/MS FF**	**09/09/07**	**09/10/07**	**070909L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.50	0.14	1		o-Xylene	ND	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	ND	1.0	0.26	1	
1,2-Dichloroethane	ND	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	ND	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	ND	1.0	0.27	1		Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	ND	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	111	74-140		1,2-Dichloroethane-d4	118	74-146	
Toluene-d8	101	88-112		1,4-Bromofluorobenzene	100	74-110	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-6-70'-74'	**07-09-0031-13**	**08/30/07**	**Aqueous**	**GC/MS FF**	**09/09/07**	**09/10/07**	**070909L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.50	0.14	1		o-Xylene	ND	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	20	1.0	0.26	1	
1,2-Dichloroethane	15	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	ND	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	ND	1.0	0.27	1		Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	ND	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	108	74-140		1,2-Dichloroethane-d4	119	74-146	
Toluene-d8	102	88-112		1,4-Bromofluorobenzene	102	74-110	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-1-41'-45'	**07-09-0031-14**	**08/30/07**	**Aqueous**	**GC/MS T**	**09/10/07**	**09/10/07**	**070910L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	27	0.50	0.14	1		o-Xylene	9.4	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	1100	50	13	50	
1,2-Dichloroethane	92	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	430	10	5.4	1	
Ethylbenzene	14	1.0	0.23	1		Diisopropyl Ether (DIPE)	2.0	2.0	0.33	1	
Toluene	4.3	1.0	0.27	1		Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	34	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	104	74-140		1,2-Dichloroethane-d4	110	74-146	
Toluene-d8	101	88-112		1,4-Bromofluorobenzene	98	74-110	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Conestoga-Rovers & Associates		Date Received:	09/01/07
19449 Riverside Drive, Suite 230		Work Order No:	07-09-0031
Sonoma, CA 95476-6955		Preparation:	EPA 5030B
		Method:	EPA 8260B
		Units:	ug/L
Project: 1784 150th Ave., San Leandro, CA			Page 4 of 4

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
CPT-5-41'-45'	**07-09-0031-15**	**08/30/07**	**Aqueous**	**GC/MS T**	**09/10/07**	**09/10/07**	**070910L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	0.88	0.50	0.14	1		o-Xylene	ND	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	ND	1.0	0.26	1	
1,2-Dichloroethane	ND	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	ND	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	0.34	1.0	0.27	1	J	Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	ND	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	106	74-140		1,2-Dichloroethane-d4	111	74-146	
Toluene-d8	103	88-112		1,4-Bromofluorobenzene	97	74-110	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
Method Blank	**099-10-006-22,722**	**N/A**	**Aqueous**	**GC/MS FF**	**09/09/07**	**09/09/07**	**070909L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.50	0.14	1		o-Xylene	ND	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	ND	1.0	0.26	1	
1,2-Dichloroethane	ND	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	ND	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	ND	1.0	0.27	1		Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	ND	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	107	74-140		1,2-Dichloroethane-d4	116	74-146	
Toluene-d8	100	88-112		1,4-Bromofluorobenzene	102	74-110	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
Method Blank	**099-10-006-22,736**	**N/A**	**Aqueous**	**GC/MS T**	**09/10/07**	**09/10/07**	**070910L01**

Comment(s): -Results were evaluated to the MDL, concentrations >= to the MDL but < RL, if found, are qualified with a "J" flag.

Parameter	Result	RL	MDL	DF	Qual	Parameter	Result	RL	MDL	DF	Qual
Benzene	ND	0.50	0.14	1		o-Xylene	ND	1.0	0.17	1	
1,2-Dibromoethane	ND	1.0	0.49	1		Methyl-t-Butyl Ether (MTBE)	ND	1.0	0.26	1	
1,2-Dichloroethane	ND	0.50	0.26	1		Tert-Butyl Alcohol (TBA)	ND	10	5.4	1	
Ethylbenzene	ND	1.0	0.23	1		Diisopropyl Ether (DIPE)	ND	2.0	0.33	1	
Toluene	ND	1.0	0.27	1		Ethyl-t-Butyl Ether (ETBE)	ND	2.0	0.18	1	
p/m-Xylene	ND	1.0	0.54	1		Tert-Amyl-Methyl Ether (TAME)	ND	2.0	1.1	1	

Surrogates:	REC (%)	Control Limits	Qual	Surrogates:	REC (%)	Control Limits	Qual
Dibromofluoromethane	107	74-140		1,2-Dichloroethane-d4	111	74-146	
Toluene-d8	103	88-112		1,4-Bromofluorobenzene	99	74-110	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/01/07
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
SVP-1-4.5'	**Solid**	**GC 22**	**09/04/07**	**09/04/07**	**070904S02**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	72	68	48-114	6	0-23	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/01/07
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-08-2161-26	**Solid**	**GC 18**	**09/05/07**	**09/05/07**	**070905S01**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	57	53	48-114	5	0-23	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/01/07
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
CPT-3-23'-27'	**Aqueous**	**GC 24**	**09/04/07**	**09/05/07**	**070904S03**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	81	80	68-122	1	0-18	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/01/07
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8260B

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-09-0393-1	**Solid**	**GC/MS S**	**09/08/07**	**09/08/07**	**070908S01**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	94	97	79-115	3	0-13	
Carbon Tetrachloride	87	90	55-139	3	0-15	
Chlorobenzene	94	94	79-115	1	0-17	
1,2-Dibromoethane	102	102	70-130	0	0-30	
1,2-Dichlorobenzene	84	87	63-123	4	0-23	
1,1-Dichloroethene	96	96	69-123	1	0-16	
Ethylbenzene	89	90	70-130	1	0-30	
Toluene	92	94	79-115	3	0-15	
Trichloroethene	98	97	66-144	1	0-14	
Vinyl Chloride	100	100	60-126	0	0-14	
Methyl-t-Butyl Ether (MTBE)	89	95	68-128	6	0-14	
Tert-Butyl Alcohol (TBA)	78	93	44-134	17	0-37	
Diisopropyl Ether (DIPE)	97	99	75-123	2	0-12	
Ethyl-t-Butyl Ether (ETBE)	99	100	75-117	1	0-12	
Tert-Amyl-Methyl Ether (TAME)	94	98	79-115	4	0-12	
Ethanol	108	113	42-138	5	0-28	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/01/07
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8260B

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-09-0180-7	**Aqueous**	**GC/MS FF**	**09/09/07**	**09/09/07**	**070909S01**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	103	104	88-118	0	0-7	
Carbon Tetrachloride	115	116	67-145	1	0-11	
Chlorobenzene	104	107	88-118	3	0-7	
1,2-Dibromoethane	109	114	70-130	4	0-30	
1,2-Dichlorobenzene	100	101	86-116	1	0-8	
1,1-Dichloroethene	108	106	70-130	2	0-25	
Ethylbenzene	106	105	70-130	1	0-30	
Toluene	107	107	87-123	0	0-8	
Trichloroethene	110	111	79-127	1	0-10	
Vinyl Chloride	100	97	69-129	3	0-13	
Methyl-t-Butyl Ether (MTBE)	103	106	71-131	2	0-13	
Tert-Butyl Alcohol (TBA)	79	84	36-168	6	0-45	
Diisopropyl Ether (DIPE)	87	88	81-123	1	0-9	
Ethyl-t-Butyl Ether (ETBE)	89	91	72-126	2	0-12	
Tert-Amyl-Methyl Ether (TAME)	92	94	72-126	2	0-12	
Ethanol	95	102	53-149	8	0-31	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/01/07
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8260B

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-09-0058-5	**Aqueous**	**GC/MS T**	**09/10/07**	**09/10/07**	**070910S01**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	107	104	88-118	3	0-7	
Carbon Tetrachloride	96	93	67-145	3	0-11	
Chlorobenzene	103	103	88-118	0	0-7	
1,2-Dibromoethane	102	99	70-130	3	0-30	
1,2-Dichlorobenzene	106	102	86-116	4	0-8	
1,1-Dichloroethene	101	102	70-130	1	0-25	
Ethylbenzene	110	110	70-130	1	0-30	
Toluene	109	106	87-123	2	0-8	
Trichloroethene	108	102	79-127	6	0-10	
Vinyl Chloride	94	92	69-129	1	0-13	
Methyl-t-Butyl Ether (MTBE)	99	95	71-131	5	0-13	
Tert-Butyl Alcohol (TBA)	78	77	36-168	2	0-45	
Diisopropyl Ether (DIPE)	99	97	81-123	1	0-9	
Ethyl-t-Butyl Ether (ETBE)	97	96	72-126	2	0-12	
Tert-Amyl-Methyl Ether (TAME)	97	95	72-126	2	0-12	
Ethanol	87	81	53-149	6	0-31	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates	Date Received:	N/A
19449 Riverside Drive, Suite 230	Work Order No:	07-09-0031
Sonoma, CA 95476-6955	Preparation:	EPA 5030B
	Method:	EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-279-1,055	**Solid**	**GC 22**	**09/04/07**	**09/04/07**	**070904B03**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	100	99	70-124	1	0-18	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates	Date Received:	N/A
19449 Riverside Drive, Suite 230	Work Order No:	07-09-0031
Sonoma, CA 95476-6955	Preparation:	EPA 5030B
	Method:	EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-279-1,054	**Solid**	**GC 22**	**09/04/07**	**09/04/07**	**070904B02**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	100	99	70-124	1	0-18	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received:	N/A
Work Order No:	07-09-0031
Preparation:	EPA 5030B
Method:	EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-279-1,057	**Solid**	**GC 18**	**09/05/07**	**09/05/07**	**070905B01**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	93	89	70-124	4	0-18	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates		Date Received:	N/A
19449 Riverside Drive, Suite 230		Work Order No:	07-09-0031
Sonoma, CA 95476-6955		Preparation:	EPA 5030B
		Method:	EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-436-865	**Aqueous**	**GC 24**	**09/04/07**	**09/05/07**	**070904B03**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	93	95	78-120	1	0-10	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: N/A
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8260B

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-10-005-14,725	**Solid**	**GC/MS S**	**09/08/07**	**09/08/07**	**070908L01**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	96	96	84-114	0	0-7	
Carbon Tetrachloride	96	96	66-132	0	0-12	
Chlorobenzene	97	98	87-111	1	0-7	
1,2-Dibromoethane	101	100	80-120	1	0-20	
1,2-Dichlorobenzene	98	96	79-115	2	0-8	
1,1-Dichloroethene	96	97	73-121	1	0-12	
Ethylbenzene	97	99	80-120	1	0-20	
Toluene	96	97	78-114	2	0-7	
Trichloroethene	95	99	84-114	4	0-8	
Vinyl Chloride	99	101	63-129	2	0-15	
Methyl-t-Butyl Ether (MTBE)	99	96	77-125	3	0-11	
Tert-Butyl Alcohol (TBA)	86	86	47-137	0	0-27	
Diisopropyl Ether (DIPE)	99	98	76-130	1	0-8	
Ethyl-t-Butyl Ether (ETBE)	102	100	76-124	1	0-12	
Tert-Amyl-Methyl Ether (TAME)	97	96	82-118	2	0-11	
Ethanol	94	95	59-131	1	0-21	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: N/A
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8260B

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-10-005-14,727	**Solid**	**GC/MS S**	**09/08/07**	**09/08/07**	**070908L02**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	96	96	84-114	0	0-7	
Carbon Tetrachloride	96	96	66-132	0	0-12	
Chlorobenzene	97	98	87-111	1	0-7	
1,2-Dibromoethane	101	100	80-120	1	0-20	
1,2-Dichlorobenzene	98	96	79-115	2	0-8	
1,1-Dichloroethene	96	97	73-121	1	0-12	
Ethylbenzene	97	99	80-120	1	0-20	
Toluene	96	97	78-114	2	0-7	
Trichloroethene	95	99	84-114	4	0-8	
Vinyl Chloride	99	101	63-129	2	0-15	
Methyl-t-Butyl Ether (MTBE)	99	96	77-125	3	0-11	
Tert-Butyl Alcohol (TBA)	86	86	47-137	0	0-27	
Diisopropyl Ether (DIPE)	99	98	76-130	1	0-8	
Ethyl-t-Butyl Ether (ETBE)	102	100	76-124	1	0-12	
Tert-Amyl-Methyl Ether (TAME)	97	96	82-118	2	0-11	
Ethanol	94	95	59-131	1	0-21	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: N/A
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8260B

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-10-006-22,722	**Aqueous**	**GC/MS FF**	**09/09/07**	**09/09/07**	**070909L01**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	103	103	84-120	0	0-8	
Carbon Tetrachloride	121	121	63-147	0	0-10	
Chlorobenzene	108	107	89-119	1	0-7	
1,2-Dibromoethane	110	109	80-120	1	0-20	
1,2-Dichlorobenzene	103	102	89-119	1	0-9	
1,1-Dichloroethene	109	108	77-125	1	0-16	
Ethylbenzene	109	108	80-120	0	0-20	
Toluene	110	108	83-125	2	0-9	
Trichloroethene	113	110	89-119	2	0-8	
Vinyl Chloride	98	96	63-135	2	0-13	
Methyl-t-Butyl Ether (MTBE)	104	103	82-118	1	0-13	
Tert-Butyl Alcohol (TBA)	77	75	46-154	3	0-32	
Diisopropyl Ether (DIPE)	89	88	81-123	2	0-11	
Ethyl-t-Butyl Ether (ETBE)	89	90	74-122	1	0-12	
Tert-Amyl-Methyl Ether (TAME)	93	92	76-124	2	0-10	
Ethanol	116	103	60-138	12	0-32	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: N/A
Work Order No: 07-09-0031
Preparation: EPA 5030B
Method: EPA 8260B

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-10-006-22,736	**Aqueous**	**GC/MS T**	**09/10/07**	**09/10/07**	**070910L01**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	103	103	84-120	0	0-8	
Carbon Tetrachloride	97	96	63-147	1	0-10	
Chlorobenzene	104	102	89-119	2	0-7	
1,2-Dibromoethane	99	98	80-120	1	0-20	
1,2-Dichlorobenzene	104	106	89-119	2	0-9	
1,1-Dichloroethene	99	98	77-125	2	0-16	
Ethylbenzene	108	107	80-120	1	0-20	
Toluene	105	104	83-125	1	0-9	
Trichloroethene	103	101	89-119	1	0-8	
Vinyl Chloride	88	90	63-135	2	0-13	
Methyl-t-Butyl Ether (MTBE)	94	92	82-118	2	0-13	
Tert-Butyl Alcohol (TBA)	81	77	46-154	5	0-32	
Diisopropyl Ether (DIPE)	96	96	81-123	0	0-11	
Ethyl-t-Butyl Ether (ETBE)	96	96	74-122	1	0-12	
Tert-Amyl-Methyl Ether (TAME)	98	95	76-124	3	0-10	
Ethanol	79	86	60-138	9	0-32	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Glossary of Terms and Qualifiers

Work Order Number: 07-09-0031

Qualifier	Definition
*	See applicable analysis comment.
1	Surrogate compound recovery was out of control due to a required sample dilution, therefore, the sample data was reported without further clarification.
2	Surrogate compound recovery was out of control due to matrix interference. The associated method blank surrogate spike compound was in control and, therefore, the sample data was reported without further clarification.
3	Recovery of the Matrix Spike (MS) or Matrix Spike Duplicate (MSD) compound was out of control due to matrix interference. The associated LCS and/or LCSD was in control and, therefore, the sample data was reported without further clarification.
4	The MS/MSD RPD was out of control due to matrix interference. The LCS/LCSD RPD was in control and, therefore, the sample data was reported without further clarification.
5	The PDS/PDSD associated with this batch of samples was out of control due to a matrix interference effect. The associated batch LCS/LCSD was in control and, hence, the associated sample data was reported with no further corrective action required.
A	Result is the average of all dilutions, as defined by the method.
B	Analyte was present in the associated method blank.
C	Analyte presence was not confirmed on primary column.
E	Concentration exceeds the calibration range.
H	Sample received and/or analyzed past the recommended holding time.
J	Analyte was detected at a concentration below the reporting limit and above the laboratory method detection limit. Reported value is estimated.
N	Nontarget Analyte.
ND	Parameter not detected at the indicated reporting limit.
Q	Spike recovery and RPD control limits do not apply resulting from the parameter concentration in the sample exceeding the spike concentration by a factor of four or greater.
U	Undetected at the laboratory method detection limit.
X	% Recovery and/or RPD out-of-range.
Z	Analyte presence was not confirmed by second column or GC/MS analysis.

LAB: Calscience

- ☐ TA - Irvine, California
- ☐ TA - Morgan Hill, California
- ☐ TA - Sacramento, California
- ☐ TA - Nashville, Tennesee
- ☒ Calscience
- ☐ Other_____

SHELL Chain Of Custody Record

NAME OF PERSON TO BILL: Denis Brown

- ☒ ENVIRONMENTAL SERVICES
- ☐ NETWORK DEV / FE
- ☐ COMPLIANCE
- ☐ BILL CONSULTANT
- ☐ RMT/CRMT

☐ CHECK BOX TO VERIFY IF NO INCIDENT # APPLIES

INCIDENT # (ES ONLY): 98996068

PO #:

SAP or CRMT #:

DATE: 8-31-07

PAGE: 1 of 2

SAMPLING COMPANY: Conestoga-Rovers & Associates (CRA)

LOG CODE: CETS

SITE ADDRESS: Street and City: 1784 150th Ave, San Leandro, CA

State:

GLOBAL ID NO.: T0600101230

ADDRESS: 19449 Riverside Drive, Suite 230, Sonoma, CA 95476

EDF DELIVERABLE TO (Name, Company, Office Location): Felicia Ballard, CRA, Sonoma

PHONE NO.: 707-935-4850

E-MAIL: sonomaedf@craworld.com

CONSULTANT PROJECT NO.: 24062

PROJECT CONTACT (Hardcopy or PDF Report to): Ana Friel

TELEPHONE: 707-268-3812

FAX: 707-935-6649

E-MAIL: afriel@craworld.com

SAMPLER NAME(S) (Print): Scott Lewis & Carmen Rodriguez

LAB USE ONLY: 09-0031

TAT (STD IS 10 BUSINESS DAYS / RUSH IS CALENDAR DAYS):

☒ STD ☑ 5 DAY ☐ 3 DAY ☐ 2 DAY ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:

SPECIAL INSTRUCTIONS OR NOTES:

- ☐ EDD NOT NEEDED
- ☑ SHELL CONTRACT RATE APPLIES
- ☐ STATE REIMB RATE APPLIES
- ☑ RECEIPT VERIFICATION REQUESTED

REQUESTED ANALYSIS

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	NO. OF CONT.	TPH - Purgeable (8260B)	TPH - Extractable (8015M) w/SGC	BTEX (8260B)	5 Oxygenates (8260B) (MTBE, TBA, DIPE, TAME, ETBE)	MTBE (8260B)	TBA (8260B)	DIPE (8260B)	TAME (8260B)	ETBE (8260B)	1,2 DCA (8260B)	EDB (8260B)	Ethanol (8260B)	Methanol (8015M)	VOCs by 8260B	Semi-Volatiles by 8270C	Lead ☐ Total ☐ STLC ☐ TCLP	LUFT5 ☐ Total ☐ STLC ☐ TCLP	CAM17 ☐ Total ☐ STLC ☐ TCLP	Test for Disposal (see attached)		TEMPERATURE ON RECEIPT C°
1	SVP-1-4.5'	8-28-07	0827	SO	1	X		X	X						X	X										
2	SVP-5-4.5'	8-28-07	0918	SO	1	X		X	X						X	X										
3	SVP-2-4.5'	8-28-07	1048	SO	1	X		X	X						X	X										
4	SVP-3-4.5'	8-28-07	1132	SO	1	X		X	X						X	X										
5	SVP-4-4.5'	8-28-07	1257	SO	1	X		X	X						X	X										
6	CPT-3-23'-27'	8-29-07	1040	GW	5	X		X	X						X	X										
7	CPT-3-49'-53'	8-29-07	1109	GW	5	X		X	X						X	X										
8	CPT-3-69'-73'	8-29-07	1135	GW	5	X		X	X						X	X										
9	CPT-2-35'-39'	8-29-07	1612	GW	5	X		X	X						X	X										
10	CPT-2-53'-57'	8-29-07	1650	GW	5	X		X	X						X	X										

FIELD NOTES: Container/Preservative or PID Readings or Laboratory Notes

Relinquished by: (Signature)	Received by: (Signature)	Date:	Time:
Scott Lewis	CEL	8-31-07	1100
CRD	CE2	9/1/07	10:30

05/02/06 Revision

Rev. 05-May-06

SHELL Chain Of Custody Record

LAB: Calscience

- ☐ TA - Irvine, California
- ☐ TA - Morgan Hill, California
- ☐ TA - Sacramento, California
- ☐ TA - Nashville, Tennesee
- ☒ Calscience
- ☐ Other_____

NAME OF PERSON TO BILL: Denis Brown

- ☒ ENVIRONMENTAL SERVICES
- ☐ NETWORK DEV / FE
- ☐ COMPLIANCE
- ☐ BILL CONSULTANT
- ☐ RMT/CRMT

☐ CHECK BOX TO VERIFY IF NO INCIDENT # APPLIES

INCIDENT # (ES ONLY): 98996068

PO #:

SAP or CRMT #:

DATE: 8-31-07

PAGE: 2 of 2

SAMPLING COMPANY: Conestoga-Rovers & Associates (CRA)

LOG CODE: CETS

ADDRESS: 19449 Riverside Drive, Suite 230, Sonoma, CA 95476

PROJECT CONTACT (Hardcopy or PDF Report to): Ana Friel

TELEPHONE: 707-268-3812

FAX: 707-935-6649

E-MAIL: afriel@craworld.com

TAT (STD IS 10 BUSINESS DAYS / RUSH IS CALENDAR DAYS):

☒ STD ☐ 5 DAY ☐ 3 DAY ☐ 2 DAY ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:

SPECIAL INSTRUCTIONS OR NOTES:

- ☐ EDD NOT NEEDED
- ☑ SHELL CONTRACT RATE APPLIES
- ☐ STATE REIMB RATE APPLIES
- ☑ RECEIPT VERIFICATION REQUESTED

SITE ADDRESS: Street and City: 1784 150th Ave, San Leandro

State: CA

GLOBAL ID NO.: T0600101230

EDF DELIVERABLE TO (Name, Company, Office Location): Felicia Ballard, CRA, Sonoma

PHONE NO.: 707-935-4850

E-MAIL: sonomaedf@craworld.com

CONSULTANT PROJECT NO.: 240612

SAMPLER NAME(S) (Print): Scott Lewis + Caren Rodriguez

LAB USE ONLY: 09-0031

REQUESTED ANALYSIS

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	NO. OF CONT.	TPH - Purgeable (8260B)	TPH - Extractable (8015M) w/SGC	BTEX (8260B)	5 Oxygenates (8260B) (MTBE, TBA, DIPE, TAME, ETBE)	MTBE (8260B)	TBA (8260B)	DIPE (8260B)	TAME (8260B)	ETBE (8260B)	1,2 DCA (8260B)	EDB (8260B)	Ethanol (8260B)	Methanol (8015M)	VOCs by 8260B	Semi-Volatiles by 8270C	Lead ☐ Total ☐ STLC ☐ TCLP	LUFT5 ☐ Total ☐ STLC ☐ TCLP	CAM17 ☐ Total ☐ STLC ☐ TCLP	Test for Disposal (see attached)	
11	CPT-2-68'-72'	8-29-07	1725	GW	5	X		X	X						X	X									
12	CPT-6-40'-44'	8-30-07	1117	GW	5	X		X	X						X	X									
13	CPT-6-70'-74'	8-30-07	1249	GW	5	X		X	X						X	X									
14	CPT-[illegible]-41'-45'	8-30-07	1453	GW	5	X		X	X						X	X									
15	CPT-[illegible]5-41'-45'	8-3 -07	1025	GW	5	X		X	X						X	X									

FIELD NOTES:

Container/Preservative or PID Readings or Laboratory Notes

TEMPERATURE ON RECEIPT C°

Relinquished by: (Signature) Scott Lewis	Received by: (Signature) CEL	Date: 8-31-07	Time: 1600
Relinquished by: (Signature) 1650	Received by: (Signature) CEL	Date: 9/1/07	Time: 10:30
Relinquished by: (Signature)	Received by: (Signature)	Date:	Time:

05/02/06 Revision

Rev. 05-May-06

Q&Q Graphic (714) 898-9702

Calscience Environmental Laboratories, Inc.

WORK ORDER #: 07 - 09 - 0031

Cooler 1 of 1

SAMPLE RECEIPT FORM

CLIENT: CRA **DATE:** 09/01/07

TEMPERATURE – SAMPLES RECEIVED BY:

CALSCIENCE COURIER:

_____ Chilled, cooler with temperature blank provided.
_____ Chilled, cooler without temperature blank.
_____ Chilled and placed in cooler with wet ice.
_____ Ambient and placed in cooler with wet ice.
_____ Ambient temperature.
_____ °C Temperature blank.

LABORATORY (Other than Calscience Courier):

4.3 °C Temperature blank.
_____ °C IR thermometer.
_____ Ambient temperature.

Initial: HT

CUSTODY SEAL INTACT:

Sample(s): _____ Cooler: _____ No (Not Intact) : _____ Not Present: ✓

Initial: HT

SAMPLE CONDITION:

	Yes	No	N/A
Chain-Of-Custody document(s) received with samples	✓		
Sampler's name indicated on COC	✓		
Sample container label(s) consistent with custody papers	✓		
Sample container(s) intact and good condition	✓		
Correct containers and volume for analyses requested	✓		
Proper preservation noted on sample label(s)	✓		
VOA vial(s) free of headspace.	✓		
Tedlar bag(s) free of condensation			✓

Initial: HT

COMMENTS:

Calscience
Environmental
Laboratories, Inc.

ACCREDITED IN ACCORDANCE WITH nelac

September 25, 2007

Ana Friel
Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Subject: **Calscience Work Order No.: 07-09-1128**
Client Reference: 1784 150th Ave., San Leandro, CA

Dear Client:

Enclosed is an analytical report for the above-referenced project. The samples included in this report were received 9/18/2007 and analyzed in accordance with the attached chain-of-custody.

Unless otherwise noted, all analytical testing was accomplished in accordance with the guidelines established in our Quality Systems Manual, applicable standard operating procedures, and other related documentation. The original report of subcontracted analysis, if any, is provided herein, and follows the standard Calscience data package. The results in this analytical report are limited to the samples tested and any reproduction thereof must be made in its entirety.

If you have any questions regarding this report, please do not hesitate to contact the undersigned.

Sincerely,

Calscience Environmental
Laboratories, Inc.
Danielle Gonsman
Project Manager

Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/18/07
Work Order No: 07-09-1128
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
B-1-5	**07-09-1128-1**	**09/14/07**	**Solid**	**GC 24**	**09/18/07**	**09/18/07**	**070918B02**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	55	6.2	12.5		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	89	42-126	

B-1-10	**07-09-1128-2**	**09/14/07**	**Solid**	**GC 24**	**09/18/07**	**09/18/07**	**070918B02**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	24	5.0	10		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	83	42-126	

B-1-15	**07-09-1128-3**	**09/14/07**	**Solid**	**GC 24**	**09/18/07**	**09/18/07**	**070918B01**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	6.6	0.50	1		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	98	42-126	

B-1-17	**07-09-1128-4**	**09/14/07**	**Solid**	**GC 24**	**09/18/07**	**09/18/07**	**070918B02**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	160	12	25		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	101	42-126	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/18/07
Work Order No: 07-09-1128
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
B-1-20	**07-09-1128-5**	**09/14/07**	**Solid**	**GC 24**	**09/18/07**	**09/18/07**	**070918B02**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	550	12	25		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	155	42-126	2

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
B-1-25	**07-09-1128-6**	**09/14/07**	**Solid**	**GC 24**	**09/18/07**	**09/19/07**	**070918B02**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	310	25	50		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	98	42-126	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
B-1-29.5	**07-09-1128-7**	**09/14/07**	**Solid**	**GC 24**	**09/18/07**	**09/18/07**	**070918B02**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	1100	12	25		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	181	42-126	2

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
Method Blank	**099-12-279-1,105**	**N/A**	**Solid**	**GC 24**	**09/18/07**	**09/18/07**	**070918B01**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	0.50	1		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	76	42-126	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received:	09/18/07
Work Order No:	07-09-1128
Preparation:	EPA 5030B
Method:	EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
Method Blank	**099-12-279-1,106**	**N/A**	**Solid**	**GC 24**	**09/18/07**	**09/18/07**	**070918B02**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	5.0	10		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	77	42-126	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Conestoga-Rovers & Associates	Date Received:	09/18/07
19449 Riverside Drive, Suite 230	Work Order No:	07-09-1128
Sonoma, CA 95476-6955	Preparation:	EPA 5030B
	Method:	EPA 8260B
	Units:	mg/kg

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
B-1-5	**07-09-1128-1**	**09/14/07**	**Solid**	**GC/MS Z**	**09/21/07**	**09/21/07**	**070921L02**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.12	25		Toluene	ND	0.12	25	
1,2-Dibromoethane	ND	0.12	25		p/m-Xylene	1.0	0.12	25	
1,2-Dichloroethane	ND	0.12	25		o-Xylene	ND	0.12	25	
Ethylbenzene	0.27	0.12	25		Methyl-t-Butyl Ether (MTBE)	ND	0.12	25	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	91	73-139			1,2-Dichloroethane-d4	76	73-145		
Toluene-d8	102	90-108			1,4-Bromofluorobenzene	92	71-113		

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
B-1-10	**07-09-1128-2**	**09/14/07**	**Solid**	**GC/MS S**	**09/20/07**	**09/20/07**	**070920L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	0.28	0.0050	1		Toluene	0.0094	0.0050	1	
1,2-Dibromoethane	ND	0.0050	1		p/m-Xylene	0.11	0.0050	1	
1,2-Dichloroethane	ND	0.0050	1		o-Xylene	0.0056	0.0050	1	
Ethylbenzene	0.13	0.0050	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	107	73-139			1,2-Dichloroethane-d4	108	73-145		
Toluene-d8	100	90-108			1,4-Bromofluorobenzene	87	71-113		

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
B-1-15	**07-09-1128-3**	**09/14/07**	**Solid**	**GC/MS Z**	**09/21/07**	**09/21/07**	**070921L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	0.038	0.0050	1		Toluene	ND	0.0050	1	
1,2-Dibromoethane	ND	0.0050	1		p/m-Xylene	0.19	0.0050	1	
1,2-Dichloroethane	ND	0.0050	1		o-Xylene	ND	0.0050	1	
Ethylbenzene	0.17	0.0050	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	101	73-139			1,2-Dichloroethane-d4	84	73-145		
Toluene-d8	101	90-108			1,4-Bromofluorobenzene	93	71-113		

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
B-1-17	**07-09-1128-4**	**09/14/07**	**Solid**	**GC/MS Z**	**09/21/07**	**09/21/07**	**070921L02**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.12	25		Toluene	ND	0.12	25	
1,2-Dibromoethane	ND	0.12	25		p/m-Xylene	5.9	0.12	25	
1,2-Dichloroethane	ND	0.12	25		o-Xylene	0.63	0.12	25	
Ethylbenzene	1.7	0.12	25		Methyl-t-Butyl Ether (MTBE)	ND	0.12	25	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	95	73-139			1,2-Dichloroethane-d4	77	73-145		
Toluene-d8	102	90-108			1,4-Bromofluorobenzene	93	71-113		

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates	Date Received:	09/18/07
19449 Riverside Drive, Suite 230	Work Order No:	07-09-1128
Sonoma, CA 95476-6955	Preparation:	EPA 5030B
	Method:	EPA 8260B
	Units:	mg/kg

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
B-1-20	**07-09-1128-5**	**09/14/07**	**Solid**	**GC/MS Z**	**09/21/07**	**09/21/07**	**070921L02**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.62	125		Toluene	ND	0.62	125	
1,2-Dibromoethane	ND	0.62	125		p/m-Xylene	25	0.62	125	
1,2-Dichloroethane	ND	0.62	125		o-Xylene	5.6	0.62	125	
Ethylbenzene	6.0	0.62	125		Methyl-t-Butyl Ether (MTBE)	ND	0.62	125	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	94	73-139			1,2-Dichloroethane-d4	79	73-145		
Toluene-d8	100	90-108			1,4-Bromofluorobenzene	91	71-113		

B-1-25	**07-09-1128-6**	**09/14/07**	**Solid**	**GC/MS Z**	**09/21/07**	**09/21/07**	**070921L02**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	0.38	0.12	25		Toluene	ND	0.12	25	
1,2-Dibromoethane	ND	0.12	25		p/m-Xylene	10	0.12	25	
1,2-Dichloroethane	ND	0.12	25		o-Xylene	1.8	0.12	25	
Ethylbenzene	3.5	0.12	25		Methyl-t-Butyl Ether (MTBE)	ND	0.12	25	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	90	73-139			1,2-Dichloroethane-d4	75	73-145		
Toluene-d8	102	90-108			1,4-Bromofluorobenzene	93	71-113		

B-1-29.5	**07-09-1128-7**	**09/14/07**	**Solid**	**GC/MS Z**	**09/19/07**	**09/20/07**	**070919L04**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	4.1	0.62	125		Toluene	15	0.62	125	
1,2-Dibromoethane	ND	0.62	125		p/m-Xylene	80	0.62	125	
1,2-Dichloroethane	ND	0.62	125		o-Xylene	32	0.62	125	
Ethylbenzene	19	0.62	125		Methyl-t-Butyl Ether (MTBE)	ND	0.62	125	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	96	73-139			1,2-Dichloroethane-d4	82	73-145		
Toluene-d8	101	90-108			1,4-Bromofluorobenzene	93	71-113		

Method Blank	**099-10-005-14,792**	**N/A**	**Solid**	**GC/MS Z**	**09/19/07**	**09/20/07**	**070919L04**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.12	25		Toluene	ND	0.12	25	
1,2-Dibromoethane	ND	0.12	25		p/m-Xylene	ND	0.12	25	
1,2-Dichloroethane	ND	0.12	25		o-Xylene	ND	0.12	25	
Ethylbenzene	ND	0.12	25		Methyl-t-Butyl Ether (MTBE)	ND	0.12	25	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	95	73-139			1,2-Dichloroethane-d4	83	73-145		
Toluene-d8	100	90-108			1,4-Bromofluorobenzene	91	71-113		

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Conestoga-Rovers & Associates		Date Received:	09/18/07
19449 Riverside Drive, Suite 230		Work Order No:	07-09-1128
Sonoma, CA 95476-6955		Preparation:	EPA 5030B
		Method:	EPA 8260B
		Units:	mg/kg

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
Method Blank	**099-10-005-14,794**	**N/A**	**Solid**	**GC/MS S**	**09/20/07**	**09/20/07**	**070920L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.0050	1		Toluene	ND	0.0050	1	
1,2-Dibromoethane	ND	0.0050	1		p/m-Xylene	ND	0.0050	1	
1,2-Dichloroethane	ND	0.0050	1		o-Xylene	ND	0.0050	1	
Ethylbenzene	ND	0.0050	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	95	73-139			1,2-Dichloroethane-d4	96	73-145		
Toluene-d8	99	90-108			1,4-Bromofluorobenzene	94	71-113		

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
Method Blank	**099-10-005-14,800**	**N/A**	**Solid**	**GC/MS Z**	**09/21/07**	**09/21/07**	**070921L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.0050	1		Toluene	ND	0.0050	1	
1,2-Dibromoethane	ND	0.0050	1		p/m-Xylene	ND	0.0050	1	
1,2-Dichloroethane	ND	0.0050	1		o-Xylene	ND	0.0050	1	
Ethylbenzene	ND	0.0050	1		Methyl-t-Butyl Ether (MTBE)	ND	0.0050	1	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	98	73-139			1,2-Dichloroethane-d4	84	73-145		
Toluene-d8	99	90-108			1,4-Bromofluorobenzene	90	71-113		

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
Method Blank	**099-10-005-14,801**	**N/A**	**Solid**	**GC/MS Z**	**09/21/07**	**09/21/07**	**070921L02**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.12	25		Toluene	ND	0.12	25	
1,2-Dibromoethane	ND	0.12	25		p/m-Xylene	ND	0.12	25	
1,2-Dichloroethane	ND	0.12	25		o-Xylene	ND	0.12	25	
Ethylbenzene	ND	0.12	25		Methyl-t-Butyl Ether (MTBE)	ND	0.12	25	
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	95	73-139			1,2-Dichloroethane-d4	79	73-145		
Toluene-d8	101	90-108			1,4-Bromofluorobenzene	91	71-113		

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/18/07
Work Order No: 07-09-1128
Preparation: EPA 5030B
Method: EPA 8015B (M)

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-09-1136-1	**Solid**	**GC 24**	**09/18/07**	**09/19/07**	**070918S01**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	74	74	48-114	0	0-23	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/18/07
Work Order No: 07-09-1128
Preparation: EPA 5030B
Method: EPA 8260B

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-09-0897-1	**Solid**	**GC/MS Z**	**09/19/07**	**09/19/07**	**070919S01**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	89	95	79-115	7	0-13	
Carbon Tetrachloride	71	76	55-139	7	0-15	
Chlorobenzene	90	96	79-115	6	0-17	
1,2-Dibromoethane	86	94	70-130	8	0-30	
1,2-Dichlorobenzene	89	95	63-123	6	0-23	
1,1-Dichloroethene	73	81	69-123	10	0-16	
Ethylbenzene	89	95	70-130	6	0-30	
Toluene	88	92	79-115	5	0-15	
Trichloroethene	84	91	66-144	8	0-14	
Vinyl Chloride	81	84	60-126	3	0-14	
Methyl-t-Butyl Ether (MTBE)	85	92	68-128	8	0-14	
Tert-Butyl Alcohol (TBA)	68	72	44-134	6	0-37	
Diisopropyl Ether (DIPE)	95	102	75-123	8	0-12	
Ethyl-t-Butyl Ether (ETBE)	90	97	75-117	8	0-12	
Tert-Amyl-Methyl Ether (TAME)	89	98	79-115	10	0-12	
Ethanol	66	68	42-138	3	0-28	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/18/07
Work Order No: 07-09-1128
Preparation: EPA 5030B
Method: EPA 8260B

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-09-0899-19	**Solid**	**GC/MS S**	**09/20/07**	**09/20/07**	**070920S01**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	85	86	79-115	1	0-13	
Carbon Tetrachloride	86	87	55-139	1	0-15	
Chlorobenzene	91	93	79-115	2	0-17	
1,2-Dibromoethane	97	92	70-130	5	0-30	
1,2-Dichlorobenzene	92	97	63-123	5	0-23	
1,1-Dichloroethene	87	86	69-123	0	0-16	
Ethylbenzene	89	93	70-130	4	0-30	
Toluene	90	94	79-115	4	0-15	
Trichloroethene	93	92	66-144	1	0-14	
Vinyl Chloride	76	79	60-126	4	0-14	
Methyl-t-Butyl Ether (MTBE)	98	90	68-128	8	0-14	
Tert-Butyl Alcohol (TBA)	77	82	44-134	6	0-37	
Diisopropyl Ether (DIPE)	86	78	75-123	9	0-12	
Ethyl-t-Butyl Ether (ETBE)	96	88	75-117	9	0-12	
Tert-Amyl-Methyl Ether (TAME)	100	95	79-115	5	0-12	
Ethanol	65	100	42-138	42	0-28	4

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/18/07
Work Order No: 07-09-1128
Preparation: EPA 5030B
Method: EPA 8260B

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-09-1136-1	**Solid**	**GC/MS Z**	**09/21/07**	**09/21/07**	**070921S01**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	94	98	79-115	4	0-13	
Carbon Tetrachloride	71	74	55-139	4	0-15	
Chlorobenzene	96	100	79-115	4	0-17	
1,2-Dibromoethane	95	98	70-130	3	0-30	
1,2-Dichlorobenzene	94	101	63-123	7	0-23	
1,1-Dichloroethene	76	80	69-123	5	0-16	
Ethylbenzene	91	94	70-130	3	0-30	
Toluene	92	95	79-115	3	0-15	
Trichloroethene	85	87	66-144	3	0-14	
Vinyl Chloride	75	80	60-126	7	0-14	
Methyl-t-Butyl Ether (MTBE)	84	89	68-128	5	0-14	
Tert-Butyl Alcohol (TBA)	69	75	44-134	7	0-37	
Diisopropyl Ether (DIPE)	97	103	75-123	6	0-12	
Ethyl-t-Butyl Ether (ETBE)	90	96	75-117	6	0-12	
Tert-Amyl-Methyl Ether (TAME)	90	93	79-115	4	0-12	
Ethanol	74	77	42-138	4	0-28	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates	Date Received:	N/A
19449 Riverside Drive, Suite 230	Work Order No:	07-09-1128
Sonoma, CA 95476-6955	Preparation:	EPA 5030B
	Method:	EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-279-1,106	**Solid**	**GC 24**	**09/18/07**	**09/18/07**	**070918B02**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	89	89	70-124	0	0-18	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received:	N/A
Work Order No:	07-09-1128
Preparation:	EPA 5030B
Method:	EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-279-1,105	**Solid**	**GC 24**	**09/18/07**	**09/18/07**	**070918B01**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	89	89	70-124	0	0-18	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Laboratory Control Sample

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: N/A
Work Order No: 07-09-1128
Preparation: EPA 5030B
Method: EPA 8260B

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Analyzed	Lab File ID	LCS Batch Number
099-10-005-14,792	**Solid**	**GC/MS Z**	**09/19/07**	**19SEP027.rr**	**070919L04**

Parameter	Conc Added	Conc Recovered	LCS %Rec	%Rec CL	Qualifiers
Benzene	250	252	101	84-114	
Carbon Tetrachloride	250	206	82	66-132	
Chlorobenzene	250	253	101	87-111	
1,2-Dibromoethane	250	240	96	80-120	
1,2-Dichlorobenzene	250	245	98	79-115	
1,1-Dichloroethene	250	215	86	73-121	
Ethylbenzene	250	249	100	80-120	
Toluene	250	248	99	78-114	
Trichloroethene	250	238	95	84-114	
Vinyl Chloride	250	233	93	63-129	
Methyl-t-Butyl Ether (MTBE)	250	226	91	77-125	
Tert-Butyl Alcohol (TBA)	1250	976	78	47-137	
Diisopropyl Ether (DIPE)	250	256	103	76-130	
Ethyl-t-Butyl Ether (ETBE)	250	240	96	76-124	
Tert-Amyl-Methyl Ether (TAME)	250	240	96	82-118	
Ethanol	2500	1880	75	59-131	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received:	N/A
Work Order No:	07-09-1128
Preparation:	EPA 5030B
Method:	EPA 8260B

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-10-005-14,794	**Solid**	**GC/MS S**	**09/20/07**	**09/20/07**	**070920L01**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	93	95	84-114	3	0-7	
Carbon Tetrachloride	94	94	66-132	0	0-12	
Chlorobenzene	99	101	87-111	2	0-7	
1,2-Dibromoethane	97	103	80-120	5	0-20	
1,2-Dichlorobenzene	100	102	79-115	2	0-8	
1,1-Dichloroethene	95	95	73-121	1	0-12	
Ethylbenzene	102	102	80-120	0	0-20	
Toluene	96	99	78-114	3	0-7	
Trichloroethene	102	103	84-114	1	0-8	
Vinyl Chloride	83	85	63-129	2	0-15	
Methyl-t-Butyl Ether (MTBE)	89	94	77-125	6	0-11	
Tert-Butyl Alcohol (TBA)	76	84	47-137	9	0-27	
Diisopropyl Ether (DIPE)	83	85	76-130	2	0-8	
Ethyl-t-Butyl Ether (ETBE)	89	93	76-124	4	0-12	
Tert-Amyl-Methyl Ether (TAME)	94	99	82-118	5	0-11	
Ethanol	73	74	59-131	2	0-21	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: N/A
Work Order No: 07-09-1128
Preparation: EPA 5030B
Method: EPA 8260B

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-10-005-14,800	**Solid**	**GC/MS Z**	**09/21/07**	**09/21/07**	**070921L01**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	102	96	84-114	6	0-7	
Carbon Tetrachloride	80	72	66-132	9	0-12	
Chlorobenzene	104	97	87-111	6	0-7	
1,2-Dibromoethane	101	91	80-120	10	0-20	
1,2-Dichlorobenzene	104	96	79-115	8	0-8	
1,1-Dichloroethene	85	79	73-121	7	0-12	
Ethylbenzene	103	94	80-120	8	0-20	
Toluene	101	93	78-114	8	0-7	X
Trichloroethene	93	86	84-114	7	0-8	
Vinyl Chloride	95	99	63-129	4	0-15	
Methyl-t-Butyl Ether (MTBE)	89	81	77-125	10	0-11	
Tert-Butyl Alcohol (TBA)	85	69	47-137	21	0-27	
Diisopropyl Ether (DIPE)	103	95	76-130	8	0-8	
Ethyl-t-Butyl Ether (ETBE)	95	86	76-124	10	0-12	
Tert-Amyl-Methyl Ether (TAME)	95	85	82-118	11	0-11	
Ethanol	85	72	59-131	17	0-21	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: N/A
Work Order No: 07-09-1128
Preparation: EPA 5030B
Method: EPA 8260B

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-10-005-14,801	**Solid**	**GC/MS Z**	**09/21/07**	**09/21/07**	**070921L02**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	102	96	84-114	6	0-7	
Carbon Tetrachloride	80	72	66-132	9	0-12	
Chlorobenzene	104	97	87-111	6	0-7	
1,2-Dibromoethane	101	91	80-120	10	0-20	
1,2-Dichlorobenzene	104	96	79-115	8	0-8	
1,1-Dichloroethene	85	79	73-121	7	0-12	
Ethylbenzene	103	94	80-120	8	0-20	
Toluene	101	93	78-114	8	0-7	X
Trichloroethene	93	86	84-114	7	0-8	
Vinyl Chloride	95	99	63-129	4	0-15	
Methyl-t-Butyl Ether (MTBE)	89	81	77-125	10	0-11	
Tert-Butyl Alcohol (TBA)	85	69	47-137	21	0-27	
Diisopropyl Ether (DIPE)	103	95	76-130	8	0-8	
Ethyl-t-Butyl Ether (ETBE)	95	86	76-124	10	0-12	
Tert-Amyl-Methyl Ether (TAME)	95	85	82-118	11	0-11	
Ethanol	85	72	59-131	17	0-21	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Glossary of Terms and Qualifiers

Work Order Number: 07-09-1128

Qualifier	Definition
*	See applicable analysis comment.
1	Surrogate compound recovery was out of control due to a required sample dilution, therefore, the sample data was reported without further clarification.
2	Surrogate compound recovery was out of control due to matrix interference. The associated method blank surrogate spike compound was in control and, therefore, the sample data was reported without further clarification.
3	Recovery of the Matrix Spike (MS) or Matrix Spike Duplicate (MSD) compound was out of control due to matrix interference. The associated LCS and/or LCSD was in control and, therefore, the sample data was reported without further clarification.
4	The MS/MSD RPD was out of control due to matrix interference. The LCS/LCSD RPD was in control and, therefore, the sample data was reported without further clarification.
5	The PDS/PDSD associated with this batch of samples was out of control due to a matrix interference effect. The associated batch LCS/LCSD was in control and, hence, the associated sample data was reported with no further corrective action required.
A	Result is the average of all dilutions, as defined by the method.
B	Analyte was present in the associated method blank.
C	Analyte presence was not confirmed on primary column.
E	Concentration exceeds the calibration range.
H	Sample received and/or analyzed past the recommended holding time.
J	Analyte was detected at a concentration below the reporting limit and above the laboratory method detection limit. Reported value is estimated.
N	Nontarget Analyte.
ND	Parameter not detected at the indicated reporting limit.
Q	Spike recovery and RPD control limits do not apply resulting from the parameter concentration in the sample exceeding the spike concentration by a factor of four or greater.
U	Undetected at the laboratory method detection limit.
X	% Recovery and/or RPD out-of-range.
Z	Analyte presence was not confirmed by second column or GC/MS analysis.

SHELL Chain Of Custody Record

LAB:
- ☐ TA - Irvine, California
- ☐ TA - Morgan Hill, California
- ☐ TA - Sacramento, California
- ☐ TA - Nashville, Tennesee
- ☑ Calscience
- ☐ Other_____

NAME OF PERSON TO BILL: Denis Brown

- ☑ ENVIRONMENTAL SERVICES
- ☐ NETWORK DEV / FE
- ☐ BILL CONSULTANT
- ☐ COMPLIANCE
- ☐ RMT/CRMT

☐ CHECK BOX TO VERIFY IF NO INCIDENT # APPLIES

INCIDENT # (ES ONLY): 9 8 9 9 6 0 6 8

PO #:

SAP or CRMT #:

DATE: 9/14/07

PAGE: 1 of 1

SAMPLING COMPANY: Conestoga-Rovers & Associates (CRA)

LOG CODE: CETS

SITE ADDRESS: Street and City: 1784 150th Ave, San Leandro, CA

State:

GLOBAL ID NO.: T0600101230

ADDRESS: 19449 Riverside Drive, Suite 230, Sonoma, CA 95476

EDF DELIVERABLE TO (Name, Company, Office Location): Felicia Ballard, CRA, Sonoma

PHONE NO.: 707-935-4850

E-MAIL: sonomaedf@craworld.com

CONSULTANT PROJECT NO.: 240612-010

PROJECT CONTACT (Hardcopy or PDF Report to): Ana Friel

TELEPHONE: 707-268-3812

FAX: 707-268-8180

E-MAIL: afriel@craworld.com

SAMPLER NAME(S) (Print): Lauren Goldfinch

LAB USE ONLY: 09-1128

TAT (STD IS 10 BUSINESS DAYS / RUSH IS CALENDAR DAYS):
☑ STD ☐ 5 DAY ☐ 3 DAY ☐ 2 DAY ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:

SPECIAL INSTRUCTIONS OR NOTES:
- ☐ EDD NOT NEEDED
- ☑ SHELL CONTRACT RATE APPLIES
- ☐ STATE REIMB RATE APPLIES
- ☑ RECEIPT VERIFICATION REQUESTED

REQUESTED ANALYSIS

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	NO. OF CONT.	TPH - Purgeable (8260B)	TPH - Extractable (8015M) w/SGC	BTEX (8260B)	5 Oxygenates (8260B) (MTBE, TBA, DIPE, TAME, ETBE)	MTBE (8260B)	TBA (8260B)	DIPE (8260B)	TAME (8260B)	ETBE (8260B)	1,2 DCA (8260B)	EDB (8260B)	Ethanol (8260B)	Methanol (8015M)	VOCs by 8260B	Semi-Volatiles by 8270C	Lead ☐ Total ☐ STLC ☐ TCLP	LUFT5 ☐ Total ☐ STLC ☐ TCLP	CAM17 ☐ Total ☐ STLC ☐ TCLP	Test for Disposal (see attached)		TEMPERATURE ON RECEIPT C°
1	B-1-5	9/14/07	9:10	Soil	1	x		x		x					x	x										
2	B-1-10		9:20																							
3	B-1-15		9:25																							
4	B-1-17		9:45																							
5	B-1-20		9:55																							
6	B-1-25		11:55																							
7	B-1-29.5		12:05																							

FIELD NOTES:
Container/Preservative or PID Readings or Laboratory Notes

Relinquished by: (Signature)	Received by: (Signature) Secure location	Date: 9/14/07	Time: 14:15
Relinquished by: (Signature)	Received by: (Signature)	Date: 9/17/07	Time: 1016
Relinquished by: (Signature)	Received by: (Signature)	Date: 9/18/07	Time: 1030

05/02/06 Revision

Rev. 05-May-06

Q&Q Graphic (714) 898-9702

Danielle Gonsman

From: Friel, Ana [afriel@craworld.com]
Sent: Tuesday, September 18, 2007 4:37 PM
To: Danielle Gonsman
Cc: Goldfinch, Lauren
Subject: RE: Sample receipt verif.

Thanks Danielle,

You made the correct assumption. All samples should be analyzed for the same as listed in first row. Thanks!

Ana Friel, PG
Conestoga-Rovers & Associates

408 7th Street, Suite A, Eureka, CA 95501
p (707) 268-3812
f (707) 268-8180
c (707) 845-4066
afriel@craworld.com

Conestoga-Rovers & Associates has acquired the former Cambria Environmental Technology
Visit us at www.craworld.com

This e-mail may contain confidential and privileged material for the sole use of the intended recipient. Any review or distribution by others is strictly prohibited. If you are not the intended recipient please contact the sender and delete all copies.

-----Original Message-----
From: Danielle Gonsman [mailto:dgonsman@calscience.com]
Sent: Tuesday, September 18, 2007 3:57 PM
To: Friel, Ana
Subject: Sample receipt verif.

<<07-09-1128.PDF>> <<07-09-1128.pdf>>
The COC was incomplete, but we logged in samples #2-7 with the same analyses as sample #1. If this is not correct please make any necessary changes to the COC and return.
Thanks,
Danielle Gonsman
Project Manager
Calscience Environmental
Laboratories, Inc.
7440 Lincoln Way
Garden Grove, CA 92841-1427
Tel.: 714-895-5494 ext.138
Fax : 714-894-7501
dgonsman@calscience.com

PRIVACY NOTICE:
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Calscience Environmental Laboratories, Inc.

WORK ORDER #: 07 - 09 - 1128

Cooler 1 of 1

SAMPLE RECEIPT FORM

CLIENT: CRA **DATE:** 9/18/07

TEMPERATURE – SAMPLES RECEIVED BY:

CALSCIENCE COURIER:

_____ Chilled, cooler with temperature blank provided.
_____ Chilled, cooler without temperature blank.
_____ Chilled and placed in cooler with wet ice.
_____ Ambient and placed in cooler with wet ice.
_____ Ambient temperature.
_____ °C Temperature blank.

LABORATORY (Other than Calscience Courier):

3.6 °C Temperature blank.
_____ °C IR thermometer.
_____ Ambient temperature.

Initial: JP

CUSTODY SEAL INTACT:

Sample(s): _____ Cooler: _____ No (Not Intact) : _____ Not Present: ✓

Initial: JP

SAMPLE CONDITION:

	Yes	No	N/A
Chain-Of-Custody document(s) received with samples	✓		
Sampler's name indicated on COC	✓		
Sample container label(s) consistent with custody papers	✓		
Sample container(s) intact and good condition	✓		
Correct containers and volume for analyses requested	✓		
Proper preservation noted on sample label(s)			✓
VOA vial(s) free of headspace.			✓
Tedlar bag(s) free of condensation			✓

Initial: JP

COMMENTS:

LAB: Air Toxics
☐ TA - Irvine, California
☐ TA - Morgan Hill, California
☐ TA - Sacramento, California
☐ TA - Nashville, Tennessee
☐ Calscience
☑ Other

SHELL Chain Of Custody Record

0709553

NAME OF PERSON TO BILL: Benis Brown

☑ ENVIRONMENTAL SERVICES ☐ NETWORK DEV / FE ☐ COMPLIANCE ☐ BILL CONSULTANT ☐ RMT/CRMT

☐ CHECK BOX TO VERIFY IF NO INCIDENT # APPLIES

INCIDENT # (ES ONLY): 9 8 9 9 6 0 6 8

PO #: | SAP or CRMT #:

DATE: 9/25/07

PAGE: 1 of 1

SAMPLING COMPANY: Conestoga-Rovers & Associates (CRA) | LOG CODE: CETS

ADDRESS: 19449 Riverside Drive, Suite 230, Sonoma, CA 95476

PROJECT CONTACT (Hardcopy or PDF Report to): Ana Friel

TELEPHONE: 707-268-3812 | FAX: 707-268-8180 | E-MAIL: afriel@craworld.com

SITE ADDRESS: Street and City: 1784 150th Ave, San Leandro, CA | State | GLOBAL ID NO.: T0600101230

EDF DELIVERABLE TO (Name, Company, Office Location): Felicia Ballard, CRA, Sonoma | PHONE NO.: 707-935-4850 | E-MAIL: sonomaedf@craworld.com | CONSULTANT PROJECT NO.: 240612-010

SAMPLER NAME(S) (Print): Lauren Goldfinch

LAB USE ONLY

TAT (STD IS 10 BUSINESS DAYS / RUSH IS CALENDAR DAYS): ☐ STD ☐ 5 DAY ☑ 3 DAY ☐ 2 DAY ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY:

SPECIAL INSTRUCTIONS OR NOTES:
☐ EDD NOT NEEDED
☑ SHELL CONTRACT RATE APPLIES
☐ STATE REIMB RATE APPLIES
☑ RECEIPT VERIFICATION REQUESTED

Please report results in µg/m³

REQUESTED ANALYSIS

Receipt vac 9/26/07

FIELD NOTES: Container/Preservative or PID Readings or Laboratory Notes

TEMPERATURE ON RECEIPT C°

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	NO. OF CONT.	TPHg (TO-3)	BTEX (TO-15)	MTBE (TO-15)	Isobutane, butane, propane (TO-15, GC/FID)	Receipt vac	FIELD NOTES
01A	SVP-4	9/25/07	10:24	Air	1	X	X	X	X	5.5"Hg	Summa ID: 3255
02A	SVP-5		10:34	Air	1	X	X	X	X	7.0"Hg	Summa ID: SC 21
03A	SVP-3		11:25	Air	1	X	X	X	X	8.0"Hg	Summa ID: SC 15
04A	SVP-3 Dup		11:25	Air	1	X	X	X	X	6.5"Hg	Summa ID: SC 41
05A	SVP-1		12:15	Air	1	X	X	X	X	7.5"Hg	Summa ID: 11833
06A	SVP-2		13:20	Air	1	X	X	X	X	6.5"Hg	Summa ID: 2217
07A	Trip Blank	↓	13:30	Air	1	X	X	X	X	28.5"Hg	Summa ID: 33404

CUSTODY SEAL INTACT? Y N NONE TEMP NA

Relinquished by: (Signature)	Received by: (Signature)	Date:	Time:
[signature]	Secure location	9/25/07	14:30
[signature]	[signature]	9/26/07	1255

05/2/06 Revision

Rev. 05-May-06

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Air Toxics Ltd. Introduces the Electronic Report

Thank you for choosing Air Toxics Ltd. To better serve our customers, we are providing your report by e-mail. This document is provided in Portable Document Format which can be viewed with Acrobat Reader by Adobe.

This electronic report includes the following:

- Work order Summary;
- Laboratory Narrative;
- Results; and
- Chain of Custody (copy).

180 BLUE RAVINE ROAD, SUITE B FOLSOM, CA - 95630

(916) 985-1000 .FAX (916) 985-1020
Hours 8:00 A.M to 6:00 P.M. Pacific

AN ENVIRONMENTAL ANALYTICAL LABORATORY

WORK ORDER #: 0709553A

Work Order Summary

CLIENT:	Ms. Ana Friel Conestoga-Rovers Associates (CRA) 19449 Riverside Drive Suite 230 Sonoma, CA 95476	**BILL TO:**	Accounts Payable Shell Oil Products US P.O. Box 4935 Houston, TX 77210-4935
PHONE:	(707)-935-4850	**P.O. #**	240612-010
FAX:	707-935-6649	**PROJECT #**	240612-010
DATE RECEIVED:	09/26/2007	**CONTACT:**	Sarah Nguyen
DATE COMPLETED:	09/30/2007		

FRACTION #	NAME	TEST	RECEIPT VAC./PRES.
01A	SVP-4	Modified TO-15/TICs	5.5 "Hg
02A	SVP-5	Modified TO-15/TICs	7.0 "Hg
03A	SVP-3	Modified TO-15/TICs	8.0 "Hg
04A	SVP-3 DUP	Modified TO-15/TICs	6.5 "Hg
05A	SVP-1	Modified TO-15/TICs	7.5 "Hg
05AA	SVP-1 Lab Duplicate	Modified TO-15/TICs	7.5 "Hg
06A	SVP-2	Modified TO-15/TICs	6.5 "Hg
07A	Trip Blank	Modified TO-15/TICs	28.5 "Hg
08A	Lab Blank	Modified TO-15/TICs	NA
09A	CCV	Modified TO-15/TICs	NA
10A	LCS	Modified TO-15/TICs	NA

CERTIFIED BY: Linda D. Frumarn DATE: 09/30/07

Laboratory Director

Certfication numbers: CA NELAP - 02110CA, LA NELAP/LELAP- AI 30763, NJ NELAP - CA004
NY NELAP - 11291, UT NELAP - 9166389892
Name of Accrediting Agency: NELAP/Florida Department of Health, Scope of Application: Clean Air Act,
Accreditation number: E87680, Effective date: 07/01/07, Expiration date: 06/30/08
Air Toxics Ltd. certifies that the test results contained in this report meet all requirements of the NELAC standards

This report shall not be reproduced, except in full, without the written approval of Air Toxics Ltd.

180 BLUE RAVINE ROAD, SUITE B FOLSOM, CA - 95630
(916) 985-1000 . (800) 985-5955 . FAX (916) 985-1020

LABORATORY NARRATIVE
Modified TO-15
Conestoga-Rovers Associates (CRA)
Workorder# 0709553A

Seven 1 Liter Summa Canister (100% Certified) samples were received on September 26, 2007. The laboratory performed analysis via modified EPA Method TO-15 using GC/MS in the full scan mode. The method involves concentrating up to 0.2 liters of air. The concentrated aliquot is then flash vaporized and swept through a water management system to remove water vapor. Following dehumidification, the sample passes directly into the GC/MS for analysis.

This workorder was independently validated prior to submittal using 'USEPA National Functional Guidelines' as generally applied to the analysis of volatile organic compounds in air. A rules-based, logic driven, independent validation engine was employed to assess completeness, evaluate pass/fail of relevant project quality control requirements and verification of all quantified amounts.

Method modifications taken to run these samples are summarized in the table below. Specific project requirements may over-ride the ATL modifications.

Requirement	***TO-15***	***ATL Modifications***
Daily CCV	+- 30% Difference	</= 30% Difference with two allowed out up to </=40%.; flag and narrate outliers
Sample collection media	Summa canister	ATL recommends use of summa canisters to insure data defensibility, but will report results from Tedlar bags at client request
Method Detection Limit	Follow 40CFR Pt.136 App. B	The MDL met all relevant requirements in Method TO-15 (statistical MDL less than the LOQ). The concentration of the spiked replicate may have exceeded 10X the calculated MDL in some cases

Receiving Notes

The Chain of Custody (COC) was not relinquished properly. A signature and date were not provided by the field sampler.

Analytical Notes

Specific analytes that are requested by the client to be reported as tentatively identified compounds (TICs) are determined by searching for each compound's characteristic spectra. If no chromatographic peak displaying the compound specific spectra exists, then the TIC is reported as not detected. Please note that the laboratory has not evaluated the stability of any heretofore tentatively identified compound in the vapor phase or for efficiency of recovery through the analytical system.

Definition of Data Qualifying Flags

Eight qualifiers may have been used on the data analysis sheets and indicates as follows:

B - Compound present in laboratory blank greater than reporting limit (background subtraction no performed).

J - Estimated value.
E - Exceeds instrument calibration range.
S - Saturated peak.
Q - Exceeds quality control limits.
U - Compound analyzed for but not detected above the reporting limit.
UJ- Non-detected compound associated with low bias in the CCV
N - The identification is based on presumptive evidence.

File extensions may have been used on the data analysis sheets and indicates as follows:
a-File was requantified
b-File was quantified by a second column and detector
r1-File was requantified for the purpose of reissue

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Summary of Detected Compounds
MODIFIED EPA METHOD TO-15 GC/MS FULL SCAN

Client Sample ID: SVP-4

Lab ID#: 0709553A-01A

Compound	Rpt. Limit (ppbv)	Amount (ppbv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
Toluene	1.2	3.4	4.6	13
Ethyl Benzene	1.2	1.4	5.4	6.3
m,p-Xylene	1.2	4.8	5.4	21
o-Xylene	1.2	2.4	5.4	10

TENTATIVELY IDENTIFIED COMPOUNDS

Compound	CAS Number	Match Quality	Amount ppbv
Butane	106-97-8	72%	300 N J
Propane, 2-methyl-	75-28-5	9.0%	59 N J

Client Sample ID: SVP-5

Lab ID#: 0709553A-02A

No Detections Were Found.

Client Sample ID: SVP-3

Lab ID#: 0709553A-03A

No Detections Were Found.

Client Sample ID: SVP-3 DUP

Lab ID#: 0709553A-04A

No Detections Were Found.

Client Sample ID: SVP-1

Lab ID#: 0709553A-05A

Compound	Rpt. Limit (ppbv)	Amount (ppbv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
Toluene	5.4	1900	20	7000
Ethyl Benzene	5.4	28	23	120
m,p-Xylene	5.4	50	23	220
o-Xylene	5.4	17	23	76

TENTATIVELY IDENTIFIED COMPOUNDS

Compound	CAS Number	Match Quality	Amount ppbv
Butane	106-97-8	4.0%	28 N J

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Summary of Detected Compounds
MODIFIED EPA METHOD TO-15 GC/MS FULL SCAN

Client Sample ID: SVP-1

Lab ID#: 0709553A-05A

TENTATIVELY IDENTIFIED COMPOUNDS

Compound	CAS Number	Match Quality	Amount ppbv
Propane, 2-methyl-	75-28-5	3.0%	33 N J

Client Sample ID: SVP-1 Lab Duplicate

Lab ID#: 0709553A-05AA

Compound	Rpt. Limit (ppbv)	Amount (ppbv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
Benzene	2.7	4.1	8.6	13
Toluene	2.7	1900 E	10	7000 E
Ethyl Benzene	2.7	29	12	120
m,p-Xylene	2.7	48	12	210
o-Xylene	2.7	18	12	76

TENTATIVELY IDENTIFIED COMPOUNDS

Compound	CAS Number	Match Quality	Amount ppbv
Butane	106-97-8	9.0%	24 N J
Propane, 2-methyl-	75-28-5	2.0%	32 N J

Client Sample ID: SVP-2

Lab ID#: 0709553A-06A

Compound	Rpt. Limit (ppbv)	Amount (ppbv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
Methyl tert-butyl ether	1.3	6.6	4.6	24
Benzene	1.3	3.4	4.1	11
Toluene	1.3	24	4.9	90
Ethyl Benzene	1.3	3.1	5.6	14
m,p-Xylene	1.3	9.3	5.6	40
o-Xylene	1.3	3.7	5.6	16

Client Sample ID: Trip Blank

Lab ID#: 0709553A-07A

No Detections Were Found.

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: SVP-4

Lab ID#: 0709553A-01A

MODIFIED EPA METHOD TO-15 GC/MS FULL SCAN

File Name:	**1092807**	**Date of Collection: 9/25/07**	
Dil. Factor:	**2.47**	**Date of Analysis: 9/28/07 12:35 PM**	

Compound	Rpt. Limit (ppbv)	Amount (ppbv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
Methyl tert-butyl ether	1.2	Not Detected	4.4	Not Detected
Benzene	1.2	Not Detected	3.9	Not Detected
Toluene	1.2	3.4	4.6	13
Ethyl Benzene	1.2	1.4	5.4	6.3
m,p-Xylene	1.2	4.8	5.4	21
o-Xylene	1.2	2.4	5.4	10

TENTATIVELY IDENTIFIED COMPOUNDS

Compound	CAS Number	Match Quality	Amount ppbv
Butane	106-97-8	72%	300 N J
Propane, 2-methyl-	75-28-5	9.0%	59 N J
Propane	74-98-6	NA	Not Detected

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Toluene-d8	103	70-130
1,2-Dichloroethane-d4	103	70-130
4-Bromofluorobenzene	92	70-130

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: SVP-5

Lab ID#: 0709553A-02A

MODIFIED EPA METHOD TO-15 GC/MS FULL SCAN

File Name:	**1092808**	**Date of Collection: 9/25/07**	
Dil. Factor:	**35.2**	**Date of Analysis: 9/28/07 01:14 PM**	

Compound	Rpt. Limit (ppbv)	Amount (ppbv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
Methyl tert-butyl ether	18	Not Detected	63	Not Detected
Benzene	18	Not Detected	56	Not Detected
Toluene	18	Not Detected	66	Not Detected
Ethyl Benzene	18	Not Detected	76	Not Detected
m,p-Xylene	18	Not Detected	76	Not Detected
o-Xylene	18	Not Detected	76	Not Detected

TENTATIVELY IDENTIFIED COMPOUNDS

Compound	CAS Number	Match Quality	Amount ppbv
Butane	106-97-8	NA	Not Detected
Isobutane	75-28-5	NA	Not Detected
Propane	74-98-6	NA	Not Detected

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Toluene-d8	101	70-130
1,2-Dichloroethane-d4	109	70-130
4-Bromofluorobenzene	93	70-130

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: SVP-3

Lab ID#: 0709553A-03A

MODIFIED EPA METHOD TO-15 GC/MS FULL SCAN

File Name:	**1092809**	**Date of Collection: 9/25/07**	
Dil. Factor:	**2.76**	**Date of Analysis: 9/28/07 02:14 PM**	

Compound	Rpt. Limit (ppbv)	Amount (ppbv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
Methyl tert-butyl ether	1.4	Not Detected	5.0	Not Detected
Benzene	1.4	Not Detected	4.4	Not Detected
Toluene	1.4	Not Detected	5.2	Not Detected
Ethyl Benzene	1.4	Not Detected	6.0	Not Detected
m,p-Xylene	1.4	Not Detected	6.0	Not Detected
o-Xylene	1.4	Not Detected	6.0	Not Detected

TENTATIVELY IDENTIFIED COMPOUNDS

Compound	CAS Number	Match Quality	Amount ppbv
Butane	106-97-8	NA	Not Detected
Isobutane	75-28-5	NA	Not Detected
Propane	74-98-6	NA	Not Detected

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Toluene-d8	104	70-130
1,2-Dichloroethane-d4	102	70-130
4-Bromofluorobenzene	92	70-130

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: SVP-3 DUP

Lab ID#: 0709553A-04A

MODIFIED EPA METHOD TO-15 GC/MS FULL SCAN

File Name:	**1092810**	**Date of Collection: 9/25/07**	
Dil. Factor:	**2.58**	**Date of Analysis: 9/28/07 02:56 PM**	

Compound	Rpt. Limit (ppbv)	Amount (ppbv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
Methyl tert-butyl ether	1.3	Not Detected	4.6	Not Detected
Benzene	1.3	Not Detected	4.1	Not Detected
Toluene	1.3	Not Detected	4.9	Not Detected
Ethyl Benzene	1.3	Not Detected	5.6	Not Detected
m,p-Xylene	1.3	Not Detected	5.6	Not Detected
o-Xylene	1.3	Not Detected	5.6	Not Detected

TENTATIVELY IDENTIFIED COMPOUNDS

Compound	CAS Number	Match Quality	Amount ppbv
Butane	106-97-8	NA	Not Detected
Isobutane	75-28-5	NA	Not Detected
Propane	74-98-6	NA	Not Detected

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Toluene-d8	102	70-130
1,2-Dichloroethane-d4	98	70-130
4-Bromofluorobenzene	91	70-130

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: SVP-1

Lab ID#: 0709553A-05A

MODIFIED EPA METHOD TO-15 GC/MS FULL SCAN

File Name:	**1092812**	**Date of Collection: 9/25/07**	
Dil. Factor:	**10.8**	**Date of Analysis: 9/28/07 04:17 PM**	

Compound	Rpt. Limit (ppbv)	Amount (ppbv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
Methyl tert-butyl ether	5.4	Not Detected	19	Not Detected
Benzene	5.4	Not Detected	17	Not Detected
Toluene	5.4	1900	20	7000
Ethyl Benzene	5.4	28	23	120
m,p-Xylene	5.4	50	23	220
o-Xylene	5.4	17	23	76

TENTATIVELY IDENTIFIED COMPOUNDS

Compound	CAS Number	Match Quality	Amount ppbv
Butane	106-97-8	4.0%	28 N J
Propane, 2-methyl-	75-28-5	3.0%	33 N J
Propane	74-98-6	NA	Not Detected

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Toluene-d8	99	70-130
1,2-Dichloroethane-d4	99	70-130
4-Bromofluorobenzene	94	70-130

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: SVP-1 Lab Duplicate

Lab ID#: 0709553A-05AA

MODIFIED EPA METHOD TO-15 GC/MS FULL SCAN

File Name:	**1092811**	**Date of Collection: 9/25/07**	
Dil. Factor:	**5.38**	**Date of Analysis: 9/28/07 03:34 PM**	

Compound	Rpt. Limit (ppbv)	Amount (ppbv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
Methyl tert-butyl ether	2.7	Not Detected	9.7	Not Detected
Benzene	2.7	4.1	8.6	13
Toluene	2.7	1900 E	10	7000 E
Ethyl Benzene	2.7	29	12	120
m,p-Xylene	2.7	48	12	210
o-Xylene	2.7	18	12	76

TENTATIVELY IDENTIFIED COMPOUNDS

Compound	CAS Number	Match Quality	Amount ppbv
Butane	106-97-8	9.0%	24 N J
Propane, 2-methyl-	75-28-5	2.0%	32 N J
Propane	74-98-6	NA	Not Detected

E = Exceeds instrument calibration range.

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Toluene-d8	99	70-130
1,2-Dichloroethane-d4	99	70-130
4-Bromofluorobenzene	92	70-130

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: SVP-2

Lab ID#: 0709553A-06A

MODIFIED EPA METHOD TO-15 GC/MS FULL SCAN

File Name:	**1092813**	**Date of Collection: 9/25/07**	
Dil. Factor:	**2.58**	**Date of Analysis: 9/28/07 05:00 PM**	

Compound	Rpt. Limit (ppbv)	Amount (ppbv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
Methyl tert-butyl ether	1.3	6.6	4.6	24
Benzene	1.3	3.4	4.1	11
Toluene	1.3	24	4.9	90
Ethyl Benzene	1.3	3.1	5.6	14
m,p-Xylene	1.3	9.3	5.6	40
o-Xylene	1.3	3.7	5.6	16

TENTATIVELY IDENTIFIED COMPOUNDS

Compound	CAS Number	Match Quality	Amount ppbv
Butane	106-97-8	NA	Not Detected
Isobutane	75-28-5	NA	Not Detected
Propane	74-98-6	NA	Not Detected

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Toluene-d8	102	70-130
1,2-Dichloroethane-d4	104	70-130
4-Bromofluorobenzene	94	70-130

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: Trip Blank

Lab ID#: 0709553A-07A

MODIFIED EPA METHOD TO-15 GC/MS FULL SCAN

File Name:	**1092814**	**Date of Collection: 9/25/07**	
Dil. Factor:	**1.00**	**Date of Analysis: 9/28/07 05:39 PM**	

Compound	Rpt. Limit (ppbv)	Amount (ppbv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
Methyl tert-butyl ether	0.50	Not Detected	1.8	Not Detected
Benzene	0.50	Not Detected	1.6	Not Detected
Toluene	0.50	Not Detected	1.9	Not Detected
Ethyl Benzene	0.50	Not Detected	2.2	Not Detected
m,p-Xylene	0.50	Not Detected	2.2	Not Detected
o-Xylene	0.50	Not Detected	2.2	Not Detected

TENTATIVELY IDENTIFIED COMPOUNDS

Compound	CAS Number	Match Quality	Amount ppbv
Butane	106-97-8	NA	Not Detected
Isobutane	75-28-5	NA	Not Detected
Propane	74-98-6	NA	Not Detected

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Toluene-d8	101	70-130
1,2-Dichloroethane-d4	103	70-130
4-Bromofluorobenzene	91	70-130

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: Lab Blank

Lab ID#: 0709553A-08A

MODIFIED EPA METHOD TO-15 GC/MS FULL SCAN

File Name:	**1092804**	**Date of Collection: NA**	
Dil. Factor:	**1.00**	**Date of Analysis: 9/28/07 08:55 AM**	

Compound	Rpt. Limit (ppbv)	Amount (ppbv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
Methyl tert-butyl ether	0.50	Not Detected	1.8	Not Detected
Benzene	0.50	Not Detected	1.6	Not Detected
Toluene	0.50	Not Detected	1.9	Not Detected
Ethyl Benzene	0.50	Not Detected	2.2	Not Detected
m,p-Xylene	0.50	Not Detected	2.2	Not Detected
o-Xylene	0.50	Not Detected	2.2	Not Detected

TENTATIVELY IDENTIFIED COMPOUNDS

Compound	CAS Number	Match Quality	Amount ppbv
Butane	106-97-8	NA	Not Detected
Isobutane	75-28-5	NA	Not Detected
Propane	74-98-6	NA	Not Detected

Container Type: NA - Not Applicable

Surrogates	%Recovery	Method Limits
Toluene-d8	102	70-130
1,2-Dichloroethane-d4	99	70-130
4-Bromofluorobenzene	90	70-130

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: CCV

Lab ID#: 0709553A-09A

MODIFIED EPA METHOD TO-15 GC/MS FULL SCAN

File Name:	**1092802**	**Date of Collection: NA**	
Dil. Factor:	**1.00**	**Date of Analysis: 9/28/07 07:32 AM**	

Compound	%Recovery
Methyl tert-butyl ether	91
Benzene	102
Toluene	105
Ethyl Benzene	106
m,p-Xylene	108
o-Xylene	105

Container Type: NA - Not Applicable

Surrogates	%Recovery	Method Limits
Toluene-d8	100	70-130
1,2-Dichloroethane-d4	99	70-130
4-Bromofluorobenzene	100	70-130

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: LCS

Lab ID#: 0709553A-10A

MODIFIED EPA METHOD TO-15 GC/MS FULL SCAN

File Name:	**1092803**	**Date of Collection: NA**	
Dil. Factor:	**1.00**	**Date of Analysis: 9/28/07 08:09 AM**	

Compound	**%Recovery**
Methyl tert-butyl ether	99
Benzene	106
Toluene	117
Ethyl Benzene	108
m,p-Xylene	111
o-Xylene	110

Container Type: NA - Not Applicable

Surrogates	**%Recovery**	**Method Limits**
Toluene-d8	101	70-130
1,2-Dichloroethane-d4	99	70-130
4-Bromofluorobenzene	97	70-130

AN ENVIRONMENTAL ANALYTICAL LABORATORY

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This electronic report includes the following:

- Work order Summary;
- Laboratory Narrative;
- Results; and
- Chain of Custody (copy).

180 BLUE RAVINE ROAD, SUITE B FOLSOM, CA - 95630

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Hours 8:00 A.M to 6:00 P.M. Pacific

AN ENVIRONMENTAL ANALYTICAL LABORATORY

WORK ORDER #: 0709553BR1

Work Order Summary

CLIENT:	Ms. Ana Friel Conestoga-Rovers Associates (CRA) 19449 Riverside Drive Suite 230 Sonoma, CA 95476	**BILL TO:**	Accounts Payable Shell Oil Products US P.O. Box 4935 Houston, TX 77210-4935
PHONE:	(707)-935-4850	**P.O. #**	240612-010
FAX:	707-935-6649	**PROJECT #**	240612-010
DATE RECEIVED:	09/26/2007	**CONTACT:**	Sarah Nguyen
DATE COMPLETED:	09/29/2007		
DATE REISSUED:	10/12/2007		

FRACTION #	NAME	TEST	RECEIPT VAC./PRES.
01A	SVP-4	Modified TO-3	5.5 "Hg
02A	SVP-5	Modified TO-3	7.0 "Hg
02AA	SVP-5 Lab Duplicate	Modified TO-3	7.0 "Hg
03A	SVP-3	Modified TO-3	8.0 "Hg
04A	SVP-3 DUP	Modified TO-3	6.5 "Hg
05A	SVP-1	Modified TO-3	7.5 "Hg
06A	SVP-2	Modified TO-3	6.5 "Hg
07A	Trip Blank	Modified TO-3	28.5 "Hg
08A	Lab Blank	Modified TO-3	NA
09A	LCS	Modified TO-3	NA

CERTIFIED BY: Linda D. Fruman DATE: 10/12/07

Laboratory Director

Certfication numbers: CA NELAP - 02110CA, LA NELAP/LELAP- AI 30763, NJ NELAP - CA004
NY NELAP - 11291, UT NELAP - 9166389892
Name of Accrediting Agency: NELAP/Florida Department of Health, Scope of Application: Clean Air Act,
Accreditation number: E87680, Effective date: 07/01/07, Expiration date: 06/30/08
Air Toxics Ltd. certifies that the test results contained in this report meet all requirements of the NELAC standards

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LABORATORY NARRATIVE
Modified TO-3
Conestoga-Rovers Associates (CRA)
Workorder# 0709553BR1

Seven 1 Liter Summa Canister (100% Certified) samples were received on September 26, 2007. The laboratory performed analysis for volatile organic compounds in air via modified EPA Method TO-3 using gas chromatography with photo ionization and flame ionization detection. The method involves concentrating up to 200 mL of sample. The concentrated aliquot is then dry purged to remove water vapor prior to entering the chromatographic system. The TPH (Gasoline Range) results are calculated using the response factor of Gasoline. A molecular weight of 100 is used to convert the TPH (Gasoline Range) ppmv result to ug/m3. See the data sheets for the reporting limits for each compound.

Method modifications taken to run these samples include:

Requirement	***TO-3***	***ATL Modifications***
Daily Calibration Standard Frequency	Prior to sample analysis and every 4 - 6 hrs	Prior to sample analysis and after the analytical batch </= 20 samples
Initial Calibration Calculation	4-point calibration using a linear regression model	5-point calibration using average Response Factor
Initial Calibration Frequency	Weekly	When daily calibration standard recovery is outside 75 - 125 %, or upon significant changes to procedure or instrumentation
Moisture Control	Nafion system	Sorbent system
Minimum Detection Limit (MDL)	Calculated using the equation DL = A+3.3S, where A is intercept of calibration line and S is the standard deviation of at least 3 reps of low level standard	40 CFR Pt. 136 App. B
Preparation of Standards	Levels achieved through dilution of gas mixture	Levels achieved through loading various volumes of the gas mixture

Receiving Notes

The Chain of Custody (COC) was not relinquished properly. A signature and date were not provided by the field sampler.

Analytical Notes

There were no analytical discrepancies.

THE WORKORDER WAS REISSUED ON OCTOBER 12, 2007 TO REPORT RESULTS IN UG/M3 PER CLIENT'S REQUEST.

Definition of Data Qualifying Flags

Seven qualifiers may have been used on the data analysis sheets and indicate as follows:
B - Compound present in laboratory blank greater than reporting limit.
J - Estimated value.
E - Exceeds instrument calibration range.
S - Saturated peak.
Q - Exceeds quality control limits.
U - Compound analyzed for but not detected above the detection limit.
M - Reported value may be biased due to apparent matrix interferences.

File extensions may have been used on the data analysis sheets and indicates as follows:
a-File was requantified
b-File was quantified by a second column and detector
r1-File was requantified for the purpose of reissue

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Summary of Detected Compounds
MODIFIED EPA METHOD TO-3 GC/FID

Client Sample ID: SVP-4

Lab ID#: 0709553BR1-01A

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.062	3.0	250	12000

Client Sample ID: SVP-5

Lab ID#: 0709553BR1-02A

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.066	17	270	70000

Client Sample ID: SVP-5 Lab Duplicate

Lab ID#: 0709553BR1-02AA

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.066	17	270	70000

Client Sample ID: SVP-3

Lab ID#: 0709553BR1-03A

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.069	0.074	280	300

Client Sample ID: SVP-3 DUP

Lab ID#: 0709553BR1-04A

No Detections Were Found.

Client Sample ID: SVP-1

Lab ID#: 0709553BR1-05A

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.067	3.0	280	12000

Client Sample ID: SVP-2

Lab ID#: 0709553BR1-06A

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Summary of Detected Compounds
MODIFIED EPA METHOD TO-3 GC/FID

Client Sample ID: SVP-2

Lab ID#: 0709553BR1-06A

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.064	0.19	260	760

Client Sample ID: Trip Blank

Lab ID#: 0709553BR1-07A

No Detections Were Found.

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: SVP-4

Lab ID#: 0709553BR1-01A

MODIFIED EPA METHOD TO-3 GC/FID

File Name:	**6092810**	**Date of Collection: 9/25/07**	
Dil. Factor:	**2.47**	**Date of Analysis: 9/28/07 08:50 AM**	

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.062	3.0	250	12000

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Fluorobenzene (FID)	91	75-150

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: SVP-5

Lab ID#: 0709553BR1-02A

MODIFIED EPA METHOD TO-3 GC/FID

File Name:	**6092811**	**Date of Collection: 9/25/07**	
Dil. Factor:	**2.64**	**Date of Analysis: 9/28/07 09:16 AM**	

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.066	17	270	70000

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Fluorobenzene (FID)	92	75-150

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: SVP-5 Lab Duplicate

Lab ID#: 0709553BR1-02AA

MODIFIED EPA METHOD TO-3 GC/FID

File Name:	**6092812**	**Date of Collection: 9/25/07**	
Dil. Factor:	**2.64**	**Date of Analysis: 9/28/07 09:43 AM**	

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.066	17	270	70000

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Fluorobenzene (FID)	92	75-150

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: SVP-3

Lab ID#: 0709553BR1-03A

MODIFIED EPA METHOD TO-3 GC/FID

File Name:	**6092813**	**Date of Collection: 9/25/07**	
Dil. Factor:	**2.76**	**Date of Analysis: 9/28/07 10:09 AM**	

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.069	0.074	280	300

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Fluorobenzene (FID)	87	75-150

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: SVP-3 DUP

Lab ID#: 0709553BR1-04A

MODIFIED EPA METHOD TO-3 GC/FID

File Name:	**6092814**	**Date of Collection:**	**9/25/07**
Dil. Factor:	**2.58**	**Date of Analysis:**	**9/28/07 10:36 AM**

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.064	Not Detected	260	Not Detected

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Fluorobenzene (FID)	86	75-150

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: SVP-1

Lab ID#: 0709553BR1-05A

MODIFIED EPA METHOD TO-3 GC/FID

File Name:	**6092815**	**Date of Collection: 9/25/07**	
Dil. Factor:	**2.69**	**Date of Analysis: 9/28/07 11:02 AM**	

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.067	3.0	280	12000

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Fluorobenzene (FID)	88	75-150

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: SVP-2

Lab ID#: 0709553BR1-06A

MODIFIED EPA METHOD TO-3 GC/FID

File Name:	**6092816**	**Date of Collection: 9/25/07**	
Dil. Factor:	**2.58**	**Date of Analysis: 9/28/07 11:29 AM**	

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.064	0.19	260	760

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Fluorobenzene (FID)	87	75-150

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: Trip Blank

Lab ID#: 0709553BR1-07A

MODIFIED EPA METHOD TO-3 GC/FID

File Name:	**6092817**	**Date of Collection:**	**9/25/07**
Dil. Factor:	**1.00**	**Date of Analysis:**	**9/28/07 11:55 AM**

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.025	Not Detected	100	Not Detected

Container Type: 1 Liter Summa Canister (100% Certified)

Surrogates	%Recovery	Method Limits
Fluorobenzene (FID)	87	75-150

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: Lab Blank

Lab ID#: 0709553BR1-08A

MODIFIED EPA METHOD TO-3 GC/FID

File Name:	**6092803**	**Date of Collection: NA**	
Dil. Factor:	**1.00**	**Date of Analysis: 9/28/07 01:48 AM**	

Compound	Rpt. Limit (ppmv)	Amount (ppmv)	Rpt. Limit (uG/m3)	Amount (uG/m3)
TPH (Gasoline Range)	0.025	Not Detected	100	Not Detected

Container Type: NA - Not Applicable

Surrogates	%Recovery	Method Limits
Fluorobenzene (FID)	87	75-150

AN ENVIRONMENTAL ANALYTICAL LABORATORY

Client Sample ID: LCS

Lab ID#: 0709553BR1-09A

MODIFIED EPA METHOD TO-3 GC/FID

File Name:	**6092827**	**Date of Collection: NA**	
Dil. Factor:	**1.00**	**Date of Analysis: 9/28/07 05:29 PM**	

Compound	**%Recovery**
TPH (Gasoline Range)	94

Container Type: NA - Not Applicable

Surrogates	**%Recovery**	**Method Limits**
Fluorobenzene (FID)	113	75-150

Calscience
Environmental
Laboratories, Inc.

October 04, 2007

Ana Friel
Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Subject: **Calscience Work Order No.: 07-09-1943**
Client Reference: 1784 150th Ave., San Leandro, CA

Dear Client:

Enclosed is an analytical report for the above-referenced project. The samples included in this report were received 9/27/2007 and analyzed in accordance with the attached chain-of-custody.

Unless otherwise noted, all analytical testing was accomplished in accordance with the guidelines established in our Quality Systems Manual, applicable standard operating procedures, and other related documentation. The original report of subcontracted analysis, if any, is provided herein, and follows the standard Calscience data package. The results in this analytical report are limited to the samples tested and any reproduction thereof must be made in its entirety.

If you have any questions regarding this report, please do not hesitate to contact the undersigned.

Sincerely,

Calscience Environmental
Laboratories, Inc.
Danielle Gonsman
Project Manager

Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/27/07
Work Order No: 07-09-1943
Preparation: EPA 3050B / EPA 7471A Total
Method: EPA 6010B / EPA 7471A
Units: mg/kg

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
D-6	**07-09-1943-1**	**09/25/07**	**Solid**	**ICP 5300**	**09/28/07**	**10/01/07**	**070928L07**

Comment(s): -Mercury was analyzed on 9/28/2007 2:37:53 PM with batch 070928L04

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Antimony	ND	0.750	1		Mercury	0.138	0.0835	1	
Arsenic	3.79	0.750	1		Molybdenum	ND	0.250	1	
Barium	65.2	0.500	1		Nickel	74.4	0.250	1	
Beryllium	ND	0.250	1		Selenium	ND	0.750	1	
Cadmium	ND	0.500	1		Silver	ND	0.250	1	
Chromium	84.5	0.250	1		Thallium	ND	0.750	1	
Cobalt	22.4	0.250	1		Vanadium	34.2	0.250	1	
Copper	45.2	0.500	1		Zinc	27.3	1.00	1	
Lead	3.78	0.500	1						

Method Blank	099-04-007-4,982	N/A	Solid	Mercury	09/28/07	09/28/07	070928L04

Parameter	Result	RL	DF	Qual
Mercury	ND	0.0835	1	

Method Blank	097-01-002-9,888	N/A	Solid	ICP 5300	09/28/07	10/01/07	070928L07

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Antimony	ND	0.750	1		Lead	ND	0.500	1	
Arsenic	ND	0.750	1		Molybdenum	ND	0.250	1	
Barium	ND	0.500	1		Nickel	ND	0.250	1	
Beryllium	ND	0.250	1		Selenium	ND	0.750	1	
Cadmium	ND	0.500	1		Silver	ND	0.250	1	
Chromium	ND	0.250	1		Thallium	ND	0.750	1	
Cobalt	ND	0.250	1		Vanadium	ND	0.250	1	
Copper	ND	0.500	1		Zinc	ND	1.00	1	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/27/07
Work Order No: 07-09-1943
Preparation: EPA 3550B
Method: EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
D-6	**07-09-1943-1**	**09/25/07**	**Solid**	**GC 23**	**09/28/07**	**09/29/07**	**070928B06**

Parameter	Result	RL	DF	Qual	Units
TPH as Motor Oil	ND	25	1		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
Decachlorobiphenyl	98	61-145	

Method Blank	**099-12-254-283**	**N/A**	**Solid**	**GC 23**	**09/28/07**	**09/29/07**	**070928B06**

Parameter	Result	RL	DF	Qual	Units
TPH as Motor Oil	ND	25	1		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
Decachlorobiphenyl	105	61-145	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/27/07
Work Order No: 07-09-1943
Preparation: EPA 3550B
Method: EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
D-6	**07-09-1943-1**	**09/25/07**	**Solid**	**GC 23**	**09/28/07**	**09/29/07**	**070928B05**

Comment(s): -The sample chromatographic pattern for TPH does not match the chromatographic pattern of the specified standard. Quantitation of the unknown hydrocarbon(s) in the sample was based upon the specified standard.

Parameter	Result	RL	DF	Qual	Units
TPH as Diesel	42	5.0	1		mg/kg
Surrogates:	REC (%)	Control Limits		Qual	
Decachlorobiphenyl	98	61-145			

Method Blank	**099-12-275-1,023**	**N/A**	**Solid**	**GC 23**	**09/28/07**	**09/29/07**	**070928B05**

Parameter	Result	RL	DF	Qual	Units
TPH as Diesel	ND	5.0	1		mg/kg
Surrogates:	REC (%)	Control Limits		Qual	
Decachlorobiphenyl	105	61-145			

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received:	09/27/07
Work Order No:	07-09-1943
Preparation:	EPA 5030B
Method:	EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
D-6	**07-09-1943-1**	**09/25/07**	**Solid**	**GC 22**	**10/01/07**	**10/01/07**	**070929B02**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	510	62	125		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	87	42-126	

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
Method Blank	**099-12-279-1,151**	**N/A**	**Solid**	**GC 22**	**09/29/07**	**09/29/07**	**070929B02**

Parameter	Result	RL	DF	Qual	Units
TPH as Gasoline	ND	5.0	10		mg/kg

Surrogates:	REC (%)	Control Limits	Qual
1,4-Bromofluorobenzene - FID	76	42-126	

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Analytical Report

Conestoga-Rovers & Associates		Date Received:	09/27/07
19449 Riverside Drive, Suite 230		Work Order No:	07-09-1943
Sonoma, CA 95476-6955		Preparation:	EPA 5030B
		Method:	EPA 8260B
		Units:	mg/kg

Project: 1784 150th Ave., San Leandro, CA

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
D-6	**07-09-1943-1**	**09/25/07**	**Solid**	**GC/MS JJ**	**10/01/07**	**10/01/07**	**071001L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.0050	1		p/m-Xylene	1.1	0.0050	1	
Ethylbenzene	0.22	0.0050	1		o-Xylene	0.55	0.0050	1	
Toluene	0.048	0.0050	1						
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	102	73-139			1,2-Dichloroethane-d4	106	73-145		
Toluene-d8	100	90-108			1,4-Bromofluorobenzene	101	71-113		

Client Sample Number	Lab Sample Number	Date Collected	Matrix	Instrument	Date Prepared	Date Analyzed	QC Batch ID
Method Blank	**099-10-005-14,862**	**N/A**	**Solid**	**GC/MS JJ**	**10/01/07**	**10/01/07**	**071001L01**

Parameter	Result	RL	DF	Qual	Parameter	Result	RL	DF	Qual
Benzene	ND	0.0050	1		p/m-Xylene	ND	0.0050	1	
Ethylbenzene	ND	0.0050	1		o-Xylene	ND	0.0050	1	
Toluene	ND	0.0050	1						
Surrogates:	REC (%)	Control Limits		Qual	Surrogates:	REC (%)	Control Limits		Qual
Dibromofluoromethane	101	73-139			1,2-Dichloroethane-d4	105	73-145		
Toluene-d8	101	90-108			1,4-Bromofluorobenzene	99	71-113		

RL - Reporting Limit , DF - Dilution Factor , Qual - Qualifiers

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/27/07
Work Order No: 07-09-1943
Preparation: EPA 3050B
Method: EPA 6010B

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-09-2045-24	**Solid**	**ICP 5300**	**09/28/07**	**10/01/07**	**070928S07**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Antimony	26	29	50-115	9	0-20	3
Arsenic	127	86	75-125	11	0-20	3
Barium	4X	4X	75-125	4X	0-20	Q
Beryllium	98	95	75-125	3	0-20	
Cadmium	95	93	75-125	2	0-20	
Chromium	105	102	75-125	2	0-20	
Cobalt	99	98	75-125	0	0-20	
Copper	92	85	75-125	2	0-20	
Lead	573	38	75-125	85	0-20	3,4
Molybdenum	82	81	75-125	2	0-20	
Nickel	107	104	75-125	1	0-20	
Selenium	81	77	75-125	4	0-20	
Silver	95	93	75-125	2	0-20	
Thallium	80	79	75-125	1	0-20	
Vanadium	87	75	75-125	4	0-20	
Zinc	4X	4X	75-125	4X	0-20	Q

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/27/07
Work Order No: 07-09-1943
Preparation: EPA 3550B
Method: EPA 8015B (M)

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-09-1944-21	**Solid**	**GC 23**	**09/28/07**	**09/29/07**	**070928S06**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Motor Oil	91	120	64-130	25	0-15	4

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/27/07
Work Order No: 07-09-1943
Preparation: EPA 3550B
Method: EPA 8015B (M)

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-09-1944-21	**Solid**	**GC 23**	**09/28/07**	**09/29/07**	**070928S05**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Diesel	90	93	64-130	3	0-15	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/27/07
Work Order No: 07-09-1943
Preparation: EPA 7471A Total
Method: EPA 7471A

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-09-2045-24	**Solid**	**Mercury**	**09/28/07**	**09/28/07**	**070928S04**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Mercury	98	94	84-138	1	0-7	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - Spike/Spike Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: 09/27/07
Work Order No: 07-09-1943
Preparation: EPA 5030B
Method: EPA 8260B

Project 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	MS/MSD Batch Number
07-09-2157-3	**Solid**	**GC/MS JJ**	**10/01/07**	**10/01/07**	**071001S01**

Parameter	MS %REC	MSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	85	86	79-115	1	0-13	
Carbon Tetrachloride	116	117	55-139	1	0-15	
Chlorobenzene	90	93	79-115	3	0-17	
1,2-Dibromoethane	91	97	70-130	6	0-30	
1,2-Dichlorobenzene	89	91	63-123	2	0-23	
1,1-Dichloroethene	96	97	69-123	1	0-16	
Ethylbenzene	89	90	70-130	1	0-30	
Toluene	89	91	79-115	2	0-15	
Trichloroethene	97	100	66-144	3	0-14	
Vinyl Chloride	84	85	60-126	1	0-14	
Methyl-t-Butyl Ether (MTBE)	101	103	68-128	2	0-14	
Tert-Butyl Alcohol (TBA)	88	91	44-134	3	0-37	
Diisopropyl Ether (DIPE)	98	99	75-123	2	0-12	
Ethyl-t-Butyl Ether (ETBE)	99	103	75-117	4	0-12	
Tert-Amyl-Methyl Ether (TAME)	96	99	79-115	3	0-12	
Ethanol	89	85	42-138	4	0-28	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: N/A
Work Order No: 07-09-1943
Preparation: EPA 3050B
Method: EPA 6010B

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
097-01-002-9,888	**Solid**	**ICP 5300**	**09/28/07**	**10/01/07**	**070928L07**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Antimony	99	100	80-120	1	0-20	
Arsenic	101	102	80-120	1	0-20	
Barium	108	107	80-120	1	0-20	
Beryllium	100	99	80-120	1	0-20	
Cadmium	107	105	80-120	1	0-20	
Chromium	108	106	80-120	1	0-20	
Cobalt	109	107	80-120	1	0-20	
Copper	98	96	80-120	2	0-20	
Lead	106	108	80-120	1	0-20	
Molybdenum	104	106	80-120	1	0-20	
Nickel	112	111	80-120	1	0-20	
Selenium	100	100	80-120	0	0-20	
Silver	102	101	80-120	1	0-20	
Thallium	103	105	80-120	1	0-20	
Vanadium	103	101	80-120	2	0-20	
Zinc	110	108	80-120	2	0-20	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates		Date Received:	N/A
19449 Riverside Drive, Suite 230		Work Order No:	07-09-1943
Sonoma, CA 95476-6955		Preparation:	EPA 3550B
		Method:	EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-254-283	**Solid**	**GC 23**	**09/28/07**	**09/29/07**	**070928B06**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Motor Oil	120	120	75-123	0	0-12	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received:	N/A
Work Order No:	07-09-1943
Preparation:	EPA 3550B
Method:	EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-275-1,023	**Solid**	**GC 23**	**09/28/07**	**09/29/07**	**070928B05**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Diesel	103	111	75-123	7	0-12	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates	Date Received:	N/A
19449 Riverside Drive, Suite 230	Work Order No:	07-09-1943
Sonoma, CA 95476-6955	Preparation:	EPA 5030B
	Method:	EPA 8015B (M)

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-12-279-1,151	**Solid**	**GC 22**	**09/29/07**	**09/29/07**	**070929B02**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
TPH as Gasoline	89	81	70-124	9	0-18	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

ACCREDITED IN ACCORDANCE WITH nelac

Conestoga-Rovers & Associates	Date Received:	N/A
19449 Riverside Drive, Suite 230	Work Order No:	07-09-1943
Sonoma, CA 95476-6955	Preparation:	EPA 7471A Total
	Method:	EPA 7471A

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-04-007-4,982	**Solid**	**Mercury**	**09/28/07**	**09/28/07**	**070928L04**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Mercury	101	101	87-117	0	0-3	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Quality Control - LCS/LCS Duplicate

Conestoga-Rovers & Associates
19449 Riverside Drive, Suite 230
Sonoma, CA 95476-6955

Date Received: N/A
Work Order No: 07-09-1943
Preparation: EPA 5030B
Method: EPA 8260B

Project: 1784 150th Ave., San Leandro, CA

Quality Control Sample ID	Matrix	Instrument	Date Prepared	Date Analyzed	LCS/LCSD Batch Number
099-10-005-14,862	**Solid**	**GC/MS JJ**	**10/01/07**	**10/01/07**	**071001L01**

Parameter	LCS %REC	LCSD %REC	%REC CL	RPD	RPD CL	Qualifiers
Benzene	92	94	84-114	3	0-7	
Carbon Tetrachloride	117	123	66-132	5	0-12	
Chlorobenzene	96	100	87-111	4	0-7	
1,2-Dibromoethane	93	97	80-120	4	0-20	
1,2-Dichlorobenzene	97	98	79-115	1	0-8	
1,1-Dichloroethene	100	105	73-121	5	0-12	
Ethylbenzene	97	100	80-120	3	0-20	
Toluene	95	97	78-114	2	0-7	
Trichloroethene	94	96	84-114	3	0-8	
Vinyl Chloride	84	91	63-129	8	0-15	
Methyl-t-Butyl Ether (MTBE)	97	102	77-125	5	0-11	
Tert-Butyl Alcohol (TBA)	81	88	47-137	8	0-27	
Diisopropyl Ether (DIPE)	99	100	76-130	1	0-8	
Ethyl-t-Butyl Ether (ETBE)	100	102	76-124	3	0-12	
Tert-Amyl-Methyl Ether (TAME)	94	94	82-118	1	0-11	
Ethanol	86	93	59-131	7	0-21	

RPD - Relative Percent Difference , CL - Control Limit

Calscience Environmental Laboratories, Inc.

Glossary of Terms and Qualifiers

Work Order Number: 07-09-1943

Qualifier	Definition
*	See applicable analysis comment.
1	Surrogate compound recovery was out of control due to a required sample dilution, therefore, the sample data was reported without further clarification.
2	Surrogate compound recovery was out of control due to matrix interference. The associated method blank surrogate spike compound was in control and, therefore, the sample data was reported without further clarification.
3	Recovery of the Matrix Spike (MS) or Matrix Spike Duplicate (MSD) compound was out of control due to matrix interference. The associated LCS and/or LCSD was in control and, therefore, the sample data was reported without further clarification.
4	The MS/MSD RPD was out of control due to matrix interference. The LCS/LCSD RPD was in control and, therefore, the sample data was reported without further clarification.
5	The PDS/PDSD associated with this batch of samples was out of control due to a matrix interference effect. The associated batch LCS/LCSD was in control and, hence, the associated sample data was reported with no further corrective action required.
A	Result is the average of all dilutions, as defined by the method.
B	Analyte was present in the associated method blank.
C	Analyte presence was not confirmed on primary column.
E	Concentration exceeds the calibration range.
H	Sample received and/or analyzed past the recommended holding time.
J	Analyte was detected at a concentration below the reporting limit and above the laboratory method detection limit. Reported value is estimated.
N	Nontarget Analyte.
ND	Parameter not detected at the indicated reporting limit.
Q	Spike recovery and RPD control limits do not apply resulting from the parameter concentration in the sample exceeding the spike concentration by a factor of four or greater.
U	Undetected at the laboratory method detection limit.
X	% Recovery and/or RPD out-of-range.
Z	Analyte presence was not confirmed by second column or GC/MS analysis.

SHELL Chain Of Custody Record

LAB:
- ☐ TA - Irvine, California
- ☐ TA - Morgan Hill, California
- ☐ TA - Sacramento, California
- ☐ TA - Nashville, Tennessee
- ☑ Calscience
- ☐ Other_____

NAME OF PERSON TO BILL: Denis Brown

- ☑ ENVIRONMENTAL SERVICES
- ☐ NETWORK DEV / FE
- ☐ BILL CONSULTANT
- ☐ COMPLIANCE
- ☐ RMT/CRMT

☐ CHECK BOX TO VERIFY IF NO INCIDENT # APPLIES

INCIDENT # (ES ONLY): 9 8 9 9 6 0 6 8

PO #:

SAP or CRMT #:

DATE: 9/25/07

PAGE: 1 of 1

SAMPLING COMPANY	LOG CODE	SITE ADDRESS: Street and City	State	GLOBAL ID NO.
Conestoga-Rovers & Associates (CRA)	CETS	1784 150th Ave, San Leandro, CA		T0600101230

ADDRESS	EDF DELIVERABLE TO (Name, Company, Office Location)	PHONE NO.	E-MAIL	CONSULTANT PROJECT NO.
19449 Riverside Drive, Suite 230, Sonoma, CA 95476	Felicia Ballard, CRA, Sonoma	707-935-4850	sonomaedf@craworld.com	240612-010

PROJECT CONTACT (Hardcopy or PDF Report to)	TELEPHONE	FAX	E-MAIL
Ana Friel	707-268-3812	707-268-8180	afriel@craworld.com

SAMPLER NAME(S) (Print): Lauren Goldfinch

LAB USE ONLY: 07-09-1943

TAT (STD IS 10 BUSINESS DAYS / RUSH IS CALENDAR DAYS): ☐ STD ☑ 5 DAY ☐ 3 DAY ☐ 2 DAY ☐ 24 HOURS ☐ RESULTS NEEDED ON WEEKEND

☐ LA - RWQCB REPORT FORMAT ☐ UST AGENCY: _____

SPECIAL INSTRUCTIONS OR NOTES:
- ☐ EDD NOT NEEDED
- ☑ SHELL CONTRACT RATE APPLIES
- ☐ STATE REIMB RATE APPLIES
- ☑ RECEIPT VERIFICATION REQUESTED

cc: Phil Sellers psellers@craworld.com

REQUESTED ANALYSIS

LAB USE ONLY	Field Sample Identification	SAMPLING DATE	SAMPLING TIME	MATRIX	NO. OF CONT.	TPHmo (8015M)	TPH - Extractable (8015M)	TPH - Purgeable (8260B)	BTEX (8260B)	5 Oxygenates (8260B) (MTBE, TBA, DIPE, TAME, ETBE)	MTBE (8260B)	TBA (8260B)	DIPE (8260B)	TAME (8260B)	ETBE (8260B)	1,2 DCA (8260B)	EDB (8260B)	Ethanol (8260B)	Methanol (8015M)	VOCs by 8260B	Semi-Volatiles by 8270C	Lead ☑ Total ☐ STLC ☐ TCLP	LUFT5 ☐ Total ☐ STLC ☐ TCLP	CAM17 ☑ Total ☐ STLC ☐ TCLP		TEMPERATURE ON RECEIPT C°
1	D-6	9/25/07	13:15	SO	1	X	X	X	X															X		

FIELD NOTES:
Container/Preservative or PID Readings or Laboratory Notes

Relinquished by: (Signature)	Received by: (Signature)	Date	Time
[signature]	secure location	9/25/07	14:30
[signature]	CEL	9-26-07	1325
[signature] to GSO	COR	09-27-07	0945

Rev. 05-May-06

05/02/06 Revision

Calscience Environmental Laboratories, Inc.

WORK ORDER #: 07 - 09 - 1943

Cooler 1 of 1

SAMPLE RECEIPT FORM

CLIENT: CRA DATE: 09/27/07

TEMPERATURE – SAMPLES RECEIVED BY:

CALSCIENCE COURIER:

_____ Chilled, cooler with temperature blank provided.
_____ Chilled, cooler without temperature blank.
_____ Chilled and placed in cooler with wet ice.
_____ Ambient and placed in cooler with wet ice.
_____ Ambient temperature.
_____ °C Temperature blank.

LABORATORY (Other than Calscience Courier):

3.1 °C Temperature blank.
_____ °C IR thermometer.
_____ Ambient temperature.

Initial: NC

CUSTODY SEAL INTACT:

Sample(s): _____ Cooler: _____ No (Not Intact) : _____ Not Present: ✓

Initial: NC

SAMPLE CONDITION:

	Yes	No	N/A
Chain-Of-Custody document(s) received with samples	✓		
Sampler's name indicated on COC	✓		
Sample container label(s) consistent with custody papers	✓		
Sample container(s) intact and good condition	✓		
Correct containers and volume for analyses requested	✓		
Proper preservation noted on sample label(s)			✓
VOA vial(s) free of headspace.			✓
Tedlar bag(s) free of condensation			✓

Initial: NC

COMMENTS:

Attachment F

Disposal Documentation

CERTIFICATE OF DISPOSAL

November 07,2007

SHELL OIL PRODUCTS
1748 150TH ST.
SAN LEANDRO, CA

This is to certify that waste as defined on Uniform Hazardous Waste Manifest number **002918019JJK/00291801** was received by U.S. Ecology, Inc., on **10/18/2007** .The waste(s) were subsequently treated, if required by 40 CFR Part 268 and U.S. Ecology's permits and disposed of by **10/18/2007** in accordance with permits and laws regulating this facility.

Reference Number: 07101708256-002918019JJK-1-1

Material: 3 55 GALLON DRUM (BATCH WASTE)

Process: Neutralization

Facility: U.S. ECOLOGY NEVADA, INC.
HWY 95 11 MILES S. OF BEATTY
BEATTY, NV 89003
EPA ID: NVT330010000

Waste Type: RCRA HAZARDOUS WASTE

Customer: AMERICAN INTEGRATED SERVICES, INC.

Printed Name: MARK JOHN

Signature: _____

Title: ENV MANAGER

Please print or type. (Form designed for use on elite (12-pitch) typewriter.)

Form Approved. OMB No. 2050-0039

UNIFORM HAZARDOUS WASTE MANIFEST

1. Generator ID Number: CAR000130526
2. Page 1 of
3. Emergency Response Phone: 866-423-6060
4. Manifest Tracking Number: 002918019 JJK

GENERATOR

5. Generator's Name and Mailing Address
Shell Oil Products US
12700 Northborough Drive
Houston, TX 77067
Generator's Phone: 281-974-2239

Generator's Site Address (if different than mailing address)
1784 150th
San Leandro, CA 94578 USA

6. Transporter 1 Company Name: American Integrated Services, Inc
U.S. EPA ID Number: CAR000148338

7. Transporter 2 Company Name: Pacific Trans Env Svcs
U.S. EPA ID Number: CAD981412356

8. Designated Facility Name and Site Address
US Ecology
Highway 95, 11 Miles South of Beatty
Beatty, NV 89003
Facility's Phone: 800-239-3943
U.S. EPA ID Number: NVT330010000

9a. HM	9b. U.S. DOT Description (including Proper Shipping Name, Hazard Class, ID Number, and Packing Group (if any))	10. Containers No.	10. Containers Type	11. Total Quantity	12. Unit Wt./Vol.	13. Waste Codes		
	1. RQ, Wastes Corrosive Liquid, Basic, Inorganic, N.O.S., 8, UN3266 PG III (Contains Portland Cement)(D002)	3	DM	165	G	122	D002	
	2.							
	3.							
	4.							

RECEIVED
NOV 27 2007

14. Special Handling Instructions and Additional Information
Wear appropriate PPE while handling. Weights or volumes are approximate.
Job#27001-168 RPR#63742 SAP#136019 Incident#98996068 Profile# 070137710-99

15. **GENERATOR'S/OFFEROR'S CERTIFICATION:** I hereby declare that the contents of this consignment are fully and accurately described above by the proper shipping name, and are classified, packaged, marked and labeled/placarded, and are in all respects in proper condition for transport according to applicable international and national governmental regulations. If export shipment and I am the Primary Exporter, I certify that the contents of this consignment conform to the terms of the attached EPA Acknowledgment of Consent.
I certify that the waste minimization statement identified in 40 CFR 262.27(a) (if I am a large quantity generator) or (b) (if I am a small quantity generator) is true.

Generator's/Offeror's Printed/Typed Name: AS on behalf of SOPUS - J Sherman
Signature:
Month: 10 Day: 9 Year: 07

INT'L

16. International Shipments ☐ Import to U.S. ☐ Export from U.S. Port of entry/exit:
Transporter signature (for exports only): Date leaving U.S.:

TRANSPORTER

17. Transporter Acknowledgment of Receipt of Materials

Transporter 1 Printed/Typed Name: Ben Burgos
Signature:
Month: 10 Day: 9 Year: 07

Transporter 2 Printed/Typed Name: Marcelo Fim Grey
Signature:
Month: 10 Day: 12 Year: 07

DESIGNATED FACILITY

18. Discrepancy

18a. Discrepancy Indication Space ☐ Quantity ☐ Type ☐ Residue ☐ Partial Rejection ☐ Full Rejection
Manifest Reference Number:

18b. Alternate Facility (or Generator)
U.S. EPA ID Number
Facility's Phone:

18c. Signature of Alternate Facility (or Generator)
Month: Day: Year:

19. Hazardous Waste Report Management Method Codes (i.e., codes for hazardous waste treatment, disposal, and recycling systems)

1.	2.	3.	4.
H132			

20. Designated Facility Owner or Operator: Certification of receipt of hazardous materials covered by the manifest except as noted in Item 18a

Printed/Typed Name: Lamar Wash
Signature:
Month: 10 Day: 16 Year: 07

EPA Form 8700-22 (Rev. 3-05) Previous editions are obsolete.

DESIGNATED FACILITY TO GENERATOR