ALAMEDA COUNTY
**HEALTH CARE SERVICES**
AGENCY
ALEX BRISCOE, Director

ENVIRONMENTAL HEALTH SERVICES
ENVIRONMENTAL PROTECTION
1131 Harbor Bay Parkway, Suite 250
Alameda, CA 94502-6577
(510) 567-6700
FAX (510) 337-9335

December 12, 2011

Denis Brown
Shell Oil Products US
20945 S. Wilmington Ave.
Carson, CA 90810-1039

Allan A. and Beverly M. Sebanc Trs
2805 Ralston Avenue
Hillsborough, CA 94010-6547

C&H Development Company
Address Unknown

Kenneth McCloskey, Trustee
2805 Ralston Avenue
Hillsborough, CA 94010-6547

Subject: Case Closure for Fuel Leak Case No. RO0002971 and GeoTracker Global ID T0619714590, Shell, 2301-2307 Lincoln Avenue, Alameda, CA 94502

Dear Responsible Parties:

This letter transmits the enclosed underground storage tank (UST) case closure letter in accordance with Chapter 6.75 (Article 4, Section 25299.37[h]). The State Water Resources Control Board adopted this letter on February 20, 1997. As of March 1, 1997, the Alameda County Environmental Health (ACEH) is required to use this case closure letter for all UST leak sites. We are also transmitting to you the enclosed case closure summary. These documents confirm the completion of the investigation and cleanup of the reported release at the subject site. The subject fuel leak case is closed. This case closure letter and the case closure summary can also be viewed on the State Water Resources Control Board's Geotracker website (http://geotracker.swrcb.ca.gov) and the Alameda County Environmental Health website (http://www.acgov.org/aceh/index.htm).

SITE INVESTIGATION AND CLEANUP SUMMARY

Please be advised that the following conditions exist at the site:

- Total Petroleum Hydrocarbons as gasoline remain in soil at concentrations up to 166 ppm.
- Total Petroleum Hydrocarbons as gasoline remain in groundwater at concentrations up to 13,000 ppb.
- As described in section IV of the attached Case Closure Summary, the case was closed with Site Management Requirements that limit future land use to the current commercial land use only.

If you have any questions, please call Jerry Wickham at (510) 567-6791. Thank you.

Sincerely,

Donna L. Drogos, P.E.
Division Chief

Enclosures:
1. Remedial Action Completion Certification
2. Case Closure Summary

cc:

Leroy Griffin (w/enc)
Oakland Fire Department
250 Frank H. Ogawa Plaza, Ste. 3341
Oakland, CA 94612-2032
*(Sent via E-mail to: lgriffin@oaklandnet.com)*

Peter Schaefer (w/enc)
Conestoga-Rovers & Associates
5900 Hollis Street, Suite A
Emeryville, CA 94608
*(Sent via E-mail to: pschaefer@craworld.com)*

Closure Unit
State Water Resources Control Board
UST Cleanup Fund
P.O. Box 944212
Sacramento, CA 94244-2120
*(uploaded to GeoTracker)*

Jake Torrens (w/enc)
AMEC Geomatrix
2101 Webster Street, 12th Floor
Oakland, CA 94612
*(Sent via E-mail to: mail to: jake.torrens@amec.com)*

Donna Drogos, ACEH *(Sent via E-mail to: donna.drogos@acgov.org)*
Jerry Wickham, ACEH *(Sent via E-mail to: jerry.wickham@acgov.org)*

GeoTracker (w/enc)
eFile (w/orig enc)

ALAMEDA COUNTY
**HEALTH CARE SERVICES**
AGENCY
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ENVIRONMENTAL HEALTH SERVICES
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1131 Harbor Bay Parkway, Suite 250
Alameda, CA 94502-6577
(510) 567-6700
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**REMEDIAL ACTION COMPLETION CERTIFICATION**

December 12, 2011

Denis Brown
Shell Oil Products US
20945 S. Wilmington Ave.
Carson, CA 90810-1039

Allan A. and Beverly M. Sebanc Trs
2805 Ralston Avenue
Hillsborough, CA 94010-6547

C&H Development Company
Address Unknown

Kenneth McCloskey, Trustee
2805 Ralston Avenue
Hillsborough, CA 94010-6547

Subject: Case Closure for Fuel Leak Case No. RO0002971 and GeoTracker Global ID T0619714590, Shell, 2301-2307 Lincoln Avenue, Alameda, CA 94502

Dear Responsible Parties:

This letter confirms the completion of a site investigation and remedial action for the underground storage tanks formerly located at the above-described location. Thank you for your cooperation throughout this investigation. Your willingness and promptness in responding to our inquiries concerning the former underground storage tank(s) are greatly appreciated.

Based on information in the above-referenced file and with the provision that the information provided to this agency was accurate and representative of site conditions, this agency finds that the site investigation and corrective action carried out at your underground storage tank(s) site is in compliance with the requirements of subdivisions (a) and (b) of Section 25296.10 of the Health and Safety Code and with corrective action regulations adopted pursuant to Section 25299.3 of the Health and Safety Code and that no further action related to the petroleum release(s) at the site is required.

This notice is issued pursuant to subdivision (h) of Section 25296.10 of the Health and Safety Code. Please contact our office if you have any questions regarding this matter.

Sincerely,

Arju Levi
Director
Alameda County Environmental Health

**CASE CLOSURE SUMMARY**
**LEAKING UNDERGROUND FUEL STORAGE TANK - LOCAL OVERSIGHT PROGRAM**

## I. AGENCY INFORMATION

Date: June 28, 2011

| | |
|---|---|
| Agency Name: Alameda County Environmental Health | Address: 1131 Harbor Bay Parkway |
| City/State/Zip: Alameda, CA 94502-6577 | Phone: (510) 567-6791 |
| Responsible Staff Person: Jerry Wickham | Title: Senior Hazardous Materials Specialist |

## II. CASE INFORMATION

| | | |
|---|---|---|
| Site Facility Name: Shell | | |
| Site Facility Address: 2301-2307 Lincoln Avenue, Alameda, California 94501 | | |
| RB Case No.: --- | StID No.: --- | LOP Case No.: RO0002971 |
| URF Filing Dates: --- | GeoTracker ID: T0619714590 | APN: 71-201-12-1 |

| Responsible Parties | Addresses | Phone Numbers |
|---|---|---|
| Denis Brown<br>Shell Oil Products US | 20945 S. Wilmington Avenue, Carson, CA 90810 | (707) 865-0251 |
| C&H Development Company | 3744 Mt. Diablo Blvd., Lafayette, CA 94549-3694 | No phone number |
| Allan A. and Beverly M. Sebanc Trs | 2805 Ralston Avenue, Hillsborough, CA 94010-6547 | (650) 342-7807 |

| Tank I.D. No | Size in Gallons | Contents | Closed In Place/Removed? | Date |
|---|---|---|---|---|
| 1 | 8,000 | Gasoline | Removed | 6/1982 |
| 2 through 4 | 5,000 | Gasoline | Removed | 6/1982 |
| 5 | 560 | Gasoline | Removed | 6/1982 |
| 6 and 7 | 250 | Gasoline | Removed | 6/1982 |
| Dispensers and Piping | | | Removed | 6/1982 |

## III. RELEASE AND SITE CHARACTERIZATION INFORMATION

| | |
|---|---|
| Cause and Type of Release: Unknown. No reports are available to document the removal of the UST systems in 1982. | |
| Site characterization complete? Yes | Date Approved By Oversight Agency: —— |

| | | |
|---|---|---|
| Monitoring wells installed? Yes | Number: 9 | Proper screened interval? Yes |
| Highest GW Depth Below Ground Surface: 6.06 | Lowest Depth: 10.0 | Flow Direction: South to southwest |
| Most Sensitive Current Use: Potential drinking water source. | | |

Summary of Production Wells in Vicinity: The following production wells are in the vicinity of the site:

- The nearest water supply well is a 206-foot deep agricultural/irrigation well located approximately 500 feet northwest of the site. Based on the distance from the site, crossgradient location, and limited extent of the dissolved phase plume, the agricultural/irrigation well is not expected to be a receptor for the site.
- A 325-feet deep domestic water supply well is located approximately 1,050 feet south southwest of the site. Based on the distance from the site and limited extent of the dissolved phase plume, the domestic water supply well is not expected to be a receptor for the site.
- A shallow irrigation well is located approximately 1,300 feet northwest of the site. Based on the distance from the site, crossgradient location, and limited extent of the dissolved phase plume, the shallow irrigation well is not expected to be a receptor for the site.
- Two industrial wells are located approximately 1,400 feet northeast of the site. Based on the distance from the site, crossgradient location, and limited extent of the dissolved phase plume, the industrial water supply wells are not expected to be receptors for the site.
- A shallow irrigation well is located approximately 1,450 feet east northeast of the site. Based on the distance from the site, crossgradient location, and limited extent of the dissolved phase plume, the shallow irrigation well is not expected to be a receptor for the site.
- No other water supply wells are located within 1,500 feet of the site.

| | |
|---|---|
| Are drinking water wells affected? No | Aquifer Name: East Bay Plain |
| Is surface water affected? No | Nearest SW Name: The Alameda Tidal Canal is approximately 2,000 feet northeast of the site. |
| Off-Site Beneficial Use Impacts (Addresses/Locations): None | |
| Reports on file? Yes | Where are reports filed? Alameda County Environmental Health |

TREATMENT AND DISPOSAL OF AFFECTED MATERIAL

| Material | Amount (Include Units) | Action (Treatment or Disposal w/Destination) | Date |
|---|---|---|---|
| Tank | One 8,000-gallon UST | Not reported | 6/1982 |
| Tank | Three 5,000-gallon USTs | Not reported | 6/1982 |
| Tank | One 560-gallon UST | Not reported | 6/1982 |
| Tank | Two 250-gallon USTs | Not reported | 6/1982 |
| Piping | Not Reported | Not Reported | 6/1982 |
| Free Product | ---- | --- | --- |
| Soil | 56 tons | The soil was transported to Keller Canyon Landfill in Pittsburg, CA for disposal. | April 12 and 14, 2011 |
| Groundwater | ---- | --- | --- |

MAXIMUM DOCUMENTED CONTAMINANT CONCENTRATIONS BEFORE AND AFTER CLEANUP
(Please see Attachments 2 – 4 for additional information on contaminant locations and concentrations)

| Contaminant | Soil (ppm) | | Groundwater (ppb) | |
|---|---|---|---|---|
| | Before | After | Before | After |
| TPH (Gas) | 7,900 | 166 | 13,000 | 13,000 |
| TPH (Diesel) | 54 | 54 | 1,700 | 1,700 |
| TPH (Motor Oil) | 450 | 450 | <250 | <250 |
| Benzene | 0.99 | 0.99 | 980(1) | 200(1) |
| Toluene | <0.27 | <0.27 | 19 | 19 |
| Ethylbenzene | 120 | 120 | 490 (1) | 200 (1) |
| Xylenes | 150 | 150 | 130 | 130 |
| Heavy Metals (Cd, Cr, Pb, Ni, Zn) | 150 (2) | 150 (2) | Not analyzed | Not analyzed |
| MTBE (EPA 8020/EPA 8260) | <0.5 (3) | <0.5 (3) | <5.0 (4) | <5.0 (4) |
| Other (8240/8270) | Not analyzed | Not analyzed | Not analyzed | Not analyzed |

(1) The maximum concentration before cleanup is from a grab groundwater sample collected from boring EB-1 on 08/16/2007; the maximum concentration after cleanup is from a groundwater sample collected from well MW-4 during the most recent complete groundwater monitoring event on 05/05/2010.
(2) Lead = 150 ppm; no metals analyzed other than lead.
(3) MTBE <0.5; TBA, DIPE, ETBE, TAME, EDB, and EDC not detected at various reporting limits.
(4) MTBE <5.0; TBA, DIPE, ETBE, TAME, EDB, and EDC not detected at various reporting limits.

Site History and Description of Corrective Actions:

The site is currently a retail center located at the corner of Lincoln Avenue and Oak Street in Alameda, California. Surrounding land use is mixed commercial and residential. The site reportedly operated as a gasoline service station from 1926 until 1982. Underground storage tanks were installed at the site in 1958 with additional USTs installed in 1970. USTs were installed in two separate areas referred to as the western and eastern tank areas. Sometime between 1950 and 1965, the original service station in the southwestern corner of the site was demolished and a second service station that covered the entire site was constructed. In 1982, the USTs and service station were removed and the site was redeveloped into the current retail center.

A Phase II Environmental Site Assessment was performed by Basics Environmental in 1999. Six soil borings (SB-1 through SB-6) were advanced in the western portion of the site. One soil sample was collected from each soil boring and grab groundwater samples were collected from five of the six borings. Total petroleum hydrocarbons as gasoline (TPHg) were detected in soil and groundwater at concentrations up to 40 ppm and 4,500 ppb, respectively.

In August 2000, Toxichem Management Systems, Inc. conducted a site assessment that included a review of the previous site investigation data, aerial photos, Sanborn maps, and agency files.

In February 2007, Geomatrix installed three groundwater monitoring wells (MW-1 through MW-3) in the western UST area and advanced 11 soil borings (EB-1 through EB-6 and EB-8 through EB-11) in the eastern UST and dispenser area. Soil samples contained up to 1,600 ppm of TPHg and 0.99 ppm of benzene. Grab groundwater samples collected from the wells and exploratory borings contained up to 7,000 ppb of TPHg and 980 ppb of benzene.

In February 2009, Conestoga-Rovers & Associates installed five monitoring wells (MW-4 through MW-8), installed five soil vapor probes (SVP-1 through SVP-5), and advanced three soil borings (B-5, B-7, and B-8). TPHg was detected in soil at concentrations up to 7,900 ppm. Benzene, toluene, and MTBE were not detected at concentrations exceeding reporting limits in soil. TPHg and benzene were detected in grab groundwater samples from the soil borings at concentrations up to 470 ppb and 2 ppb, respectively. Soil vapor from probe SVP-5 contained TPHg at a concentration of 11,000,000 micrograms per cubic meter (µg/m3) and benzene at a concentration of 12,000 µg/m3.

In March 2010, CRA installed one groundwater monitoring well (MW-9), installed four soil vapor probes (SVP-5A and SVP-6 through SVP-8), and reinstalled one soil vapor probe (SVP-4). No TPHg or BTEX were detected at concentrations exceeding reporting limits in soil samples collected from the MW-9 soil boring.

Six soil vapor probes were sampled in June and July 2010. TPHg and ethylbenzene were detected in soil vapor collected from 5 feet bgs from probe SVP-5 at concentrations of 8,400,000 and 14,000 µg/m3, respectively. The concentrations of TPHg, BTEX, and MTBE were less than reporting limits in the remaining soil vapor samples.

In July 2010, one off-site boring (B-6) was advanced at a former 76 station located immediately west of the site. No TPHg, TPHd, TPHmo, BTEX, or fuel oxygenates were detected in soil samples from boring B-6. TPHg, BTEX, and fuel oxygenates were not detected at concentrations exceeding reporting limits in the grab groundwater sample collected from off-site boring B-6. TPHd was detected in the grab groundwater sample at a concentration of 56 ppb.

Groundwater monitoring wells MW-1 through MW-3 were initially sampled in August 2007. Quarterly groundwater monitoring was conducted at the site from March 2009 up to September 2010. Groundwater monitoring was suspended following the September 2010 sampling event.

In March 2011, soil vapor probe SVP-9 was installed in the eastern tank area. A soil vapor sample collected from 4.5 feet bgs in SVP-9 contained 18,000 µg/m3 of TPHg and 52 µg/m3 of benzene. A soil vapor sample collected from 2.0 feet bgs in SVP-9 did not contain TPHg or BTEX at concentrations exceeding reporting limits.

Two excavations were advanced at the site between April 11 and April 19, 2011. One excavation was advanced in the eastern tank area surrounding soil vapor probe SVP-5 to remove residual petroleum hydrocarbons. A second excavation was advanced in the area of the former dispensers to remove soil with residual lead. The petroleum excavation extended to a depth of approximately 13.5 feet bgs. Confirmation soil samples from the petroleum excavation contained up to 166 ppm of TPHg, 0.05 ppm of benzene, and 2.24 ppm of ethylbenzene. Toluene, xylenes, and MTBE were not detected in the confirmation soil samples. Confirmation soil samples from the lead excavation contained soil at concentrations of 15 to 150 ppm. Approximately 56 tons of soil was excavated and disposed off-site at the Keller Canyon Landfill in Pittsburg, California.

## IV. CLOSURE

| | | |
|---|---|---|
| Does completed corrective action protect existing beneficial uses per the Regional Board Basin Plan? Yes | | |
| Does completed corrective action protect potential beneficial uses per the Regional Board Basin Plan? Yes | | |
| Does corrective action protect public health for current land use? Alameda County Environmental Health staff does not make specific determinations concerning public health risk. However, based upon the information available in our files to date, it does not appear that the release would present a risk to human health based upon current land use and conditions. | | |
| Site Management Requirements:<br><br>Case closure for this fuel leak site is granted for the current commercial land use only. If a change in land use to any residential or other conservative land use scenario occurs at this site, Alameda County Environmental Health (ACEH) must be notified as required by Government Code Section 65850.2.2. ACEH will re-evaluate the case upon receipt of approved development/construction plans.<br><br>Excavation or construction activities in areas of residual contamination require planning and implementation of appropriate health and safety procedures by the responsible party prior to and during excavation and construction activities. | | |
| Should corrective action be reviewed if land use changes? Yes | | |
| Was a deed restriction or deed notification filed? No | | Date Recorded: --- |
| Monitoring Wells Decommissioned: No | Number Decommissioned: 0 | Number Retained: 9 |
| List Enforcement Actions Taken: None | | |
| List Enforcement Actions Rescinded: --- | | |

## V. ADDITIONAL COMMENTS, DATA, ETC.

Considerations and/or Variances:

A former oil sump associated with the former service station was not investigated as part of this fuel leak case. The former oil sump was located beneath the current retail center building.

Conclusion:

Alameda County Environmental Health (ACEH) staff believe that the levels of residual contamination do not pose a significant threat to water resources, public health and safety, and the environment under the current commercial land use based upon the information available in our files to date. No further investigation or cleanup is necessary unless a change in land use to any residential or other conservative land use scenario occurs at the site. ACEH staff recommend case closure for this site.

## VI. LOCAL AGENCY REPRESENTATIVE DATA

| | |
|---|---|
| Prepared by: Jerry Wickham | Title: Senior Hazardous Materials Specialist |
| Signature: Jerry Wickham | Date: 10/26/11 |
| Approved by: Donna L. Drogos, P.E. | Title: Division Chief |
| Signature: Donna L. Drogos | Date: 10/26/11 |

This closure approval is based upon the available information and with the provision that the information provided to this agency was accurate and representative of site conditions.

## VII. REGIONAL BOARD NOTIFICATION

| | |
|---|---|
| Regional Board Staff Name: Cherie McCaulou | Title: Engineering Geologist |
| Notification Date: 10/26/11 | |

## VIII. MONITORING WELL DECOMMISSIONING

| | | |
|---|---|---|
| Date Requested by ACEH: 10/27/11 | Date of Well Decommissioning Report: 12/5/11 | |
| All Monitoring Wells Decommissioned: Yes | Number Decommissioned: 12 | Number Retained: 0 |
| Reason Wells Retained: --- | | |
| Additional requirements for submittal of groundwater data from retained wells: --- | | |
| ACEH Concurrence - Signature: Jerry Wickham | | Date: 12/8/11 |

Attachments:
1. Vicinity Map and Aerial Photo (2 pp)
2. Site Plans (2 pp)
3. Groundwater Contour Map and Chemical Concentration Maps (7 pp)
4. Soil and Soil Vapor Analytical Data (7 pp)
5. Groundwater Analytical Data (6 pp)
6. Boring Logs (47 pp)

This document and the related CASE CLOSURE LETTER & REMEDIAL ACTION COMPLETION CERTIFICATE shall be retained by the lead agency as part of the official site file.

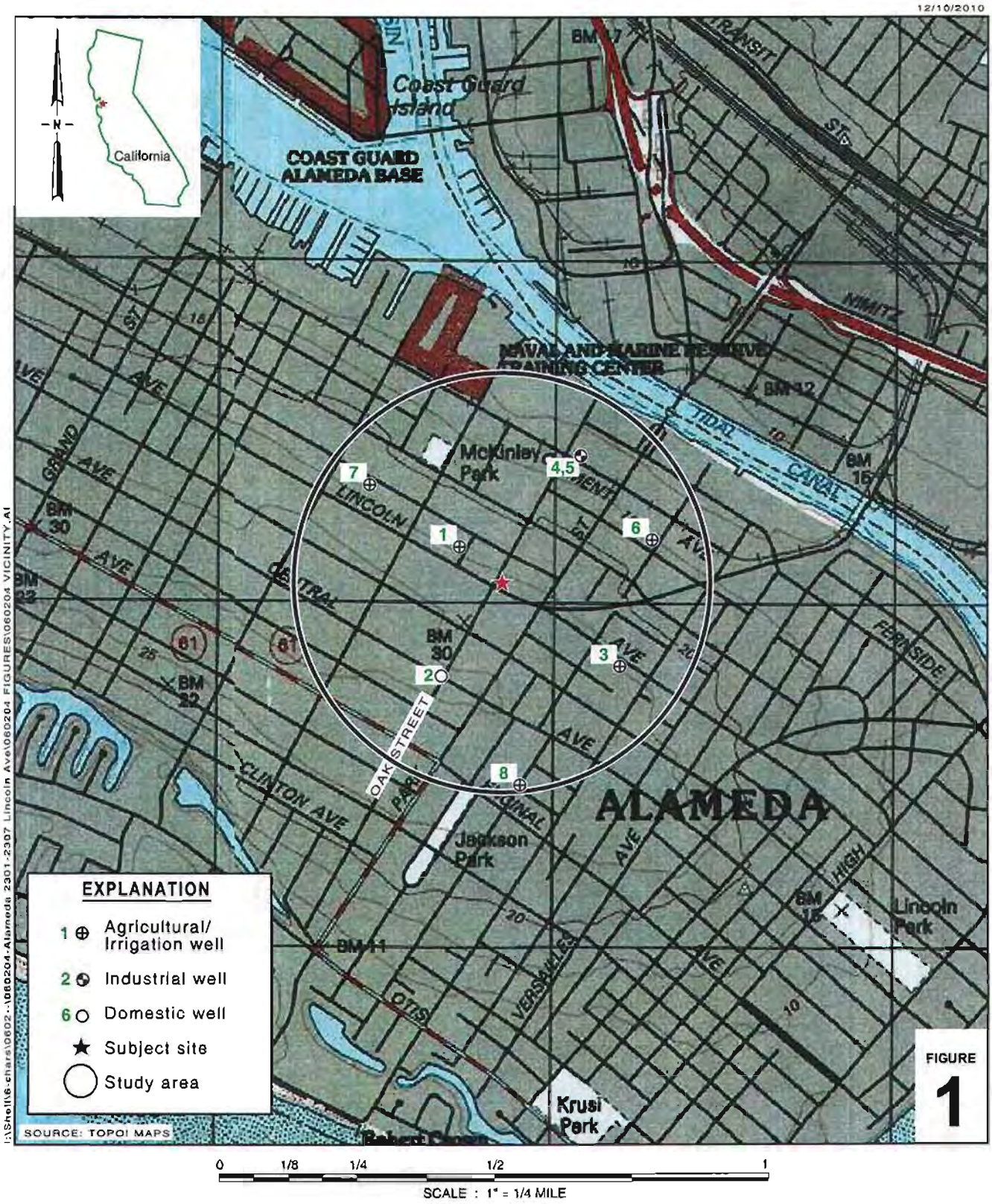
## Wickham, Jerry, Env. Health

**From:** Wickham, Jerry, Env. Health
**Sent:** Wednesday, October 26, 2011 3:18 PM
**To:** Cherie MCcaulou
**Subject:** Pending closure for 2301-2307 Lincoln, Alameda
**Attachments:** RO2971 closure summary.pdf

Hi Cherie,

This email provides notification of pending closure for ACEH case RO2971, 2301-2307 Lincoln Avenue, Alameda.

Jerry Wickham
Alameda County Environmental Health
1131 Harbor Bay Parkway
Alameda, CA 94502-6577
phone: 510-567-6791
jerry.wickham@acgov.org



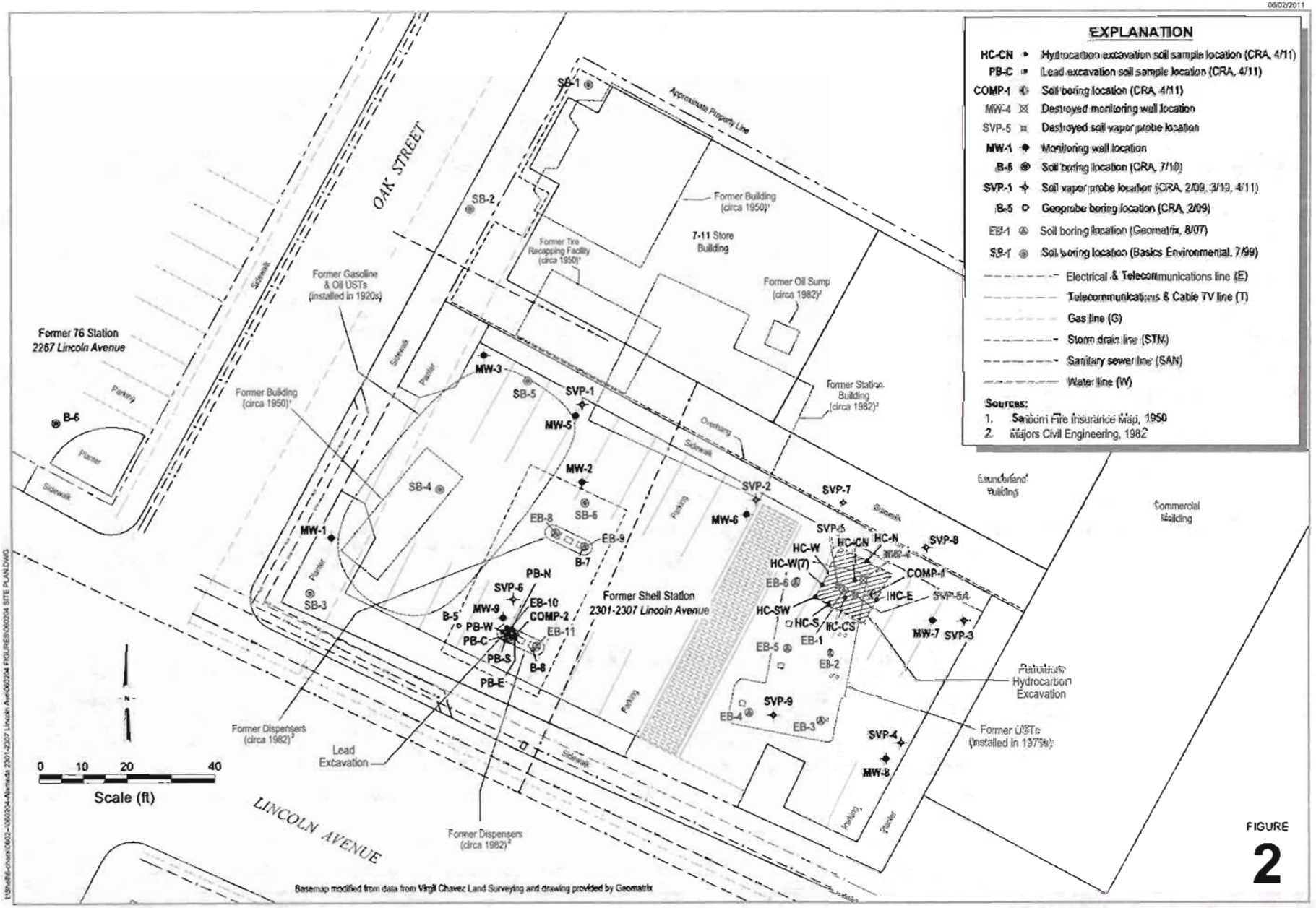

**Former Shell Service Station**
2301-2307 Lincoln Avenue
Alameda, California

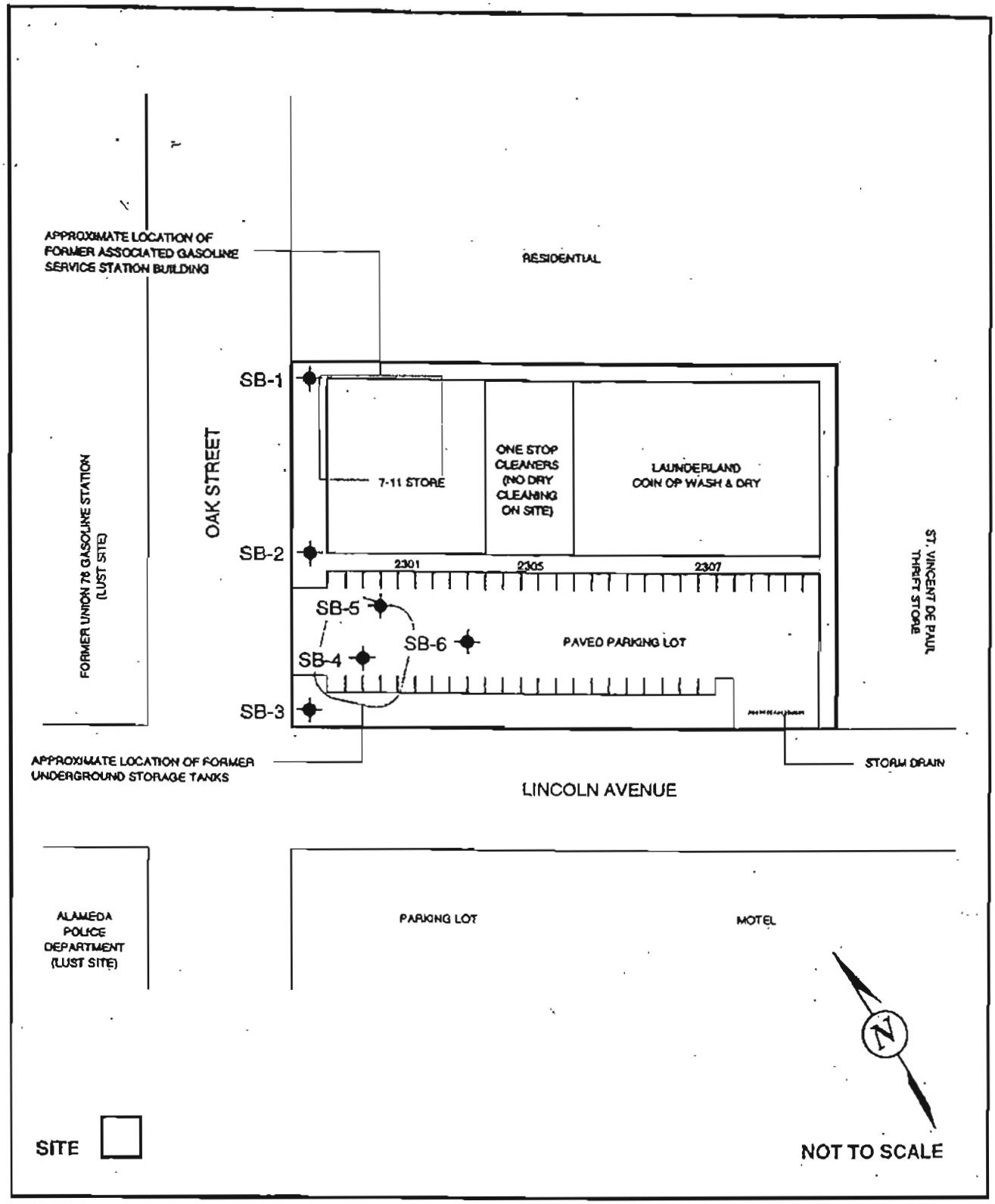
CONESTOGA-ROVERS & ASSOCIATES

**Vicinity Map**

ATTACHMENT 1


2301 Lincoln Ave, Alameda, CA 94501
©2011 Google
©2010 Google
Imagery Date: 10/1/2009
Eye alt 605 ft


06/02/2011
EXPLANATION
HC-CN Hydrocarbon excavation soil sample location (CRA, 4/11)
PB-C Lead excavation soil sample location (CRA, 4/11)
COMP-1 Soil boring location (CRA, 4/11)
MW-4 Destroyed monitoring well location
SVP-5 Destroyed soil vapor probe location
MW-1 Monitoring well location
B-6 Soil boring location (CRA, 7/10)
SVP-1 Soil vapor probe location (CRA, 2/09, 3/10, 4/11)
B-5 Geoprobe boring location (CRA, 2/09)
EB-1 Soil boring location (Geomatrix, 8/07)
SB-1 Soil boring location (Basics Environmental, 7/99)
Electrical & Telecommunications line (E)
Telecommunications & Cable TV line (T)
Gas line (G)
Storm drain line (STM)
Sanitary sewer line (SAN)
Water line (W)
Sources:
1. Sanborn Fire Insurance Map, 1950
2. Majors Civil Engineering, 1982
OAK STREET
LINCOLN AVENUE
Approximate Property Line
Former 76 Station
2267 Lincoln Avenue
Former Shell Station
2301-2307 Lincoln Avenue
Former Building (circa 1950)1
7-11 Store Building
Former Tire Recapping Facility (circa 1950)1
Former Gasoline & Oil USTs (installed in 1920s)
Former Oil Sump (circa 1982)2
Former Station Building (circa 1982)2
Former Dispensers (circa 1982)2
Lead Excavation
Former Dispensers (circa 1982)2
Petroleum Hydrocarbon Excavation
Former USTs (installed in 1979)
Laundromat Building
Commercial Building
Sidewalk
Planter
Parking
Overhang
Scale (ft)
0 10 20 40
Basemap modified from data from Virgil Chavez Land Surveying and drawing provided by Geomatrix
FIGURE
2
Site Plan
Former Shell Service Station
2301-2307 Lincoln Avenue
Alameda, California
CONESTOGA-ROVERS & ASSOCIATES
ATTACHMENT 2




Soil Test Boring Locations

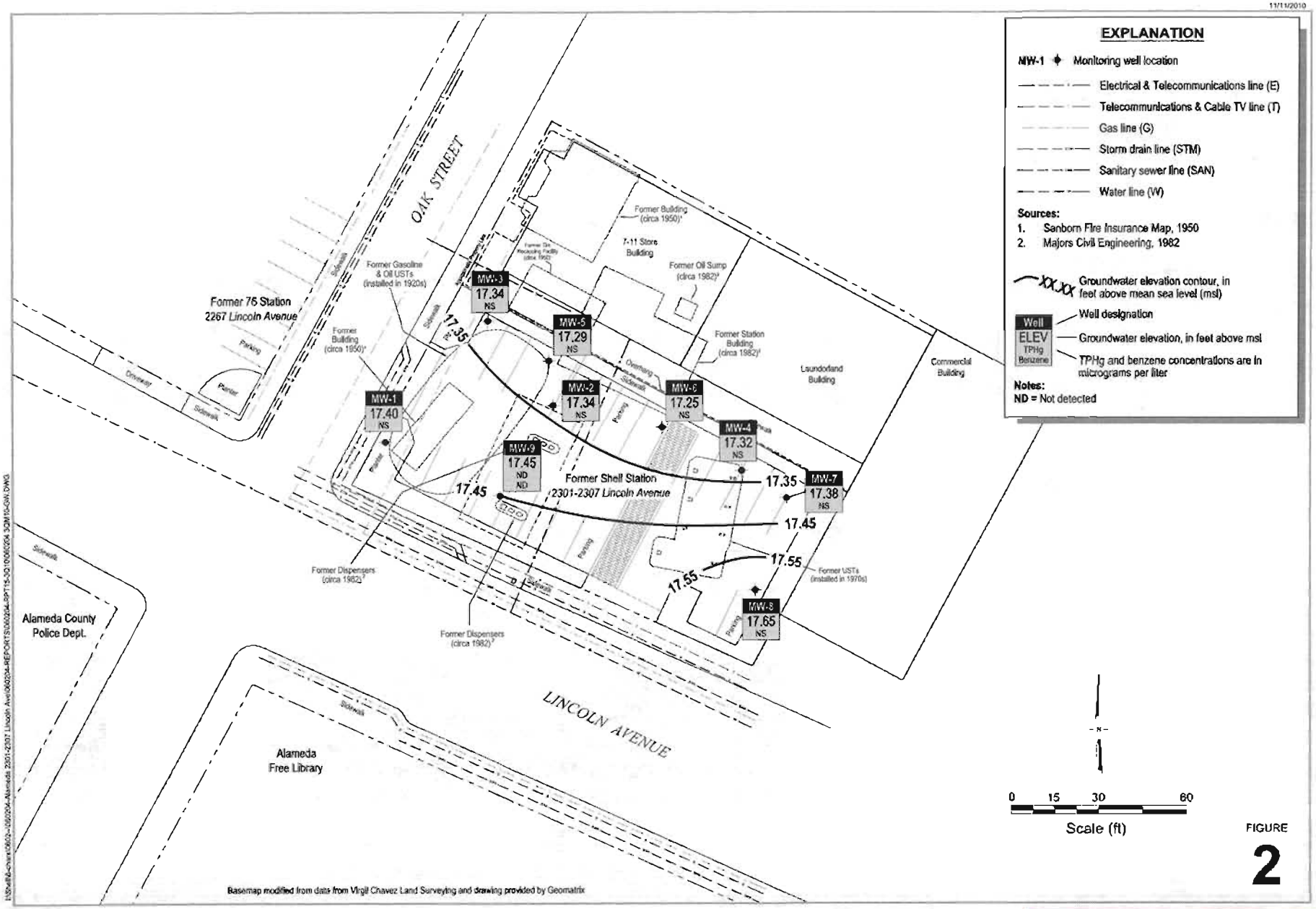
basics ENVIRONMENTAL

Limited Phase II Environmental Site Investigation
2301-2307 Lincoln Avenue
Alameda, California

PROJECT NO.
99-ENV168A

DRAWING NO.
2

PREPARED BY DGT REVIEWED BY DATE 8/10/99




Groundwater Contour and Chemical Concentration Map

September 2, 2010

CONESTOGA-ROVERS & ASSOCIATES

Former Shell Service Station

2301-2307 Lincoln Avenue

Alameda, California

ATTACHMENT 3

FIGURE

**2**

Groundwater Contour and Chemical Concentration Map

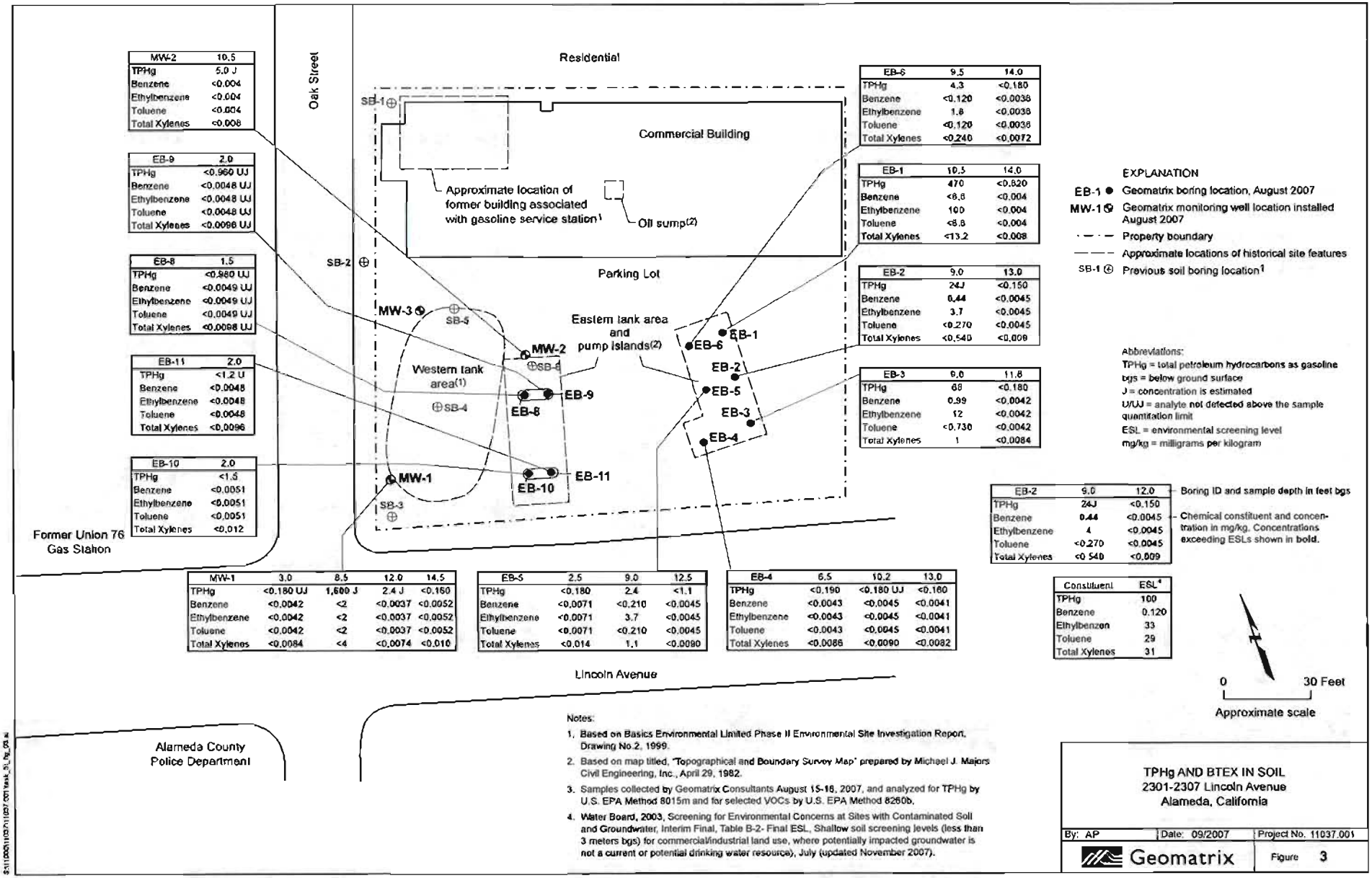
December 23, 2009

CONESTOGA-ROVERS & ASSOCIATES

**Former Shell Service Station**

2301-2307 Lincoln Avenue

Alameda, California




| MW-2 | 10.5 |
|---|---|
| TPHg | 5.0 J |
| Benzene | <0.004 |
| Ethylbenzene | <0.004 |
| Toluene | <0.004 |
| Total Xylenes | <0.008 |

| EB-9 | 2.0 |
|---|---|
| TPHg | <0.960 UJ |
| Benzene | <0.0048 UJ |
| Ethylbenzene | <0.0048 UJ |
| Toluene | <0.0048 UJ |
| Total Xylenes | <0.0096 UJ |

| EB-8 | 1.5 |
|---|---|
| TPHg | <0.980 UJ |
| Benzene | <0.0049 UJ |
| Ethylbenzene | <0.0049 UJ |
| Toluene | <0.0049 UJ |
| Total Xylenes | <0.0098 UJ |

| EB-11 | 2.0 |
|---|---|
| TPHg | <1.2 U |
| Benzene | <0.0048 |
| Ethylbenzene | <0.0048 |
| Toluene | <0.0048 |
| Total Xylenes | <0.0096 |

| EB-10 | 2.0 |
|---|---|
| TPHg | <1.5 |
| Benzene | <0.0051 |
| Ethylbenzene | <0.0051 |
| Toluene | <0.0051 |
| Total Xylenes | <0.012 |

| EB-6 | 9.5 | 14.0 |
|---|---|---|
| TPHg | 4.3 | <0.180 |
| Benzene | <0.120 | <0.0036 |
| Ethylbenzene | 1.8 | <0.0036 |
| Toluene | <0.120 | <0.0036 |
| Total Xylenes | <0.240 | <0.0072 |

| EB-1 | 10.5 | 14.0 |
|---|---|---|
| TPHg | 470 | <0.820 |
| Benzene | <6.6 | <0.004 |
| Ethylbenzene | 100 | <0.004 |
| Toluene | <6.6 | <0.004 |
| Total Xylenes | <13.2 | <0.008 |

| EB-2 | 9.0 | 13.0 |
|---|---|---|
| TPHg | 24J | <0.150 |
| Benzene | 0.44 | <0.0045 |
| Ethylbenzene | 3.7 | <0.0045 |
| Toluene | <0.270 | <0.0045 |
| Total Xylenes | <0.540 | <0.009 |

| EB-3 | 9.0 | 11.8 |
|---|---|---|
| TPHg | 68 | <0.180 |
| Benzene | 0.99 | <0.0042 |
| Ethylbenzene | 12 | <0.0042 |
| Toluene | <0.730 | <0.0042 |
| Total Xylenes | 1 | <0.0084 |

| MW-1 | 3.0 | 8.5 | 12.0 | 14.5 |
|---|---|---|---|---|
| TPHg | <0.180 UJ | 1,600 J | 2.4 J | <0.160 |
| Benzene | <0.0042 | <2 | <0.0037 | <0.0052 |
| Ethylbenzene | <0.0042 | <2 | <0.0037 | <0.0052 |
| Toluene | <0.0042 | <2 | <0.0037 | <0.0052 |
| Total Xylenes | <0.0084 | <4 | <0.0074 | <0.010 |

| EB-5 | 2.5 | 9.0 | 12.5 |
|---|---|---|---|
| TPHg | <0.180 | 2.4 | <1.1 |
| Benzene | <0.0071 | <0.210 | <0.0045 |
| Ethylbenzene | <0.0071 | 3.7 | <0.0045 |
| Toluene | <0.0071 | <0.210 | <0.0045 |
| Total Xylenes | <0.014 | 1.1 | <0.0090 |

| EB-4 | 6.5 | 10.2 | 13.0 |
|---|---|---|---|
| TPHg | <0.190 | <0.180 UJ | <0.160 |
| Benzene | <0.0043 | <0.0045 | <0.0041 |
| Ethylbenzene | <0.0043 | <0.0045 | <0.0041 |
| Toluene | <0.0043 | <0.0045 | <0.0041 |
| Total Xylenes | <0.0086 | <0.0090 | <0.0082 |

EXPLANATION

- EB-1 ● Geomatrix boring location, August 2007
- MW-1 ⊕ Geomatrix monitoring well location installed August 2007
- Property boundary
- Approximate locations of historical site features
- SB-1 ⊕ Previous soil boring location[1]

Abbreviations:
TPHg = total petroleum hydrocarbons as gasoline
bgs = below ground surface
J = concentration is estimated
U/UJ = analyte not detected above the sample quantitation limit
ESL = environmental screening level
mg/kg = milligrams per kilogram

| EB-2 | 9.0 | 12.0 |
|---|---|---|
| TPHg | 24J | <0.150 |
| Benzene | 0.44 | <0.0045 |
| Ethylbenzene | 4 | <0.0045 |
| Toluene | <0.270 | <0.0045 |
| Total Xylenes | <0.540 | <0.009 |

← Boring ID and sample depth in feet bgs
← Chemical constituent and concentration in mg/kg. Concentrations exceeding ESLs shown in **bold**.

| Constituent | ESL[4] |
|---|---|
| TPHg | 100 |
| Benzene | 0.120 |
| Ethylbenzen | 33 |
| Toluene | 29 |
| Total Xylenes | 31 |

Notes:

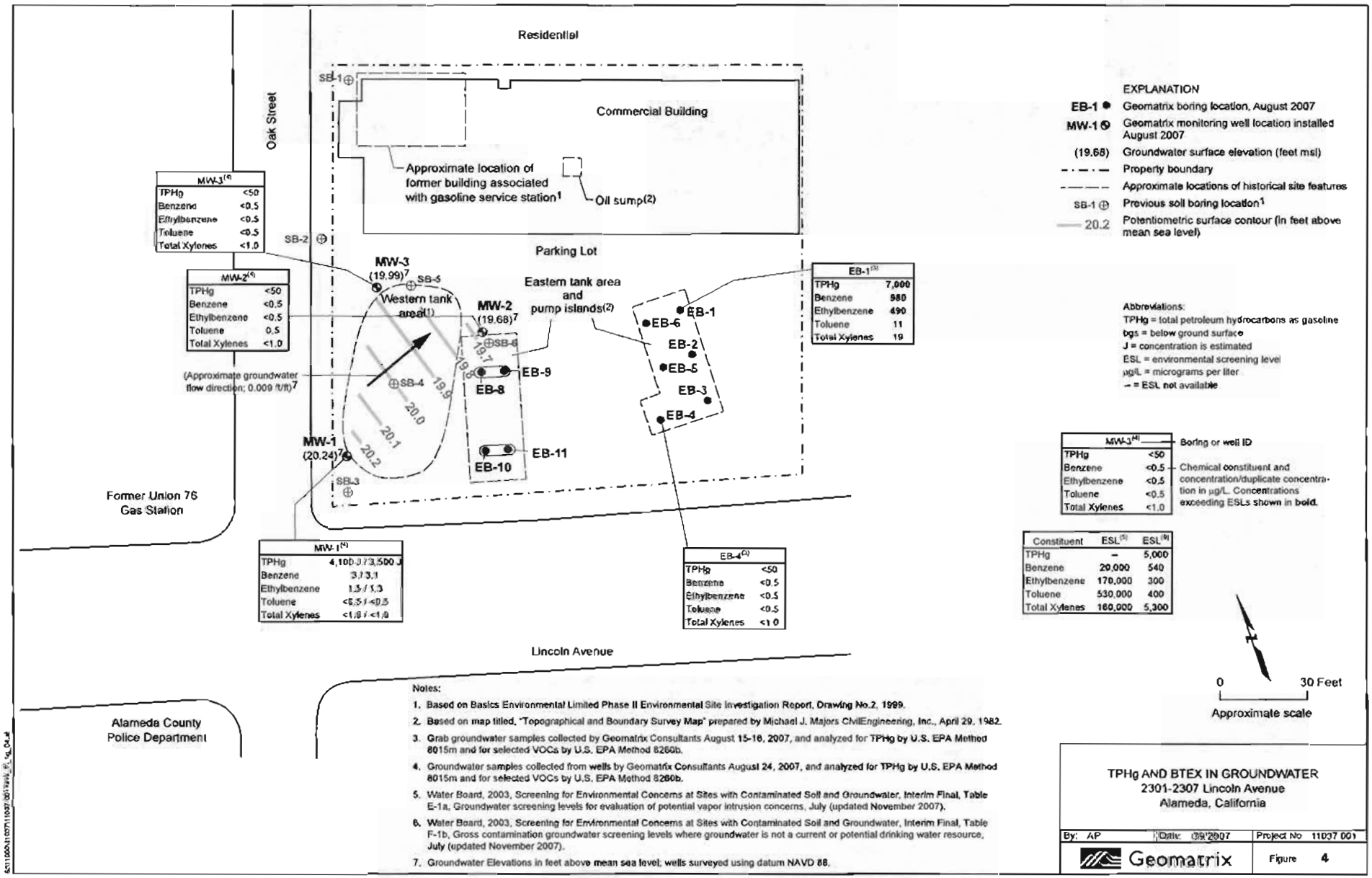
1. Based on Basics Environmental Limited Phase II Environmental Site Investigation Report, Drawing No.2, 1999.
2. Based on map titled, "Topographical and Boundary Survey Map" prepared by Michael J. Majors Civil Engineering, Inc., April 29, 1982.
3. Samples collected by Geomatrix Consultants August 15-16, 2007, and analyzed for TPHg by U.S. EPA Method 8015m and for selected VOCs by U.S. EPA Method 8260b.
4. Water Board, 2003, Screening for Environmental Concerns at Sites with Contaminated Soil and Groundwater, Interim Final, Table B-2- Final ESL, Shallow soil screening levels (less than 3 meters bgs) for commercial/industrial land use, where potentially impacted groundwater is not a current or potential drinking water resource), July (updated November 2007).

TPHg AND BTEX IN SOIL
2301-2307 Lincoln Avenue
Alameda, California

| By: AP | Date: 09/2007 | Project No. 11037.001 |
|---|---|---|

Geomatrix

Figure 3




Notes:

1. Based on Basics Environmental Limited Phase II Environmental Site Investigation Report, Drawing No.2, 1999.
2. Based on map titled, "Topographical and Boundary Survey Map" prepared by Michael J. Majors CivilEngineering, Inc., April 29, 1982.
3. Grab groundwater samples collected by Geomatrix Consultants August 15-16, 2007, and analyzed for TPHg by U.S. EPA Method 8015m and for selected VOCs by U.S. EPA Method 8260b.
4. Groundwater samples collected from wells by Geomatrix Consultants August 24, 2007, and analyzed for TPHg by U.S. EPA Method 8015m and for selected VOCs by U.S. EPA Method 8260b.
5. Water Board, 2003, Screening for Environmental Concerns at Sites with Contaminated Soil and Groundwater, Interim Final, Table E-1a, Groundwater screening levels for evaluation of potential vapor intrusion concerns, July (updated November 2007).
6. Water Board, 2003, Screening for Environmental Concerns at Sites with Contaminated Soil and Groundwater, Interim Final, Table F-1b, Gross contamination groundwater screening levels where groundwater is not a current or potential drinking water resource, July (updated November 2007).
7. Groundwater Elevations in feet above mean sea level; wells surveyed using datum NAVD 88.

TPHg AND BTEX IN GROUNDWATER
2301-2307 Lincoln Avenue
Alameda, California

| By: AP | Date: 09/2007 | Project No 11037.001 |
|---|---|---|
| Geomatrix | | Figure 4 |

06/02/2011

## EXPLANATION

HC-CN ▪ Hydrocarbon excavation soil sample location (CRA, 4/11)

PB-C ▪ Lead excavation soil sample location (CRA, 4/11)

| Sample ID | Sample Date | Sample Depth | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | Total Lead |
|---|---|---|---|---|---|---|---|---|
| PB-E-2 | 04/11/2011 | 2.0 | <0.097 | <0.0049 | <0.0049 | <0.0049 | <0.0097 | 35.6 |

**Notes:**

Soil sample ID, date, depth in feet below grade (fbg), and concentrations in milligrams per kilogram (mg/kg)

NA = Not analyzed

TPHg = Total petroleum hydrocarbons as gasoline

<X = Not detected at reporting limit X

0 5 10 20

Scale (ft)

| Sample ID | Sample Date | Sample Depth | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | Total Lead |
|---|---|---|---|---|---|---|---|---|
| HC-CN-11.5 | 04/12/2011 | 13.5 | 7.27 | 0.0230 | <0.026 | 0.0215 | <0.053 | NA |

| Sample ID | Sample Date | Sample Depth | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | Total Lead |
|---|---|---|---|---|---|---|---|---|
| HC-N-6 | 04/12/2011 | 6 | 0.951 | <0.0050 | <0.0050 | 0.0302 | <0.010 | NA |
| HC-N-8 | 04/12/2011 | 8 | 127 | <1.2 | <1.2 | 2.24 | <2.5 | NA |

| Sample ID | Sample Date | Sample Depth | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | Total Lead |
|---|---|---|---|---|---|---|---|---|
| HC-W-6 | 04/12/2011 | 6 | 25.2 | <0.25 | <0.25 | 0.966 | <0.49 | NA |
| HC-W-8 | 04/12/2011 | 8 | 17.0 | <0.25 | <0.25 | 0.173 | <0.50 | NA |

| Sample ID | Sample Date | Sample Depth | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | Total Lead |
|---|---|---|---|---|---|---|---|---|
| PB-N-2 | 04/11/2011 | 2.0 | <0.099 | <0.0050 | <0.0050 | <0.0050 | <0.0099 | 17.9 |

| Sample ID | Sample Date | Sample Depth | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | Total Lead |
|---|---|---|---|---|---|---|---|---|
| HC-W-7 | 04/14/2011 | 7 | 0.912 | <0.022 | <0.022 | 0.0448 | <0.043 | NA |

| Sample ID | Sample Date | Sample Depth | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | Total Lead |
|---|---|---|---|---|---|---|---|---|
| HC-SW-7 | 04/14/2011 | 7 | 0.399 | 0.0020 | <0.0049 | 0.0315 | <0.0098 | NA |

| Sample ID | Sample Date | Sample Depth | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | Total Lead |
|---|---|---|---|---|---|---|---|---|
| HC-E-6 | 04/12/2011 | 6 | 20.4 | <0.25 | <0.25 | 0.182 | <0.50 | NA |
| HC-E-12 | 04/12/2011 | 12 | 1.31 | <0.023 | <0.023 | <0.023 | <0.047 | NA |

| Sample ID | Sample Date | Sample Depth | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | Total Lead |
|---|---|---|---|---|---|---|---|---|
| PB-W-2 | 04/11/2011 | 2.0 | <0.098 | <0.0049 | <0.0049 | <0.0049 | <0.0098 | 19.2 |

| Sample ID | Sample Date | Sample Depth | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | Total Lead |
|---|---|---|---|---|---|---|---|---|
| PB-C-3 | 04/11/2011 | 3.0 | <0.099 | <0.0049 | <0.0049 | <0.0049 | <0.0099 | 150 |

| Sample ID | Sample Date | Sample Depth | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | Total Lead |
|---|---|---|---|---|---|---|---|---|
| PB-E-2 | 04/11/2011 | 2.0 | <0.097 | <0.0049 | <0.0049 | <0.0049 | <0.0097 | 35.6 |

| Sample ID | Sample Date | Sample Depth | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | Total Lead |
|---|---|---|---|---|---|---|---|---|
| HC-S-3 | 04/12/2011 | 3 | 15.1 | <0.25 | <0.25 | <0.25 | <0.50 | NA |
| HC-S-7 | 04/14/2011 | 7 | 166 | <0.98 | <0.98 | 1.54 | <2.0 | NA |
| HC-S-7.5 | 04/12/2011 | 7.5 | 1.08 | 0.0150 | <0.011 | 0.0044 | <0.021 | NA |

| Sample ID | Sample Date | Sample Depth | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | Total Lead |
|---|---|---|---|---|---|---|---|---|
| HC-CS-13 | 04/12/2011 | 13 | 27.1 | 0.0535 | <0.023 | 0.141 | <0.046 | NA |

| Sample ID | Sample Date | Sample Depth (fbg) | TPHg (mg/kg) | Benzene (mg/kg) | Toluene (mg/kg) | Ethyl-benzene (mg/kg) | Total Xylenes (mg/kg) | Total Lead (mg/kg) |
|---|---|---|---|---|---|---|---|---|
| PB-S-2 | 04/11/2011 | 2.0 | <0.099 | <0.0050 | <0.0050 | <0.0050 | <0.0099 | 15.0 |

HC-CN
HC-N
HC-W(6,8)
HC-W(7)
HC-SW
HC-S
HC-CS
HC-E
PB-C
PB-N
PB-W
PB-E
PB-S
Lead Excavation
Former Dispenser (circa 1982)[2]
Petroleum Hydrocarbon Excavation
Former USTs (installed in 1970s)

FIGURE

**3**

**Soil Chemical Concentrations Map**

April 11-14, 2011

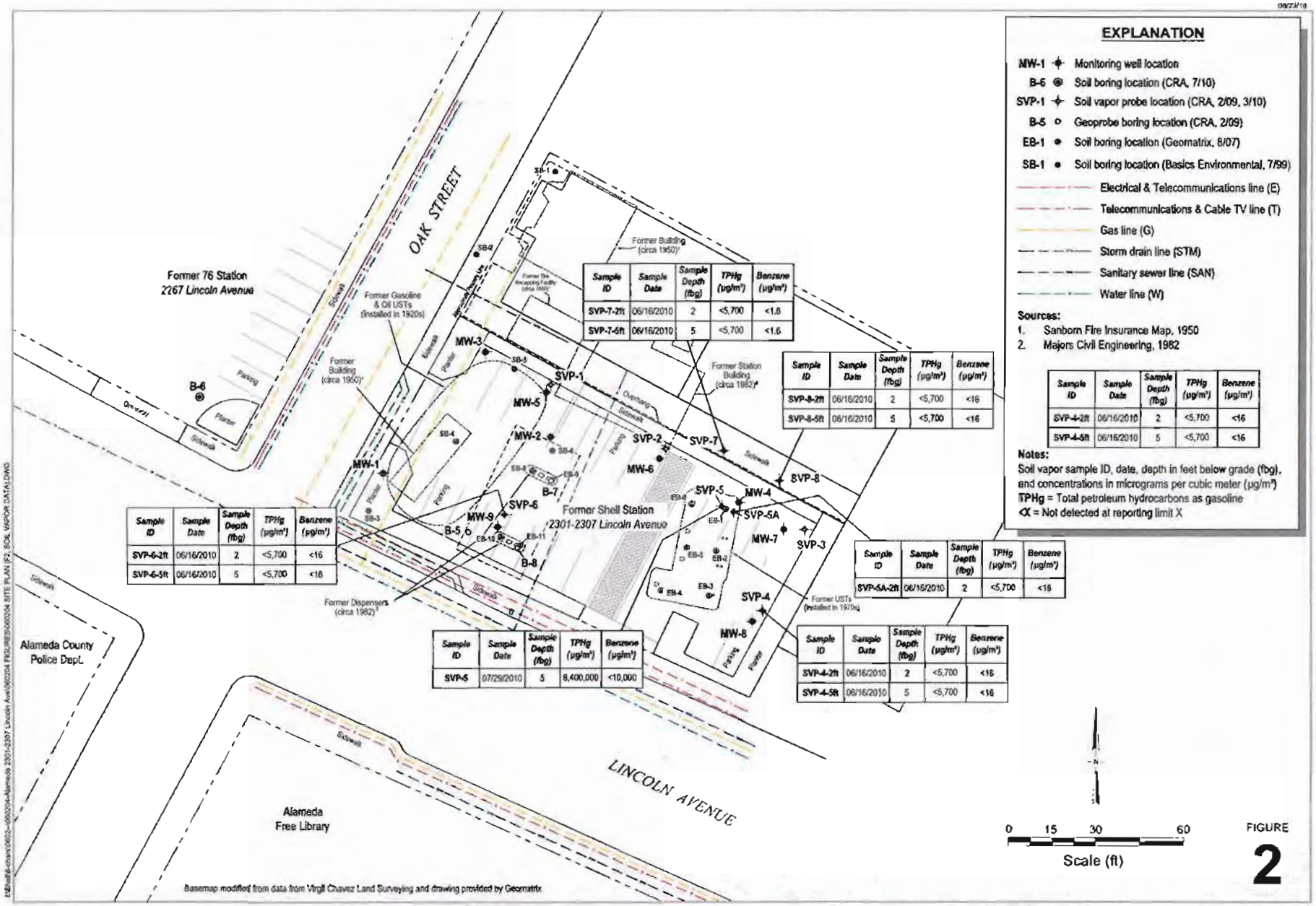
**Former Shell Service Station**

2301-2307 Lincoln Avenue

Alameda, California

CONESTOGA-ROVERS & ASSOCIATES

I:\Shell\65-chars\0602--\060204-Alameda 2301-2307 Lincoln Ave\060204 FIGURES\060204 SITE PLAN (F3, SOIL DATA).DWG




| Sample ID | Sample Date | Sample Depth (fbg) | TPHg (µg/m³) | Benzene (µg/m³) |
|---|---|---|---|---|
| SVP-7-2ft | 06/16/2010 | 2 | <5,700 | <1.6 |
| SVP-7-5ft | 06/16/2010 | 5 | <5,700 | <1.6 |

| Sample ID | Sample Date | Sample Depth (fbg) | TPHg (µg/m³) | Benzene (µg/m³) |
|---|---|---|---|---|
| SVP-8-2ft | 06/16/2010 | 2 | <5,700 | <16 |
| SVP-8-5ft | 06/16/2010 | 5 | <5,700 | <16 |

| Sample ID | Sample Date | Sample Depth (fbg) | TPHg (µg/m³) | Benzene (µg/m³) |
|---|---|---|---|---|
| SVP-6-2ft | 06/16/2010 | 2 | <5,700 | <16 |
| SVP-6-5ft | 06/16/2010 | 5 | <5,700 | <16 |

| Sample ID | Sample Date | Sample Depth (fbg) | TPHg (µg/m³) | Benzene (µg/m³) |
|---|---|---|---|---|
| SVP-5A-2ft | 06/16/2010 | 2 | <5,700 | <16 |

| Sample ID | Sample Date | Sample Depth (fbg) | TPHg (µg/m³) | Benzene (µg/m³) |
|---|---|---|---|---|
| SVP-5 | 07/29/2010 | 5 | 8,400,000 | <10,000 |

| Sample ID | Sample Date | Sample Depth (fbg) | TPHg (µg/m³) | Benzene (µg/m³) |
|---|---|---|---|---|
| SVP-4-2ft | 06/16/2010 | 2 | <5,700 | <16 |
| SVP-4-5ft | 06/16/2010 | 5 | <5,700 | <16 |

| Sample ID | Sample Date | Sample Depth (fbg) | TPHg (µg/m³) | Benzene (µg/m³) |
|---|---|---|---|---|
| SVP-4-2ft | 06/16/2010 | 2 | <5,700 | <16 |
| SVP-4-5ft | 06/16/2010 | 5 | <5,700 | <16 |

FIGURE
**2**

**Soil Vapor Data Map**

June 16 and July 29, 2010

CONESTOGA-ROVERS & ASSOCIATES

**Former Shell Service Station**

2301-2307 Lincoln Avenue

Alameda, California

I:\Shell\Alameda\0602--050204\Alameda 2301-2307 Lincoln Ave\050204 FIGURES\050204 SITE PLAN (F2, SOIL VAPOR DATA).DWG

05/27/2011




Basemap modified from data from Virgil Chavez Land Surveying and drawing provided by Geomatrix

## EXPLANATION

- HC-CN • Hydrocarbon excavation soil sample location (CRA, 4/11)
- PB-C • Lead excavation soil sample location (CRA, 4/11)
- COMP-1 Soil boring location (CRA, 4/11)
- MW-4 Destroyed monitoring well location
- SVP-5 Destroyed soil vapor probe location
- MW-1 Monitoring well location
- B-6 Soil boring location (CRA, 7/10)
- SVP-1 Soil vapor probe location (CRA, 2/09, 3/10, 4/11)
- B-5 Geoprobe boring location (CRA, 2/09)
- EB-1 Soil boring location (Geomatrix, 8/07)
- SB-1 Soil boring location (Basics Environmental, 7/99)
- Electrical & Telecommunications line (E)
- Telecommunications & Cable TV line (T)
- Gas line (G)
- Storm drain line (STM)
- Sanitary sewer line (SAN)
- Water line (W)

**Sources:**
1. Sanborn Fire Insurance Map, 1950
2. Majors Civil Engineering, 1982

| Sample ID | Sample Date | Sample Depth | TPHg | Benzene | Ethyl-benzene | Toluene | Total Xylenes |
|---|---|---|---|---|---|---|---|
| SVP-9-2' | 03/30/2011 | 2 | <7,000 | <16 | <19 | <22 | <43 |
| SVP-9-4.5' | 03/30/2011 | 4.5 | 18,000 | 52 | <19 | <22 | <43 |

**Notes:**
Soil vapor sample ID, date, depth in feet below grade (fbg), and concentrations in micrograms per cubic meter (µg/m³)
NA = Not available
TPHg = Total petroleum hydrocarbons as gasoline
<X = Not detected at reporting limit X

# Soil Vapor Chemical Concentrations Map

March 30, 2011

CONESTOGA-ROVERS & ASSOCIATES

## Former Shell Service Station

2301-2307 Lincoln Avenue
Alameda, California

FIGURE

**4**

I:\Shell\Alameda\0602---060204-Alameda 2301-2307 Lincoln Ave\060204 FIGURES\060204 SITE PLAN.DWG

TABLE 2

HISTORICAL SOIL ANALYTICAL DATA
FORMER SHELL SERVICE STATION
2301-2307 LINCOLN AVENUE, ALAMEDA, CALIFORNIA

| Sample ID | Date | Depth (fbg) | TPHmo | TPHd | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | MTBE | DIPE | ETBE | TAME | TBA | 1,2-DCA | EDB | Total Lead |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| SB-1 | 7/24/1999 | 7.5 | — | — | <1.0 | <0.005 | <0.005 | <0.005 | <0.005 | <0.05 | — | — | — | — | — | — | — |
| SB-2 | 7/24/1999 | 7.5 | — | — | <1.0 | <0.005 | <0.005 | <0.005 | <0.005 | <0.05 | — | — | — | — | — | — | — |
| SB-3 | 7/24/1999 | 7.5 | — | — | 40[a] | <0.005 | <0.005 | 0.012 | <0.005 | <0.05 | — | — | — | — | — | — | — |
| SB-4 | 7/24/1999 | 7.5 | — | — | <1.0 | <0.005 | <0.005 | <0.005 | <0.005 | <0.05 | — | — | — | — | — | — | — |
| SB-5 | 7/24/1999 | 7.5 | — | — | <1.0 | <0.005 | <0.005 | <0.005 | <0.005 | <0.05 | — | — | — | — | — | — | — |
| SB-6 | 7/24/1999 | 5 | — | — | <1.0 | <0.005 | <0.005 | <0.005 | <0.005 | <0.05 | — | — | — | — | — | — | — |
| MW-1-3.0 | 8/15/2007 | 3.0 | — | — | <0.18 | <0.0042 | <0.0042 | <0.0042 | <0.0084 | <0.0042 | <0.0042 | <0.0042 | <0.0042 | <0.085 | <0.0042 | <0.0042 | — |
| MW-1-8.5 | 8/15/2007 | 8.5 | — | — | 1,600 | <2.0 | <2.0 | <2.0 | <4.0 | <2.0 | <2.0 | <2.0 | <2.0 | <40 | <2.0 | <2.0 | — |
| MW-1-12.0 | 8/15/2007 | 12.0 | — | — | 2.4 | <0.0037 | <0.0037 | <0.0037 | <0.0074 | <0.0037 | <0.0037 | <0.0037 | <0.0037 | <0.075 | <0.0037 | <0.0037 | — |
| MW-1-14.5 | 8/15/2007 | 14.5 | — | — | <0.16 | <0.0052 | <0.0052 | <0.0052 | <0.0104 | <0.0052 | <0.0052 | <0.0052 | <0.0052 | <0.10 | <0.0052 | <0.0052 | — |
| MW-2-10.5 | 8/15/2007 | 10.5 | — | — | 5.0 | <0.004 | <0.004 | <0.004 | <0.008 | <0.004 | <0.004 | <0.004 | <0.004 | <0.079 | <0.004 | <0.004 | — |
| EB-1-10.5 | 8/16/2007 | 10.5 | — | — | 470 | <6.6 | <6.6 | 100 | <13.2 | <6.6 | <6.6 | <6.6 | <6.6 | <130 | <6.6 | <6.6 | 4.5 |
| EB-1-14.0 | 8/16/2007 | 14.0 | — | — | <0.82 | <0.004 | <0.004 | <0.004 | <0.008 | <0.004 | <0.004 | <0.004 | <0.004 | <0.081 | <0.004 | <0.004 | 1.4 |
| EB-2-9.0 | 8/16/2007 | 9.0 | — | — | 24 | 0.44 | <0.27 | 3.7 | <0.54 | <0.27 | <0.27 | <0.27 | <0.27 | <5.3 | <0.27 | <0.27 | 21 |
| EB-2-13 | 8/16/2007 | 13.0 | — | — | <0.150 | <0.0045 | <0.0045 | <0.0045 | <0.009 | <0.0045 | <0.0045 | <0.0045 | <0.0045 | <0.091 | <0.0045 | <0.0045 | 1.2 |
| EB-3-9.0 | 8/16/2007 | 9.0 | — | — | 68 | 0.99 | <0.73 | 12 | 1.0 | <0.73 | <0.73 | <0.73 | <0.73 | <15 | <0.73 | <0.73 | 2.0 |
| EB-3-11.8 | 8/16/2007 | 11.8 | — | — | <0.18 | <0.0042 | <0.0042 | <0.0042 | <0.0084 | <0.0042 | <0.0042 | <0.0042 | <0.0042 | <0.085 | <0.0042 | <0.0042 | 1.8 |
| EB-4-6.5 | 8/16/2007 | 6.5 | — | — | <0.19 | <0.0043 | <0.0043 | <0.0043 | <0.0086 | <0.0043 | <0.0043 | <0.0043 | <0.0043 | <0.086 | <0.0043 | <0.0043 | 2.3 |
| EB-4-10.2 | 8/16/2007 | 10.2 | — | — | <0.18 | <0.0045 | <0.0045 | <0.0045 | <0.009 | <0.0045 | <0.0045 | <0.0045 | <0.0045 | <0.091 | <0.0045 | <0.0045 | 1.8 |
| EB-4-13.0 | 8/16/2007 | 13.0 | — | — | <0.16 | <0.0041 | <0.0041 | <0.0041 | <0.0082 | <0.0041 | <0.0041 | <0.0041 | <0.0041 | <0.082 | <0.0041 | <0.0041 | 1.7 |



ATTACHMENT 4

TABLE 2

HISTORICAL SOIL ANALYTICAL DATA
FORMER SHELL SERVICE STATION
2301-2307 LINCOLN AVENUE, ALAMEDA, CALIFORNIA

| Sample ID | Date | Depth (fbg) | TPHmo | TPHd | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | MTBE | DIPE | ETBE | TAME | TBA | 1,2-DCA | EDB | Total Lead |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| EB-5-2.5 | 8/16/2007 | 2.5 | — | — | <0.18 | <0.0071 | <0.0071 | <0.0071 | <0.0142 | <0.0071 | <0.0071 | <0.0071 | <0.0071 | <0.14 | <0.0071 | <0.0071 | 48 |
| EB-5-9.0 | 8/16/2007 | 9.0 | — | — | 2.4 | <0.21 | <0.21 | 3.7 | 1.1 | <0.21 | <0.21 | <0.21 | <0.21 | <4.2 | <0.21 | <0.21 | 2.6 |
| EB-5-12.5 | 8/16/2007 | 12.5 | — | — | <1.1 | <0.0045 | <0.0045 | <0.0045 | <0.0090 | <0.0045 | <0.0045 | <0.0045 | <0.0045 | <0.089 | <0.0045 | <0.0045 | 1.5 |
| EB-6-9.5 | 8/16/2007 | 9.5 | — | — | 4.3 | <0.12 | <0.12 | 1.8 | <2.4 | <0.12 | <0.12 | <0.12 | <0.12 | <2.4 | <0.12 | <0.12 | 2.5 |
| EB-6-14.0 | 8/16/2007 | 14.0 | — | — | <0.18 | <0.0036 | <0.0036 | <0.0036 | <0.0072 | <0.0036 | <0.0036 | <0.0036 | <0.0036 | <0.072 | <0.0036 | <0.0036 | 2.0 |
| EB-8-1.5 | 8/15/2007 | 1.5 | — | — | <0.98 | <0.0049 | <0.0049 | <0.0049 | <0.0098 | <0.020 | — | — | — | — | — | — | 40 |
| EB-9-2.0 | 8/15/2007 | 2.0 | — | — | <0.96 | <0.0048 | <0.0048 | <0.0048 | <0.0096 | <0.019 | — | — | — | — | — | — | 2.0 |
| EB-10-2.0 | 8/16/2007 | 2.0 | — | — | <1.5 | <0.0051 | <0.0051 | <0.0051 | <0.012 | <0.0051 | <0.0051 | <0.0051 | <0.0051 | <0.10 | <0.0051 | <0.0051 | 550 |
| EB-11-2.0 | 8/16/2007 | 2.0 | — | — | <1.2 | <0.0048 | <0.0048 | <0.0048 | <0.0096 | <0.0048 | <0.0048 | <0.0048 | <0.0048 | <0.096 | <0.0048 | <0.0048 | 3.3 |
| B-5-5.5' | 2/27/2009 | 5.5 | — | — | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — |
| B-5-8.5' | 2/27/2009 | 8.5 | — | — | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — |
| B-7-5.5' | 2/27/2009 | 5.5 | — | — | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — |
| B-7-8.5' | 2/27/2009 | 8.5 | — | — | 87 | <0.50 | <0.50 | <0.50 | <0.50 | <0.50 | — | — | — | — | — | — | — |
| B-8-5.5' | 2/27/2009 | 5.5 | — | — | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — |
| B-8-8.5' | 2/27/2009 | 8.5 | — | — | 7,900 | <20 | <20 | 120 | 150 | <20 | — | — | — | — | — | — | — |
| MW-4-5' | 2/25/2009 | 5 | — | — | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — |
| MW-4-8' | 2/25/2009 | 8 | — | — | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — |
| MW-5-5' | 2/24/2009 | 5 | — | — | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — |
| MW-5-8' | 2/24/2009 | 8 | — | — | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — |

HISTORICAL SOIL ANALYTICAL DATA
FORMER SHELL SERVICE STATION
2301-2307 LINCOLN AVENUE, ALAMEDA, CALIFORNIA

| Sample ID | Date | Depth (fbg) | TPHmo | TPHd | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | MTBE | DIPE | ETBE | TAME | TBA | 1,2-DCA | EDB | Total Lead |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| MW-6-5' | 2/26/2009 | 5 | — | — | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — |
| MW-6-8' | 2/26/2009 | 8 | — | — | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — |
| MW-7-5' | 2/25/2009 | 5 | — | — | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — |
| MW-7-8' | 2/25/2009 | 8 | — | — | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — |
| MW-8-5' | 2/23/2009 | 5 | — | — | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — |
| MW-8-8' | 2/23/2009 | 8 | — | — | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — |
| MW-9-5.5' | 3/25/2010 | 5.5 | 81 | 9.7[b] | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — | 3.36 |
| MW-9-8.5' | 3/25/2010 | 8.5 | <25 | <5.0 | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — | 2.45 |
| MW-9-12' | 3/25/2010 | 12 | 450 | 54[b] | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — | 17.1 |
| MW-9-17.5' | 3/25/2010 | 17.5 | <25 | <5.0 | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | — | — | — | — | — | — | — | 1.85 |
| B-6-5.25 | 7/13/2010 | 5.25 | <25 | <5.0 | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.010 | <0.010 | <0.010 | <0.050 | <0.0050 | <0.0050 | 2.18 |
| B-6-8.0 | 7/13/2010 | 8 | <25 | <5.0 | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.010 | <0.010 | <0.010 | <0.050 | <0.0050 | <0.0050 | 2.72 |
| B-6-9.5 | 7/13/2010 | 9.5 | <25 | <5.0 | <0.50 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.0050 | <0.010 | <0.010 | <0.010 | <0.050 | <0.0050 | <0.0050 | 2.68 |
| PB-E-2 | 4/11/2011 | 2 | — | — | <0.097 | <0.0049 | <0.0049 | <0.0049 | <0.0097 | — | — | — | — | — | — | — | 35.6 |
| PB-W-2 | 4/11/2011 | 2 | — | — | <0.098 | <0.0049 | <0.0049 | <0.0049 | <0.0098 | — | — | — | — | — | — | — | 19.2 |
| PB-S-2 | 4/11/2011 | 2 | — | — | <0.099 | <0.0050 | <0.0050 | <0.0050 | <0.0099 | — | — | — | — | — | — | — | 15.0 |
| PB-N-2 | 4/11/2011 | 2 | — | — | <0.099 | <0.0050 | <0.0050 | <0.0050 | <0.0099 | — | — | — | — | — | — | — | 17.9 |

TABLE 2

HISTORICAL SOIL ANALYTICAL DATA
FORMER SHELL SERVICE STATION
2301-2307 LINCOLN AVENUE, ALAMEDA, CALIFORNIA

| Sample ID | Date | Depth (fbg) | TPHmo | TPHd | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | MTBE | DIPE | ETBE | TAME | TBA | 1,2-DCA | EDB | Total Lead |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| PB-C-3 | 4/11/2011 | 3 | — | — | <0.099 | <0.0049 | <0.0049 | <0.0049 | <0.0099 | — | — | — | — | — | — | — | 150 |
| HC-CN-13.5 | 4/12/2011 | 13.5 | — | — | 2.27 | 0.0230[e] | <0.026 | 0.0215[e] | <0.053 | — | — | — | — | — | — | — | — |
| HC-CS-13 | 4/12/2011 | 13 | — | — | 27.1[f] | 0.0535 | <0.023 | 0.141 | <0.046 | — | — | — | — | — | — | — | — |
| HC-E-6 | 4/12/2011 | 6 | — | — | 20.4 | <0.25 | <0.25 | 0.182[e] | <0.50 | — | — | — | — | — | — | — | — |
| HC-E-12 | 4/12/2011 | 12 | — | — | 1.31 | <0.023 | <0.023 | <0.023 | <0.047 | — | — | — | — | — | — | — | — |
| HC-W-6 | 4/12/2011 | 6 | — | — | 25.2 | <0.25 | <0.25 | 0.966 | <0.49 | — | — | — | — | — | — | — | — |
| HC-W-8 | 4/12/2011 | 8 | — | — | 17.0 | <0.25 | <0.25 | 0.173[e] | <0.50 | — | — | — | — | — | — | — | — |
| HC-W-7 | 4/14/2011 | 7 | — | — | 0.912 | <0.022 | <0.022 | 0.0448 | <0.043 | <0.022 | — | — | — | — | — | — | — |
| HC-N-6 | 4/12/2011 | 6 | — | — | 0.951 | <0.0050 | <0.0050 | 0.0302 | <0.010 | — | — | — | — | — | — | — | — |
| HC-N-8 | 4/12/2011 | 8 | — | — | 127 | <1.2 | <1.2 | 2.24 | <2.5 | — | — | — | — | — | — | — | — |
| HC-S-3 | 4/12/2011 | 3 | — | — | 15.1 | <0.25 | <0.25 | <0.25 | <0.50 | — | — | — | — | — | — | — | — |
| HC-S-7.5 | 4/12/2011 | 7.5 | — | — | 1.08 | 0.0150 | <0.011 | 0.0044[e] | <0.021 | — | — | — | — | — | — | — | — |
| HC-S-7 | 4/14/2011 | 7 | — | — | 166 | <0.98 | <0.98 | 1.54 | <2.0 | <0.98 | — | — | — | — | — | — | — |
| HC-SW-7 | 4/14/2011 | 7 | — | — | 0.399 | 0.0020[e] | <0.0049 | 0.0315 | <0.0098 | <0.0049 | — | — | — | — | — | — | — |
| *Shallow Soil (≤10 fbg) ESL*[3] | | | 2,500 | 180 | 180 | 0.27 | 9.3 | 4.7 | 11 | 8.4 | NA | NA | NA | 110 | 0.48 | 0.044 | 750 |
| *Deep Soil (>10 fbg) ESL*[4] | | | 5,000 | 180 | 180 | 2.0 | 9.3 | 4.7 | 11 | 8.4 | NA | NA | NA | 110 | 1.8 | 1.0 | 750 |

**TABLE 2**

**HISTORICAL SOIL ANALYTICAL DATA**
**FORMER SHELL SERVICE STATION**
**2301-2307 LINCOLN AVENUE, ALAMEDA, CALIFORNIA**

| *Sample ID* | *Date* | *Depth (fbg)* | *TPHmo* | *TPHd* | *TPHg* | *Benzene* | *Toluene* | *Ethyl-benzene* | *Total Xylenes* | *MTBE* | *DIPE* | *ETBE* | *TAME* | *TBA* | *1,2-DCA* | *EDB* | *Total Lead* |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|

Notes:

All results in milligrams per kilogram (mg/kg) unless otherwise indicated.
fbg = feet below grade
TPHmo = Total petroleum hydrocarbons as motor oil analyzed by EPA Method 8015B (M)
TPHd = Total petroleum hydrocarbons as diesel analyzed by EPA Method 8015B
TPHg = Total petroleum hydrocarbons as gasoline analyzed by EPA Method 8260B; before February 27, 2009, analyzed by EPA 8015M.
Benzene, toluene, ethylbenzene and total xylenes analyzed by EPA Method 8260B; before August 15, 2007, analyzed by EPA Method 8020.
MTBE = Methyl tertiary-butyl ether analyzed by EPA Method 8260B, before August 15, 2007, analyzed by EPA Method 8020.
TBA = Tertiary-butyl alcohol analyzed by EPA Method 8260B
DIPE = Di-isopropyl ether analyzed by EPA Method 8260B
ETBE = Ethyl tertiary-butyl ether analyzed by EPA Method 8260B
TAME = Tertiary-amyl methyl ether analyzed by EPA Method 8260B
1,2-DCA = 1,2-Dichloroethane analyzed by EPA Method
EDB = 1,2-Dibromoethane analyzed by EPA
Lead analyzed by EPA Method 6010B
<x = Not detected at reporting limit x
— = Not analyzed
ESL = Environmental screening level
NA = No applicable ESL

a = Strongly aged gasoline or diesel range compounds are significant.
b = The sample chromatographic pattern for TPHd 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.
c = 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 B of *Screening for Environmental Concerns at Sites With Contaminated Soil and Groundwater*, California Regional Water Quality Control Board, Interim Final - November 2007 [Revised May 2008]).
d = 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 D of *Screening for Environmental Concerns at Sites With Contaminated Soil and Groundwater*, California Regional Water Quality Control Board, Interim Final - November 2007 [Revised May 2008]).
e = Estimated value
f = Analyte found in associated method blank

TABLE 1

HISTORICAL SOIL VAPOR ANALYTICAL DATA
FORMER SHELL SERVICE STATION
2301-2307 LINCOLN AVENUE, ALAMEDA, CALIFORNIA

| Sample ID | Date | Depth (fbg) | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | MTBE | Naph-thalene | Chloro-form | Dichloro-difluoro-methane | Tetra-chloro-ethene | Butane | Iso-butane | Propane | Methane (%v) | Carbon Dioxide (%v) | Oxygen + Argon (%v) | Helium (%v) |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| SVP-1 | 3/11/2009 | 5 | <8,900 | 5.4[b] | <2.9[b] | <3.4[b] | <13[b] | <11 | — | — | — | — | <18 | 110 | <42 | — | — | — | — |
| SVP-2 | 3/11/2009 | 5 | <9,200 | 7.3[b] | <3.0[b] | <3.5[b] | <14[b] | <12 | — | — | — | — | <19 | <19 | <43 | — | — | — | — |
| SVP-3 | 3/11/2009 | 5 | <11,000 | 5.5[b] | <3.6[b] | <4.2[b] | <17[b] | <14 | — | — | — | — | <23 | <23 | <52 | — | — | — | — |
| SVP-4-2ft | 6/16/2010 | 2 | <5,700 | <16 | <19 | <22 | <43 | — | <52 | — | — | — | — | — | — | <0.500 | 1.62 | 20.0 | <0.0100 |
| SVP-4-5ft | 6/16/2010 | 5 | <5,700 | <16 | <19 | <22 | <43 | — | <52 | — | — | — | — | — | — | <0.500 | 1.74 | 20.0 | <0.0100 |
| SVP-5 | 3/11/2009 | 5 | 10,000,000 | 11,000[b] | 1,800[b] | 21,000[b] | <5,900[b] | <4,900 | — | — | — | — | <8,100 | <8,100 | <18,000 | — | — | — | — |
| SVP-5 DUP[a] | 3/11/2009 | 5 | 11,000,000 | 12,000[b] | 1,600[b] | 23,000[b] | <5,500[b] | <4,500 | — | — | — | — | <7,500 | <7,500 | <17,000 | — | — | — | — |
| SVP-5 | 7/29/2010 | 5 | 8,400,000 | <10,000 | <12,000 | 14,000 | <27,000 | — | <33,000 | — | — | — | — | — | — | 1.73 | 0.147 | 0.741 | <0.0100 |
| SVP-5A-2ft | 6/16/2010 | 2 | <5,700 | <16 | <19 | <22 | <43 | — | <52 | — | — | — | — | — | — | <0.500 | 6.20 | 14.6 | <0.0100 |
| SVP-6-2ft | 6/16/2010 | 2 | <5,700 | <16 | <19 | <22 | <43 | — | <52 | — | — | — | — | — | — | <0.500 | 4.12 | 17.7 | <0.0100 |
| SVP-6-5ft | 6/16/2010 | 5 | <5,700 | <16 | <19 | <22 | <43 | — | <52 | — | — | — | — | — | — | <0.500 | 4.70 | 17.3 | <0.0100 |
| SVP-7-2ft[d] | 6/16/2010 | 2 | <5,700 | <1.6[b] | <19[b] | <2.2[b] | <8.7[b] | <7.2 | <52[b] | 4.9 | 2.5 | 15 | — | — | — | <0.500 | 1.91 | 19.8 | <0.0100 |
| SVP-7-5ft[d] | 6/16/2010 | 5 | <5,700 | <1.6[b] | <19[b] | <2.2[b] | <8.7[b] | <7.2 | <52[b] | <2.4 | <2.5 | 26 | — | — | — | <0.500 | 4.27 | 17.5 | <0.0100 |
| SVP-8-2ft | 6/16/2010 | 2 | <5,700 | <16 | <19 | <22 | <43 | — | <52 | — | — | — | — | — | — | <0.500 | 2.38 | 19.6 | <0.0100 |
| SVP-8-5ft | 6/16/2010 | 5 | <5,700 | <16 | <19 | <22 | <43 | — | <52 | — | — | — | — | — | — | <0.500 | 3.38 | 18.0 | <0.0100 |
| SVP-9-2' | 3/30/2011 | 2 | <7,000 | <16 | <19 | <22 | <43 | — | <52 | — | — | — | — | — | — | <0.500 | 5.90 | 8.83 | <0.0100 |
| SVP-9-4.5' | 3/30/2011 | 4.5 | 18,000 | 52 | <19 | <22 | <43 | — | <52 | — | — | — | — | — | — | <0.500 | 8.34 | 8.68 | <0.0100 |
| *Residential Land Use ESL* | | | *10,000* | *84* | *63,000* | *980* | *21,000* | *9,400* | *72* | *460* | *NA* | *410* | *NA* | *NA* | *NA* | *NA* | *NA* | *NA* | *NA* |
| *Commercial/Industrial Land Use ESL* | | | *29,000* | *280* | *180,000* | *3,300* | *58,000* | *31,000* | *240* | *1,500* | *NA* | *1,400* | *NA* | *NA* | *NA* | *NA* | *NA* | *NA* | *NA* |

HISTORICAL SOIL VAPOR ANALYTICAL DATA
FORMER SHELL SERVICE STATION
2301-2307 LINCOLN AVENUE, ALAMEDA, CALIFORNIA

Notes:

All results in micrograms per cubic meter ($\mu g/m^3$) unless otherwise indicated.
%v = Percent by volume
fbg = Feet below grade
TPHg = Total petroleum hydrocarbons as gasoline by modified EPA Method TO-3M
Benzene, toluene, ethylbenzene and total xylenes analyzed by EPA Method 8260B (M) unless otherwise noted.
MTBE = Methyl tertiary-butyl ether by modified EPA Method TO-15
Naphthalene analyzed by EPA Method EPA Method 8260B (M) unless otherwise noted
Chloroform, dichlorodifluoromethane, and tetrachloroethene analyzed by EPA TO-15M.
Butane, isobutane, and propane by modified EPA Method TO-15
Methane, carbon dioxide, oxygen + argon, and helium analyzed by ASTM D-1946
<x = Not detected at reporting limit x
— = Not analyzed
ESL = Environmental screening level
NA = No applicable ESL
Results in bold equal or exceed ESL

a = Field duplicate
b = Analyzed by modified EPA Method TO-15M
c = San Francisco Bay Regional Water Quality Control Board ESLs for shallow soil gas (Table E of Screening for Environmental Concerns at Sites With Contaminated Soil and Groundwater, California Regional Water Quality Control Board, Interim Final - November 2007 [Revised May 2008])
d = Sample analyzed for full volatile organic compound scan by EPA Method 8260B (M). All detected compounds tabulated.

# WELL CONCENTRATIONS
## Former Shell Service Station
## 2301-2307 Lincoln Avenue
## Alameda, CA

| Well ID | Date | TPPH (ug/L) | TEPH (ug/L) | TPH-M (ug/L) | B (ug/L) | T (ug/L) | E (ug/L) | X (ug/L) | TOC (MSL) | Depth to Water (ft.) | GW Elevation (MSL) |
|---|---|---|---|---|---|---|---|---|---|---|---|
| MW-1 | 03/16/2009 | NA | NA | NA | NA | NA | NA | NA | 25.77 | 8.24 | 17.53 |
| MW-1 | 03/27/2009 | 13,000 | NA | NA | 9.7 | <10 | <10 | <10 | 25.77 | 7.09 | 18.68 |
| MW-1 | 05/22/2009 | 3,900 | NA | NA | 2.6 | <2.0 | <2.0 | <2.0 | 25.77 | 7.70 | 18.07 |
| MW-1 | 09/23/2009 | 17,000 | NA | NA | 8.1 | <10 | <10 | <10 | 25.77 | 9.27 | 16.50 |
| MW-1 | 12/23/2009 | 9,700 | NA | NA | 8.7 | <10 | <10 | <10 | 25.77 | 8.07 | 17.70 |
| MW-1 | 05/05/2010 | 13,000 | 1,700 a | <250 | <5.0 | <10 | <10 | <10 | 25.77 | 6.83 | 18.94 |
| **MW-1** | **09/02/2010** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **25.77** | **8.37** | **17.40** |
| MW-2 | 03/16/2009 | NA | NA | NA | NA | NA | NA | NA | 26.09 | 8.54 | 17.55 |
| MW-2 | 03/27/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.09 | 8.16 | 17.93 |
| MW-2 | 05/22/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.09 | 7.88 | 18.21 |
| MW-2 | 09/23/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.09 | 9.21 | 16.88 |
| MW-2 | 12/23/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.09 | 8.04 | 18.05 |
| MW-2 | 05/05/2010 | <50 | 160 a | <250 | <0.50 | <1.0 | <1.0 | <1.0 | 26.09 | 8.24 | 17.85 |
| **MW-2** | **09/02/2010** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **26.09** | **8.75** | **17.34** |
| MW-3 | 03/16/2009 | NA | NA | NA | NA | NA | NA | NA | 25.56 | 6.06 | 19.50 |
| MW-3 | 03/27/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 25.56 | 6.37 | 19.19 |
| MW-3 | 05/22/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 25.56 | 7.35 | 18.21 |
| MW-3 | 09/23/2009 | 64 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 25.56 | 8.79 | 16.77 |
| MW-3 | 12/23/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 25.56 | 7.62 | 17.94 |
| MW-3 | 05/05/2010 | <50 | <50 | <250 | <0.50 | <1.0 | <1.0 | <1.0 | 25.56 | 6.15 | 19.41 |
| **MW-3** | **09/02/2010** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **25.56** | **8.22** | **17.34** |
| MW-4 | 03/16/2009 | NA | NA | NA | NA | NA | NA | NA | 26.60 | 7.43 | 19.17 |
| MW-4 | 03/27/2009 | 3,900 | NA | NA | 170 | 25 | 190 | 360 | 26.60 | 7.50 | 19.10 |
| MW-4 | 05/22/2009 | 3,500 | NA | NA | 280 | 19 | 270 | 220 | 26.60 | 8.43 | 18.17 |
| MW-4 | 09/23/2009 | 920 | NA | NA | 170 | 3.4 | 14 | 16 | 26.60 | 9.90 | 16.70 |



ATTACHMENT 5

## WELL CONCENTRATIONS
## Former Shell Service Station
## 2301-2307 Lincoln Avenue
## Alameda, CA

| Well ID | Date | TPPH (ug/L) | TEPH (ug/L) | TPH-M (ug/L) | B (ug/L) | T (ug/L) | E (ug/L) | X (ug/L) | TOC (MSL) | Depth to Water (ft.) | GW Elevation (MSL) |
|---|---|---|---|---|---|---|---|---|---|---|---|
| MW-4 | 12/23/2009 | 2,700 | NA | NA | 200 | 5.5 | 190 | 56 | 26.60 | 8.85 | 17.75 |
| MW-4 | 05/05/2010 | 2,600 | 710 a | <250 | 200 | 19 | 200 | 130 | 26.60 | 7.34 | 19.26 |
| **MW-4** | **09/02/2010** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **26.60** | **9.28** | **17.32** |
| MW-5 | 03/16/2009 | NA | NA | NA | NA | NA | NA | NA | 26.63 | 7.21 | 19.42 |
| MW-5 | 03/27/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.63 | 7.74 | 18.89 |
| MW-5 | 05/22/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.63 | 8.42 | 18.21 |
| MW-5 | 09/23/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.63 | 9.89 | 16.74 |
| MW-5 | 12/23/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.63 | 8.81 | 17.82 |
| MW-5 | 05/05/2010 | <50 | <50 | <250 | <0.50 | <1.0 | <1.0 | <1.0 | 26.63 | 7.63 | 19.00 |
| **MW-5** | **09/02/2010** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **26.63** | **9.34** | **17.29** |
| MW-6 | 03/16/2009 | NA | NA | NA | NA | NA | NA | NA | 26.61 | 7.31 | 19.30 |
| MW-6 | 03/27/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.61 | 7.82 | 18.79 |
| MW-6 | 05/22/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.61 | 8.43 | 18.18 |
| MW-6 | 09/23/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.61 | 9.87 | 16.74 |
| MW-6 | 12/23/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.61 | 8.77 | 17.84 |
| MW-6 | 05/05/2010 | <50 | <50 | <250 | <0.50 | <1.0 | <1.0 | <1.0 | 26.61 | 7.91 | 18.70 |
| **MW-6** | **09/02/2010** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **26.61** | **9.36** | **17.25** |
| MW-7 | 03/16/2009 | NA | NA | NA | NA | NA | NA | NA | 26.69 | 7.35 | 19.34 |
| MW-7 | 03/27/2009 | 54 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.69 | 7.62 | 19.07 |
| MW-7 | 05/22/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.69 | 8.50 | 18.19 |
| MW-7 | 09/23/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.69 | 10.00 | 16.69 |
| MW-7 | 12/23/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.69 | 8.86 | 17.83 |
| MW-7 | 05/05/2010 | <50 | <50 | <250 | <0.50 | <1.0 | <1.0 | <1.0 | 26.69 | 7.44 | 19.25 |
| **MW-7** | **09/02/2010** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **26.69** | **9.31** | **17.38** |

# WELL CONCENTRATIONS
## Former Shell Service Station
## 2301-2307 Lincoln Avenue
## Alameda, CA

| Well ID | Date | TPPH (ug/L) | TEPH (ug/L) | TPH-M (ug/L) | B (ug/L) | T (ug/L) | E (ug/L) | X (ug/L) | TOC (MSL) | Depth to Water (ft.) | GW Elevation (MSL) |
|---|---|---|---|---|---|---|---|---|---|---|---|
| MW-8 | 03/16/2009 | NA | NA | NA | NA | NA | NA | NA | 26.05 | 6.81 | 19.24 |
| MW-8 | 03/27/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.05 | 7.04 | 19.01 |
| MW-8 | 05/22/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.05 | 7.76 | 18.29 |
| MW-8 | 09/23/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.05 | 9.27 | 16.78 |
| MW-8 | 12/23/2009 | <50 | NA | NA | <0.50 | <1.0 | <1.0 | <1.0 | 26.05 | 7.98 | 18.07 |
| MW-8 | 05/05/2010 | <50 | <50 | <250 | <0.50 | <1.0 | <1.0 | <1.0 | 26.05 | 6.88 | 19.17 |
| **MW-8** | **09/02/2010** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **NA** | **26.05** | **8.40** | **17.65** |
| MW-9 | 04/21/2010 | NA | NA | NA | NA | NA | NA | NA | 25.70 | 6.74 | 18.96 |
| MW-9 | 05/05/2010 | <50 | <50 | <250 | <0.50 | <1.0 | <1.0 | <1.0 | 25.70 | 7.05 | 18.65 |
| **MW-9** | **09/02/2010** | **<50** | **<50** | **<250** | **<0.50** | **<1.0** | **<1.0** | **<1.0** | **25.70** | **8.25** | **17.45** |

Abbreviations:
TPPH = Total petroleum hydrocarbons as gasoline by EPA Method 8260B
TEPH = Total petroleum hydrocarbons as diesel by modified EPA Method 8015B.
TPH-M = TPH as Motor Oil analyzed by EPA Method 8015B
BTEX = Benzene, toluene, ethylbenzene, xylenes by EPA Method 8260B
TOC = Top of Casing Elevation
GW = Groundwater
DO = Dissolved Oxygen
ug/L = Parts per billion
ppm = Parts per million
MSL = Mean sea level
ft. = Feet
<n = Below detection limit
NA = Not applicable
ND = Not detected

TABLE 2

HISTORICAL GRAB GROUNDWATER ANALYTICAL DATA
FORMER SHELL SERVICE STATION
2301-2307 LINCOLN AVENUE
ALAMEDA, CALIFORNIA

| Sample ID | Date | Depth (fbg) | TPHd | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | MTBE | DIPE | ETBE | TAME | TBA | 1,2-DCA | EDB |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| SB-1W | 7/24/1999 | 8 to 10 | — | <50 | <1 | <1 | <1 | <1 | <5 | — | — | — | — | — | — |
| SB-2W | 7/24/1999 | 8 to 10 | — | <50 | <1 | <1 | <1 | <1 | <5 | — | — | — | — | — | — |
| SB-3W | 7/24/1999 | 8 to 10 | — | 4,500 [a] | <2.5 | <2.5 | <2.5 | <2.5 | <20 | — | — | — | — | — | — |
| SB-4W | 7/24/1999 | 8 to 10 | — | <50 | <1 | <1 | <1 | <1 | <5 | — | — | — | — | — | — |
| SB-6W | 7/24/1999 | 8 to 10 | — | 160 [a] | <1 | <1 | <1 | <1 | <5 | — | — | — | — | — | — |
| EB-1-081607 | 8/16/2007 | 10 to 15 | — | 7,000 | 980 | 11 | 490 | 19 | <5.0 | — | — | — | — | — | — |
| EB-4-081607 | 8/16/2007 | 10 to 15 | — | <50 | <0.5 | <0.5 | <0.5 | <1.0 | <0.5 | — | — | — | — | — | — |
| B-5 (GW@9-13') | 2/27/2009 | 9 to 13 | — | <50 | <0.50 | <1.0 | <1.0 | <1.0 | <1.0 | — | — | — | — | — | — |
| B-7 (GW@9-13') | 2/27/2009 | 9 to 13 | — | 240 | <0.50 | <1.0 | 5.6 | 17 | <1.0 | — | — | — | — | — | — |
| B-8 (GW@9-13') | 2/27/2009 | 9 to 13 | — | 60 | <0.50 | <1.0 | 2.5 | 2.6 | <1.0 | — | — | — | — | — | — |
| MW-4 (GW@31-34') | 2/25/2009 | 31 to 34 | — | 470 | 2.0 | <1.0 | 14 | 16 | <1.0 | — | — | — | — | — | — |
| MW-5 (GW@31-34') | 2/24/2009 | 31 to 34 | — | <50 | <0.50 | <1.0 | <1.0 | <1.0 | <1.0 | — | — | — | — | — | — |
| MW-6 (GW@31-34') | 2/26/2009 | 31 to 34 | — | <50 | <0.50 | <1.0 | <1.0 | <1.0 | <1.0 | — | — | — | — | — | — |
| MW-7 (GW@31-34') | 2/25/2009 | 31 to 34 | — | <50 | <0.50 | <1.0 | <1.0 | <1.0 | <1.0 | — | — | — | — | — | — |
| MW-8 (GW@31-34') | 2/23/2009 | 31 to 34 | — | 94 | <0.50 | <1.0 | <1.0 | <1.0 | <1.0 | — | — | — | — | — | — |

TABLE 2

HISTORICAL GRAB GROUNDWATER ANALYTICAL DATA
FORMER SHELL SERVICE STATION
2301-2307 LINCOLN AVENUE
ALAMEDA, CALIFORNIA

| Sample ID | Date | Depth (fbg) | TPHd | TPHg | Benzene | Toluene | Ethyl-benzene | Total Xylenes | MTBE | DIPE | ETBE | TAME | TBA | 1,2-DCA | EDB |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| B-6 | 7/13/2010 | 10 to 15 | 56[b] | <50 | <0.50 | <1.0 | <1.0 | <1.0 | <1.0 | <2.0 | <2.0 | <2.0 | <10 | <0.50 | <1.0 |
| Groundwater ESL[c] | | | 210 | 210 | 46 | 130 | 43 | 100 | 1,800 | 13 | 18,000 | 200 | 12,000 | 150 | 0.05 |

Notes:

All results in micrograms per liter (µg/l) unless otherwise indicated.

fbg = Feet below grade

TPHd = Total petroleum hydrocarbons as diesel analyzed by EPA Method 8015B

TPHg = Total petroleum hydrocarbons as gasoline analyzed by EPA Method 8260B; before February 27, 2009, analyzed by

Benzene, toluene, ethylbenzene, and xylenes analyzed by EPA Method 8260B

MTBE = Methyl tertiary-butyl ether analyzed by EPA Method 8260B; before August 16, 2007, analyzed by EPA

TBA = Tertiary-butyl alcohol analyzed by EPA Method 8260B

DIPE = Di-isopropyl ether analyzed by EPA Method 8260B

ETBE = Ethyl tertiary-butyl ether analyzed by EPA Method 8260B

TAME = Tertiary-amyl methyl ether analyzed by EPA Method 8260B

1,2-DCA = 1,2-Dichloroethane analyzed by EPA Method 8260B

EDB = 1,2-Dibromoethane analyzed by EPA Method

<x = Not detected at reporting limit x

— = Not analyzed or no applicable ESL

ESL = Environmental screening level

a = Heavier gasoline range compounds are significant (aged gasoline?).

b = 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.

c = San Francisco Bay Regional Water Quality Control Board Environmental Screening Level for groundwater where groundwater is not a source of drinking water (Table B of *Screening for Environmental Concerns at Sites With Contaminated Soil and Groundwater*, California Regional Water Quality Control Board, Interim Final - November 2007 [Revised May 2008]).

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## TABLE 4

## GROUNDWATER SAMPLE RESULTS - VOCs AND TPHg[1]

2301-2307 Lincoln Ave.
Alameda, California

Concentrations in micrograms per liter (µg/L)

| Sample ID | Sample Date | TPHg (C7-C12) | Benzene | Ethyl-benzene | Toluene | Total Xylenes | Methyl tert-Butyl Ether (MTBE) | tert-Butyl Alcohol (TBA) | Isopropyl Ether (DIPE) | Ethyl tert-Butyl Ether (ETBE) | Methyl tert-Amyl Ether (TAME) | 1,2-Dibromo-ethane | 1,2-Dichloro-ethane |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **Groundwater Samples from Wells in Western Tank Area** | | | | | | | | | | | | | |
| MW-1-082407 | 8/24/2007 | 4,100 J[2] | 3.0 | 1.5 | <0.5 | <1.0 | <0.5 | <10 | <0.5 | <0.5 | <0.5 | <0.5 | <0.5 |
| MW-10-082407[3] | 8/24/2007 | 3,500 J | 3.1 | 1.3 | <0.5 | <1.0 | <0.5 | <10 | <0.5 | <0.5 | <0.5 | <0.5 | <0.5 |
| MW-2-082407 | 8/24/2007 | <50 | <0.5 | <0.5 | 0.5 | <1.0 | <0.5 | <10 | <0.5 | <0.5 | <0.5 | <0.5 | <0.5 |
| MW-3-082407 | 8/24/2007 | <50 | <0.5 | <0.5 | <0.5 | <1.0 | <0.5 | <10 | <0.5 | <0.5 | <0.5 | <0.5 | <0.5 |
| **Grab Groundwater Samples from Temporary Borings in Eastern Tank Area** | | | | | | | | | | | | | |
| EB-1-081607 | 8/16/2007 | 7,000 | 980 | 490 | 11 | 19 | <5 | <100 | <5 | <5 | <5 | <5 | <5 |
| EB-4-081607 | 8/16/2007 | <50 | <0.5 | <0.5 | <0.5 | <1.0 | <0.5 | <10 | <0.5 | <0.5 | <0.5 | <0.5 | <0.5 |
| Vapor Intrusion Commerical ESLs[4] | | --[6] | 1,800 | 170,000 | 530,000 | 160,000 | 24,000 | -- | -- | -- | -- | 510 | 690 |
| Commerical ESLs (Gross)[5] | | 5,000 | 20,000 | 300 | 400 | 5,300 | 1,800 | 50,000 | -- | -- | -- | 50,000 | 50,000 |

Notes:

1. Samples analyzed by Curtis & Tompkins, Ltd. for TPHg using U.S. EPA Method 8015M and for select VOCs (BTEX, fuel oxygenates, and fuel additives) using U.S. EPA Method 8260B.
2. "J" indicates the analyte was positively identified; the associated numerical value is the approximate concentration of the analyte in the sample.
3. Blind duplicate sample collected from MW-1.
4. Water Board, 2003, Screening for Environmental Concerns at Sites with Contaminated Soil and Groundwater, Interim Final, Table E-1a, Groundwater screening levels for evaluation of potential vapor intrusion concerns, July (updated November 2007).
5. Water Board, 2003, Screening for Environmental Concerns at Sites with Contaminated Soil and Groundwater, Interim Final, Table F-1b, Gross contamination groundwater screening levels where groundwater is not a current or potential drinking water resource, July (updated November 2007).
6. "--" indicates an ESL has not been established for this constituent.

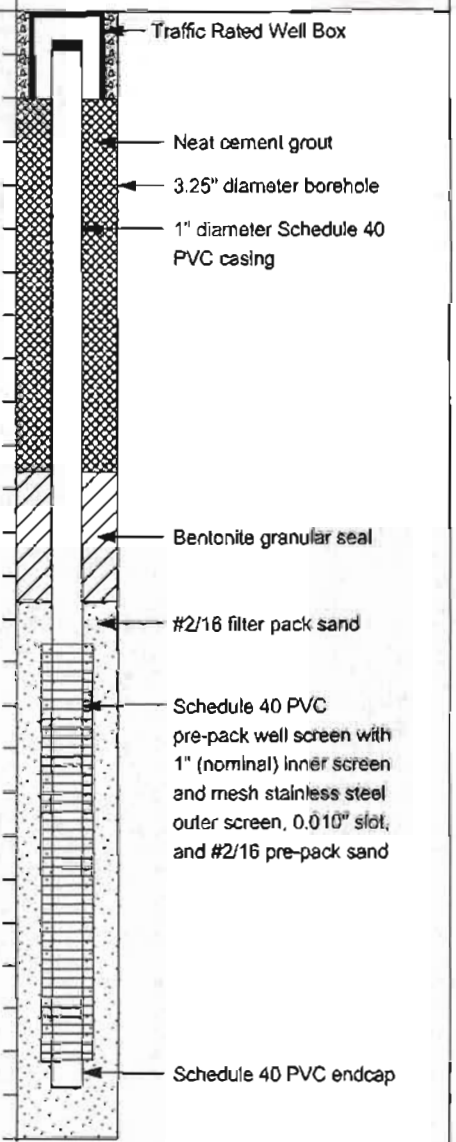
Abbreviations:

ESL = environmental screening level
TPHg = total petroleum hydrocarbons quantified as gasoline
VOCs = volatile organic compounds

| | |
|---|---|
| PROJECT: 2310-2307 LINCOLN AVENUE<br>Alameda, California | **Log of Well No. MW-1** |
| BORING LOCATION: N: 2106525.98; E: 6058071.59 | TOP OF CASING ELEVATION AND DATUM:<br>28.61' MSL (NAVD 88) |
| DRILLING CONTRACTOR: Vironex, Inc. | DATE STARTED: 8/15/07 / DATE FINISHED: 8/15/07 |
| DRILLING METHOD: Direct push | TOTAL DEPTH (ft.): 18.0 / SCREEN INTERVAL (ft.): 7.3-12.1 |
| DRILLING EQUIPMENT: Geoprobe 66DT | DEPTH TO WATER (ft.): FIRST NA, COMPL. 8.4 / CASING: 1" Sch. 40 PVC |
| SAMPLING METHOD: Geoprobe DT-22 dual-tube sampling system [5' x 2.25"] | LOGGED BY: C. Payne |
| HAMMER WEIGHT: NA / DROP: NA | RESPONSIBLE PROFESSIONAL: R. Schultz / REG. NO. CHG 833 |

| DEPTH (feet) | SAMPLES: Sample No. | SAMPLES: Sample | SAMPLES: Blows/ Foot | OVM Reading | DESCRIPTION<br>NAME (USCS): color, moist, % by wt., plast. density, structure, cementation, react. w/HCl, geo. inter. |
|---|---|---|---|---|---|
| | | | | | Surface Elevation: 28.96' MSL |
| 0 | | | | | SANDY SILT (ML): very dark brown (10YR 2/2), moist, 60% fines, 40% fine sand, nonplastic, very soft |
| 1 | | | | | POORLY GRADED SAND with GRAVEL (SP): dark brown (10YR 3/3), moist, 60% fine sand, 25% fine gravel, 5% fines |
| 2 | | | | | POORLY GRADED SAND (SP): dark brown (10YR 3/3), moist, 95% fine sand, 5% fines |
| 3 | MW-1-3.0 | | | | |
| 4 | | | | | |
| 5 | | | | | CLAYEY SAND (SC): dark yellowish brown (10YR 3/4), moist, 65% fine sand, 35% low plasticity fines |
| 5 | MW-1-5.5 | | | 0.7 | POORLY GRADED SAND with SILT (SP-SM): dark yellowish brown (10YR 4/4), moist, 90% fine sand, 10% nonplastic fines |
| 6 | | | | 1.1 | CLAYEY SAND (SC)<br>very dark gray (10GY 2.5/ ) |
| 7 | | | | 23.2 | |
| 8 | MW-1-8.5 | | | | |
| 9 | | | | 1804 | |
| 10 | | | | 1800 | wet |
| 11 | | | | 1872 | |
| 12 | MW-1-12.0 | | | 82 | |
| 13 | | | | 30.7 | olive brown (2.5Y 4/3) |
| 14 | MW-1-14.5 | | | 11.7 | dark yellowish brown (10YR 4/4) |
| 15 | | | | 1.3<br>2.1 | |

WELL CONSTRUCTION DETAILS AND/OR DRILLING REMARKS

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ATTACHMENT 6

PROJECT: 2310-2307 LINCOLN AVENUE
Alameda, California

# Log of Well No. MW-1 (cont'd)

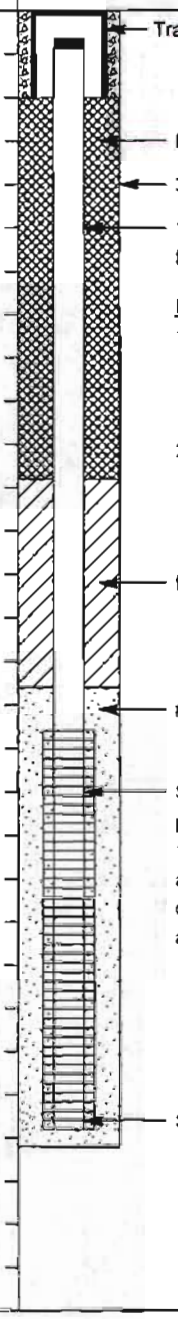
| DEPTH (feet) | SAMPLES: Sample No. | SAMPLES: Sample | SAMPLES: Blows/Foot | OVM Reading | DESCRIPTION<br>NAME (USCS): color, moist, % by wt., plast. density, structure, cementation, react. w/HCl, geo. inter. | WELL CONSTRUCTION DETAILS AND/OR DRILLING REMARKS |
|---|---|---|---|---|---|---|
| 16 | | | | 1.4 | POORLY GRADED SAND with SILT (SP-SM): cont'd | |
| 17 | | | | 1.4 | | |
| 18 | | ⊠ | | 1 | | |
| | | | | | Bottom of boring at 18.0 feet | |
| 19 | | | | | | |
| 20 | | | | | | |
| 21 | | | | | | |
| 22 | | | | | | |
| 23 | | | | | | |
| 24 | | | | | | |
| 25 | | | | | | |
| 26 | | | | | | |
| 27 | | | | | | |
| 28 | | | | | | |
| 29 | | | | | | |
| 30 | | | | | | |
| 31 | | | | | | |
| 32 | | | | | | |
| 33 | | | | | | |

Notes:

1. OVM = MiniRAE 2000 PID calibrated with 100 ppm isobutylene standard.
2. Hand augered to 5 feet bgs. Lithologic descriptions are from cuttings.
3. Lithologic descriptions are from adjacent companion boring, located approximately 3' south of well MW-1.
4. Boring location coordinates based on the California Coordinate System NAD 83, Zone III.

| | |
|---|---|
| PROJECT: 2310-2307 LINCOLN AVENUE<br>Alameda, California | **Log of Well No. MW-2** |
| BORING LOCATION: N: 2106538.71; E: 6058128.88 | TOP OF CASING ELEVATION AND DATUM: 28.94' MSL (NAVD 88) |
| DRILLING CONTRACTOR: Vironex, Inc. | DATE STARTED: 8/15/07 / DATE FINISHED: 8/15/07 |
| DRILLING METHOD: Direct push | TOTAL DEPTH (ft.): 13.1 / SCREEN INTERVAL (ft.): 8.3-12.9 |
| DRILLING EQUIPMENT: Geoprobe 66DT | DEPTH TO WATER (ft.): FIRST NA, COMPL 9.3 / CASING: 1" Sch. 40 PVC |
| SAMPLING METHOD: Geoprobe DT-22 dual-tube sampling system [5' x 2.25"] | LOGGED BY: C. Payne |
| HAMMER WEIGHT: NA / DROP: NA | RESPONSIBLE PROFESSIONAL: R. Schultz / REG. NO. CHG 833 |

| DEPTH (feet) | SAMPLES: Sample No. | SAMPLES: Sample | SAMPLES: Blows/ Foot | OVM Reading | DESCRIPTION<br>NAME (USCS): color, moist, % by wt., plast. density, structure, cementation, react. w/HCl, geo. inter. |
|---|---|---|---|---|---|
| | | | | | Surface Elevation: 29.39' MSL |
| 0 | | | | | ASPHALTIC CONCRETE: (4 inches thick) |
| 1 | | | | | POORLY GRADED GRAVEL with SILT and SAND (GP-GM): dark grayish brown (10YR 4/2), moist, 60% fine to coarse gravel, 30% fine to coarse sand, 10% nonplastic fines [FILL] |
| 2 | | | | | POORLY GRADED SAND with SILT and GRAVEL (SP-SM): dark brown (10YR 3/3), moist, 60% fine to coarse sand, 30% fine to coarse gravel, 10% nonplastic fines, contains brick debris [FILL] |
| 3 | | | | 0 | |
| 4 | | | | 0 | |
| 5 | | | | 0 | contains glass debris, bone and shell fragments, and wood debris |
| 6 | | | | | |
| 7 | | | | | |
| 8 | | | | | |
| 9 | | | | | |
| 10 | | | | | POORLY GRADED GRAVEL WITH CLAY AND SAND (GP-GC): wet |
| 11 | | | | | POORLY GRADED SAND (SP): brown (10YR 4/3), wet, 95% fine to coarse sand, 5% fines |
| 12 | | | | | |
| 13 | | | | | Bottom of boring at 13.0 feet |
| 14 | | | | | |
| 15 | | | | | |




WELL CONSTRUCTION DETAILS AND/OR DRILLING REMARKS

Notes:
1. OVM = MiniRAE 2000 PID calibrated with 100 ppm isobutylene standard.
2. Hand augered to 5 feet bgs. Lithologic descriptions are from cuttings.

| | |
|---|---|
| PROJECT: 2310-2307 LINCOLN AVENUE<br>Alameda, California | **Log of Well No. MW-3** |
| BORING LOCATION: N: 2106567.94; E: 6058106.52 | TOP OF CASING ELEVATION AND DATUM: 28.39' MSL (NAVD 88) |
| DRILLING CONTRACTOR: Vironex, Inc. | DATE STARTED: 8/15/07 / DATE FINISHED: 8/15/07 |
| DRILLING METHOD: Direct push | TOTAL DEPTH (ft.): 13.0 / SCREEN INTERVAL (ft.): 7.5-12.2 |
| DRILLING EQUIPMENT: Geoprobe 66DT | DEPTH TO WATER (ft.): FIRST NA, COMPL 8.4 / CASING: 1" Sch. 40 PVC |
| SAMPLING METHOD: Geoprobe DT-22 dual-tube sampling system [5' x 2.25"] | LOGGED BY: C. Payne |
| HAMMER WEIGHT: NA / DROP: NA | RESPONSIBLE PROFESSIONAL: R. Schultz / REG. NO. CHG 833 |

| DEPTH (feet) | SAMPLES: Sample No. | SAMPLES: Sample | SAMPLES: Blows/ Foot | OVM Reading | DESCRIPTION<br>NAME (USCS): color, moist, % by wt., plast. density, structure, cementation, react. w/HCl, geo. inter. | WELL CONSTRUCTION DETAILS AND/OR DRILLING REMARKS |
|---|---|---|---|---|---|---|
| | | | | | Surface Elevation: 29.09' MSL | |
| 0 | | | | | ASPHALTIC CONCRETE: (4 inches thick) | Traffic Rated Well Box |
| 1 | | | | 0 | POORLY GRADED GRAVEL with SILT and SAND (GP-GM): dark grayish brown (10YR 4/2), moist, 60% fine to coarse gravel, 30% fine to coarse sand, 10% nonplastic fines [FILL] | Neat cement grout |
| 2 | | | | | | 3.25" diameter borehole |
| 3 | | | | 0 | POORLY GRADED SAND with SILT and GRAVEL (SP-SM): dark brown (10YR 3/3), moist, 60% fine to coarse sand, 30% fine to coarse gravel, 10% nonplastic fines [FILL] | 1" diameter Schedule 40 PVC casing |
| 4 | | | | | POORLY GRADED SAND (SP): dark yellowish brown (10YR 4/4), moist, 95% fine sand, 5% fines | Notes:<br>1. OVM = MiniRAE 2000 PID calibrated with 100 ppm isobutylene standard<br>2. Hand augered to 5 feet bgs. Lithologic descriptions are from cuttings. |
| 5 | | | | 0 | dark yellowish brown (10YR 3/4) | |
| 6 | | | | | CLAYEY SAND (SC) | Bentonite granular seal |
| 7 | MW-2-7.0 | | | 0 | CLAYEY SAND (SC) | #2/16 filter pack sand |
| 8 | | | | | CLAYEY SAND (SC) | |
| 9 | | | | | | Schedule 40 PVC pre-pack well screen with 1" (nominal) inner screen and mesh stainless steel outer screen, 0.010" slot, and #2/16 pre-pack sand |
| 10 | MW-2-10.5 | | | 0 | mottled dark yellowish brown (10YR 3/4) and brown (10YR 5/3)<br>wet | |
| 11 | | | | | | |
| 12 | | | | 0 | brown (10YR 5/3) | Schedule 40 PVC endcap |
| 13 | | | | 0 | | |
| 14 | | | | | Bottom of boring at 13.1 feet | |
| 15 | | | | | | |

Conestoga-Rovers & Associates
5900 Hollis Street, Suite A
Emeryville, CA 94608
Telephone: 510-420-0700
Fax: 510-420-9170

# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | MW-4 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 17-Feb-09 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 25-Feb-09 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Direct-push & hollow-stem auger | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 10", 2" below 18 fbg. | SCREENED INTERVALS | 8 to 18 fbg |
| LOGGED BY | E. Reinhart | DEPTH TO WATER (First Encountered) | 9.00 fbg |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA |
| REMARKS | Air knifed to 5 fbg | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | **ASPHALT** | 0.3 | Portland Type I/II |
| 0.0 | | | | | | | Silty SAND with gravel (SM) ; very dark brown (7.5YR 2.5/3); dry; 25% silt, 45% fine to medium sand, 30% gravel; fill. | | 4" diam., Schedule 40 PVC |
| | | | | | | | @ 3' - Silty SAND (SM) ; 25% silt, 65% fine to medium sand, 10% gravel. | | Bentonite Seal |
| | | MW-4-5' | | 5 | | | @ 5'- brown (10YR 4/3), 35% silt, 65% fine to medium sand. | | Monterey Sand #2/12 |
| | | | | | | | @ 7'- 25% silt, 75% sand. | | |
| 3.6 | | MW-4-8' | | | | | @ 8' - dark greenish gray (5GY 4/1); moist. | | |
| | | | | | | | @ 9'- wet. | | |
| 454 | | | | 10 | SM | | | | |
| | | | | | | | @ 11.5' - light olive brown (2.5Y 5/4); 30% silt, 70% fine sand. | | |
| 4.6 | | | | | | | | | 4"-diam., 0.020" Slotted Schedule 40 PVC |
| 2.1 | | | | | | | | | |
| 1.7 | | | | 15 | | | | | |
| | | | | | | | @ 16' - 25% silt, 75% fine sand. | | |
| 1.4 | | | | | | | | | |
| 0.0 | | | | | | | @ 19' - 20% silt, 80% fine to medium sand. | | |
| | | | | 20 | | | | 20.0 | |

Continued Next Page

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| **CLIENT NAME** | Shell Oil Products US | **BORING/WELL NAME** | MW-4 |
| **JOB/SITE NAME** | Former Shell Service Station | **DRILLING STARTED** | 17-Feb-09 |
| **LOCATION** | 2301-2307 Lincoln Avenue, Alameda, CA | **DRILLING COMPLETED** | 25-Feb-09 |

*Continued from Previous Page*

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| 0.0 | | | | | | | @ 21' - 25% silt, 75% fine to medium sand. | | |
| 0.0 | | | | | | | | | |
| 0.0 | | | | | | | @ 24' - 20% silt, 80% fine to medium sand. | | |
| 0.0 | | | | 25 | SM | | @ 25' - olive brown (2.5Y 4/3); 20% silt, 80% fine sand. | | Bentonite Seal |
| 0.0 | | | | | | | @ 28' - light olive brown (2.5Y 5/3). | | |
| 0.0 | | | | | | | @ 29' - 30% silt, 70% fine sand. | | |
| 0.0 | | | | 30 | | | @ 30' - light olive brown (2.5Y 5/3). | 31.0 | |
| | | MW-4 GW@31 -34' | | | | | @ 31-34' -Groundwater grab sample collected. No lithologic log. | 34.0 | Bottom of Boring @ 34 fbg |

WELL LOG (PID) L:\SHELL\6-CHARS\0602--\060204--\108486B--1\060204-GINT.GPJ DEFAULT.GDT 4/1/09

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | MW-5 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 18-Feb-09 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 24-Feb-09 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Direct-push & hollow-stem auger | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 10", 2" below 18 fbg. | SCREENED INTERVALS | 8 to 18 fbg |
| LOGGED BY | E. Reinhart | DEPTH TO WATER (First Encountered) | 10.00 fbg |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA |
| REMARKS | Air knifed to 5 fbg | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | **ASPHALT** | 0.3 | Portland Type I/II |
| 0.0 | | | | | | | Silty SAND (SM); very dark brown (7.5YR 2.5/3); dry; 25% silt, 75% fine to medium sand. | | 4" diam., Schedule 40 PVC |
| 0.0 | | MW-5- 5' | | 5 | | | @ 5' - strong brown (7.5YR 4/6); 30% silt, 70% fine to medium sand. | | Bentonite Seal |
| 0.0 | | MW-5- 8' | | | | | @ 8' - moist. | | Monterey Sand #2/12 |
| | | | | | | | @ 9- wet; 25% silt, 75% fine to medium sand. | | |
| 0.0 | | | | 10 | SM | | @ 10' - brown (7.5YR 4/4); 30% silt, 70% fine sand. | | |
| 0.0 | | | | | | | | | |
| 0.0 | | | | | | | | | 4"-diam., 0.020" Slotted Schedule 40 PVC |
| | | | | | | | @ 14' - yellowish brown (10YR 5/4); | | |
| 0.0 | | | | 15 | | | | | |
| 0.0 | | | | | | | | | |
| 0.0 | | | | | | | | | |
| | | | | 20 | | | | 20.0 | |

WELL LOG (PID) L:\SHELL\B-CHARS\0602--\060204--10648E9--10060204-GINT.GPJ DEFAULT.GDT 4/1/09

Continued Next Page

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | MW-5 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 18-Feb-09 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 24-Feb-09 |

*Continued from Previous Page*

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| 0.0 | | | | | | | | | |
| 0.0 | | | | | | | @ 23' - 30% silt, 70% fine to medium sand. | | |
| 0.0 | | | | 25 | | | | | |
| 0.0 | | | | | SM | | | | Bentonite Seal |
| 0.0 | | | | | | | @ 28' - 40% silt, 60% fine sand. | | |
| 0.0 | | | | | | | @ 29' - brown (10YR 4/3); 20% silt, 80% fine to medium sand. | | |
| 0.0 | | | | 30 | | | @ 30' - brown (10YR 5/3). | | |
| | | MW-5 GW@31-34' | | | | | @ 31-34' -Groundwater grab sample collected. No lithologic log. | 31.0 | |
| | | | | | | | | 34.0 | Bottom of Boring @ 34 fbg |

WELL LOG (PID) I:\SHELL\6-CHARS\10802-060204-106848E9-1060204-GINT.GPJ DEFAULT.GDT 4/1/09

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | MW-6 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 19-Feb-09 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 21-Feb-09 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485185 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Direct-push & hollow-stem auger | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 10", 2" below 18 fbg. | SCREENED INTERVALS | 8 to 18 fbg |
| LOGGED BY | E. Reinhart | DEPTH TO WATER (First Encountered) | 9.00 fbg ▽ |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA ▼ |
| REMARKS | Air knifed to 5 fbg | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | ASPHALT | 0.3 | Portland Type I/II |
| 0.0 | | | | | | | Silty SAND (SM); very dark brown (7.5YR 2.5/3); dry; 25% silt, 75% fine to medium sand. | | 4" diam., Schedule 40 PVC |
| 0.0 | | MW-6- 5' | | 5 | | | @ 5' - yellowish brown (10YR 5/4). | | Bentonite Seal |
| | | | | | | | @ 7' - moist. | | Monterey Sand #2/12 |
| 0.0 | | MW-6- 8' | | | | | | | |
| 0.0 | | | | | | | @ 9' - wet. ▽ | | |
| 0.0 | | | | 10 | SM | | @ 10' - 20% silt, 80% fine to medium sand. | | |
| 0.0 | | | | | | | | | 4"-diam., 0.020" Slotted Schedule 40 PVC |
| 0.0 | | | | | | | @ 14' - 20% silt, 80% fine sand. | | |
| 0.0 | | | | 15 | | | @ 15' - 20% silt, 80% fine to medium sand. | | |
| 0.0 | | | | | | | | | |
| 0.0 | | | | | | | | | |
| | | | | 20 | | | | 20.0 | |

WELL LOG (PID): I:\SHELL\B-CHARS\0602--\060204-1\060204-GINT.GPJ DEFAULT.GDT 4/1/09

Continued Next Page

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| **CLIENT NAME** | Shell Oil Products US | **BORING/WELL NAME** | MW-6 |
| **JOB/SITE NAME** | Former Shell Service Station | **DRILLING STARTED** | 19-Feb-09 |
| **LOCATION** | 2301-2307 Lincoln Avenue, Alameda, CA | **DRILLING COMPLETED** | 21-Feb-09 |

*Continued from Previous Page*

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| 0.0 | | | | | | | @ 20' - dark yellowish brown (10YR 4/4); 25% silt, 75% fine to medium sand. | | |
| 0.0 | | | | | | | | | |
| 0.0 | | | | | | | | | |
| 0.0 | | | | 25 | SM | | @ 25' - light olive brown (2.5Y 5/4); 25% silt, 75% fine sand. | | Bentonite Seal |
| | | | | | | | @ 27' - no recovery. | | |
| 0.0 | | | | | | | @ 29' -dark grayish brown (2.5Y 4/2); 20% silt, 80% fine to medium sand. | | |
| 0.0 | | | | 30 | | | | | |
| | | MW-6 GW@31 -34' | | | | | @ 31-34' -Groundwater grab sample collected. No lithologic log. | 31.0 | |
| | | | | | | | | 34.0 | Bottom of Boring @ 34 fbg |

WELL LOG (PID) I:\SHELL\6-CHARS\0802--0802O4--10648ES--1080204-GINT.GPJ DEFAULT.GDT 4/1/09

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | MW-7 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 17-Feb-09 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 25-Feb-09 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Direct-push & hollow-stem auger | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 10", 2" below 18 fbg. | SCREENED INTERVALS | 8 to 18 fbg |
| LOGGED BY | E. Reinhart | DEPTH TO WATER (First Encountered) | 10.00 fbg |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA |
| REMARKS | Air knifed to 5 fbg | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| 0.0 | | | | | | | **ASPHALT** | 0.3 | Portland Type I/II |
| | | | | | | | Silty SAND with gravel (SM) ; very dark brown (7.5YR 2.5/3); dry; 25% silt, 45% fine to medium sand, 30% gravel; fill with asphalt pieces. | | 4" diam., Schedule 40 PVC |
| 0.0 | | | | | | | @ 3' - Silty SAND (SM) ; very dark brown (7.5YR 2.5/3); 25% silt, 65% fine to medium sand, 10% fine gravel. | | |
| 0.0 | | MW-7-5' | | 5 | | | @ 5' - dark yellowish brown (10YR 4/4); 20% silt, 80% fine to medium sand. | | Bentonite Seal |
| 0.0 | | MW-7-8' | | | | | @ 8' - moist. | | Monterey Sand #2/12 |
| 0.0 | | | | 10 | SM | | @ 10' - light olive brown (2.5Y 5/4); wet; 30% silt, 70% fine to medium sand. | | |
| 0.0 | | | | | | | | | 4"-diam., 0.020" Slotted Schedule 40 PVC |
| 0.0 | | | | 15 | | | @ 15' - 30% silt, 70% fine sand. | | |
| 0.0 | | | | | | | @ 17' - dark yellowish brown (10YR 4/6); 20% silt, 80% fine to medium sand. | | |
| 0.0 | | | | 20 | | | | 20.0 | |

Continued Next Page

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| **CLIENT NAME** | Shell Oil Products US | **BORING/WELL NAME** | MW-7 |
| **JOB/SITE NAME** | Former Shell Service Station | **DRILLING STARTED** | 17-Feb-09 |
| **LOCATION** | 2301-2307 Lincoln Avenue, Alameda, CA | **DRILLING COMPLETED** | 25-Feb-09 |

*Continued from Previous Page*

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| 0.0 | | | | | | | | | |
| 0.0 | | | | | | | @ 22' - light olive brown (2.5Y 5/3). | | |
| 0.0 | | | | | | | @ 24' - light olive brown (2.5Y 5/4). | | |
| 0.0 | | | | 25 | SM | | | | Bentonite Seal |
| 0.0 | | | | | | | | | |
| 0.0 | | | | | | | @ 29' - olive gray (5Y 5/2); 30% silt, 70% fine sand. | | |
| 0.0 | | | | 30 | | | @ 30' - olive gray (5Y 4/2); 20% silt, 80% fine to medium sand. | | |
| | | MW-7 GW@31-34' | | | | | @ 31-34' -Groundwater grab sample collected. No lithologic log. | 31.0 | |
| | | | | | | | | 34.0 | Bottom of Boring @ 34 fbg |

WELL LOG (PID) I:\SHELL\6-CHARS\0602--1062204--1V\0848E9--1062204-GINT.GPJ DEFAULT.GDT 4/1/09

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | MW-8 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 17-Feb-09 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 23-Feb-09 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Direct-push & hollow-stem auger | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 10", 2" below 18 fbg. | SCREENED INTERVALS | 8 to 18 fbg |
| LOGGED BY | E. Reinhart | DEPTH TO WATER (First Encountered) | 9.00 fbg |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA |
| REMARKS | Air knifed to 5 fbg | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | ASPHALT | 0.3 | Portland Type I/II |
| 0.0 | | | | | | | Silty SAND (SM); very dark brown (7.5YR 2.5/3); dry; 25% silt, 65% fine to medium sand, 10% fine gravel. | | 4" diam., Schedule 40 PVC |
| 0.0 | | MW-8-5' | | 5 | | | @ 5' - brown (10YR 4/3). | | Bentonite Seal |
| | | | | | | | @ 6' - 30% silt, 70% fine sand. | | |
| 0.4 | | | | | | | @ 7' - moist. | | Monterey Sand #2/12 |
| 0.0 | | MW-8-8' | | | | | | | |
| | | | | | | | @ 9'- wet. | | |
| 0.0 | | | | 10 | SM | | @ 10' - strong brown (7.5YR 5/6). | | 4"-diam., 0.020" Slotted Schedule 40 PVC |
| 0.0 | | | | | | | | | |
| 1.3 | | | | 15 | | | @ 15' - 30% silt, 70% fine to medium sand. | | |
| | | | | | | | @ 17' - brown (7.5YR 4/2). | | |
| 0.0 | | | | 20 | | | | 20.0 | |

WELL LOG (PID) L:\SHELL\6-CHARS\0602-060204-110848E9--1060204-GINT.GPJ DEFAULT.GDT 4/1/09

*Continued Next Page*

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| **CLIENT NAME** | Shell Oil Products US | **BORING/WELL NAME** | MW-8 |
| **JOB/SITE NAME** | Former Shell Service Station | **DRILLING STARTED** | 17-Feb-09 |
| **LOCATION** | 2301-2307 Lincoln Avenue, Alameda, CA | **DRILLING COMPLETED** | 23-Feb-09 |

*Continued from Previous Page*

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| 0.4 | | | | | | | @ 20' - olive brown (2.5Y 4/4). | | |
| 0.0 | | | | | | | | | |
| 0.0 | | | | 25 | SM | | @ 25' - 15% silt, 85% fine to medium sand. | | Bentonite Seal |
| | | | | | | | @ 27' - dark gray (2.5Y 4/1); 45% silt, 55% fine to medium sand. | | |
| 0.0 | | | | | | | @ 28' - 30% silt, 70% fine to medium sand. | | |
| 0.0 | | | | | | | @ 29' - olive brown (2.5Y 4/3). | | |
| 0.0 | | | | 30 | | | @ 30' - brown (10YR 4/3); 20% silt, 80% fine to medium sand. | | |
| | | MW-8 GW@31-34' | | | | | @ 31-34' -Groundwater grab sample collected. No lithologic log. | 31.0 | |
| | | | | | | | | 34.0 | Bottom of Boring @ 34 fbg |

WELL LOG (PID) I:\SHELL\6-CHARS\0802-X060204-1084SES-1\X060204-GINT.GPJ DEFAULT.GDT 4/1/09

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | MW-9 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 23-Mar-10 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 25-Mar-10 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | 21-Apr-10 (72 gallons) |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | 26.04 ft above msl |
| DRILLING METHOD | Hollow-stem auger | TOP OF CASING ELEVATION | 25.70 ft above msl |
| BORING DIAMETER | 10" | SCREENED INTERVALS | 8 to 18 fbg |
| LOGGED BY | S. Lewis | DEPTH TO WATER (First Encountered) | 9.00 fbg |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | 6.74 fbg |
| REMARKS | | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | ASPHALT | 0.3 | |
| | | | | | | | Silty SAND (SM); Brown (10YR 4/3); moist; 15% silt, 85% fine grained sand. | | |
| | | | | 5 | | | @ 5' - moist. | | |
| 0.3 | | MW-9-5.5 | | | | | | | |
| 0.0 | | MW-9-8.5 | | | SM | | @ 9' - wet. | | |
| | | | | 10 | | | @ 10' - Yellowish brown (10YR 5/4). | | |
| 0.3 | | MW-9-12 | | | | | | | |
| | | | | 15 | | | | | |
| | | MW-9-17.5 | | | | | | 18.0 | Bottom of Boring @ 18 fbg |

WELL LOG (PID) I:\SHELL\6-CHARS\0602-060204-1068469-11060204-1.GPJ DEFAULT.GDT 5/6/10

# Geologic Log

| | | | |
|---|---|---|---|
| PROJECT NO: 99-ENV168A | BORING NO: SB-1 | SHEET 1 OF 1 | |

CLIENT: MR. ALLAN A. SEABANC
SITE: 2301-2307 Lincoln Avenue, Alameda, California

LOGGED BY: Jennifer Pucci
CHECKED BY: Marda T. Herbert, R.G., C.E.G.
DATE: 7/24/99

DATE(S) DRILLED: 7/24/99
DATE(S) WELL INSTALLED:
BORING DIA: 2"
TOTAL DEPTH: 10ft.

GROUND ELEV:
T.O.C. ELEV:
DEPTH/ELEV. GROUND WATER (ATD): 8ft.

DRILLING CO: Fast-Tek, Inc.
DRILLER: TF
DRILLING EQUIP: Geoprobe

COORDINATES:
SAMPLING INFORMATION:

DRILLING SUMMARY: Continous core advanced to 10 feet in depth; soil sample collected at 5' and 7.5'. Screened with PVC liner. Ground water encountered at 8'. Backfilled with neat cement slurry.

| Sample No. | Recovery | Well Diagram | Depth Elev. | Graphic Log | Sample | Lithologic Description Description, Color, Density, Moisture |
|---|---|---|---|---|---|---|
| | 3.0 for 4.0 | | 0 | | | GROUND SURFACE<br>SAND (SP) - fine grained, medium brown, no moisture, no odor |
| SB-1 @5' | 4.0 for 4.0 | | 5 | | | As Above |
| SB-1 @7.5' | | ▽ Approximate ground water level. | | | | As Above, slightly moist |
| | | | 10 | | | End Boring at 10 feet below ground surface. |
| | | | 15 | | | |
| | | | 20 | | | |
| | | | 25 | | | |
| | | | 30 | | | |
| | | | 35 | | | |

basics environmental

# Geologic Log

| | | | |
|---|---|---|---|
| PROJECT NO: 99-ENV168A | BORING NO: SB-2 | SHEET 1 OF 1 | |

| | | | |
|---|---|---|---|
| CLIENT:. MR. ALLAN A. SEABANC | | SITE: 2301-2307 Lincoln Avenue, Alameda, California | |
| LOGGED BY: Jennifer Pucci | CHECKED BY: Marda T. Herbert, R.G., C.E.G. | | DATE: 7/24/99 |
| DATE(S) DRILLED: 7/24/99 | DATE(S) WELL INSTALLED: | BORING DIA: 2" | TOTAL DEPTH: 10ft. |
| GROUND ELEV: | T.O.C. ELEV: | DEPTH/ELEV. GROUND WATER (ATD): 8ft. | |
| DRILLING CO: Fast-Tak, Inc. | DRILLER: TF | DRILLING EQUIP: Geoprobe | |
| COORDINATES: | | SAMPLING INFORMATION: | |

DRILLING SUMMARY: Continous core advanced to 10 feet in depth: soil sample collected at 5' and 7.5'. Screened with PVC liner. Ground water encountered at 8'. Backfilled with neat cement slurry.

| Sample No. | Recovery | Well Diagram | Depth Elev. | Graphic Log | Sample | Lithologic Description Description, Color, Density, Moisture |
|---|---|---|---|---|---|---|
| | 3.0 for 4.0 | | 0 | | | GROUND SURFACE<br>SAND (SP) - fine grained, medium brown, no moisture, no odor |
| SB-2 @5' | 4.0 for 4.0 | | 5 | | | As Above |
| SB-2 @7.5' | | ▽ Approximate ground water level. | | | | As Above |
| | | | 10 | | | End Boring at 10 feet below ground surface. |
| | | | 15 | | | |
| | | | 20 | | | |
| | | | 25 | | | |
| | | | 30 | | | |
| | | | 35 | | | |

basics environmental

# Geologic Log

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|---|---|---|---|
| PROJECT NO: 99-ENV168A | BORING NO: SB-3 | SHEET 1 OF 1 | |

| | | | |
|---|---|---|---|
| CLIENT: MR. ALLAN A. SEABANC | SITE: 2301-2307 Lincoln Avenue, Alameda, California | | |
| LOGGED BY: Jennifer Pucci | CHECKED BY: Marda T. Herbert, R.G., C.E.G. | DATE: 7/24/99 | |
| DATE(S) DRILLED: 7/24/99 | DATE(S) WELL INSTALLED: | BORING DIA: 2" | TOTAL DEPTH: 10ft. |
| GROUND ELEV: | T.O.C. ELEV: | DEPTH/ELEV. GROUND WATER (ATD); 8ft. | |
| DRILLING CO: Fast-Tek, Inc. | DRILLER: TF | DRILLING EQUIP: Geoprobe | |
| COORDINATES: | SAMPLING INFORMATION: | | |

DRILLING SUMMARY: Continous core advanced to 10 feet in depth; soil sample collected at 5' and 7.5'. Screened with PVC liner. Ground water encountered at 8'. Backfilled with neat cement slurry.

| | | Well Diagram | Depth Elev. | Lithologic Description. Description, Color, Density, Moisture |
|---|---|---|---|---|
| | 3.0 for 4.0 | | 0 | GROUND SURFACE<br>SAND (SP) - fine grained, medium brown, no moisture, no odor |
| SB-3 @5' | 4.0 for 4.0 | | 5 | As Above, color change, greenish |
| SB-3 @7.5' | | ▽ Approximate ground water level. | 10 | SILTY SAND (SM) - fine grained, 30% fines, 70% sand, soil staining, hydrocarbon odor |
| | | | | End Boring at 10 feet below ground surface. |
| | | | 15 | |
| | | | 20 | |
| | | | 25 | |
| | | | 30 | |
| | | | 35 | |

basics environmental

# Geologic Log

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|---|---|---|---|
| PROJECT NO: 99-ENV168A | BORING NO: SB-4 | SHEET 1 OF 1 | |
| CLIENT: MR. ALLAN A. SEABANC | SITE: 2301-2307 Lincoln Avenue, Alameda, California | | |
| LOGGED BY: Jennifer Pucci | CHECKED BY: Marda T. Herbert, R.G., C.E.G. | DATE: 7/24/99 | |
| DATE(S) DRILLED: 7/24/99 | DATE(S) WELL INSTALLED: | BORING DIA: 2" | TOTAL DEPTH: 10ft. |
| GROUND ELEV: | T.O.C. ELEV: | DEPTH/ELEV. GROUND WATER (ATD): 8ft. | |
| DRILLING CO: Fast-Tek, Inc. | DRILLER: TF | DRILLING EQUIP: Geoprobe | |
| COORDINATES: | SAMPLING INFORMATION: | | |

DRILLING SUMMARY: Continous core advanced to 10 feet in depth; soil sample collected at 5' and 7.5'. Screened with PVC liner. Ground water encountered at 8'. Backfilled with neat cement slurry.

| | | Well Diagram | Depth Elev. | | | Lithologic Description Description, Color, Density, Moisture |
|---|---|---|---|---|---|---|
| | 3.0 for 4.0 | | 0 | | | ASPHALT SURFACE<br>SAND (SP) - fine grained, medium brown, no moisture, no odor |
| SB-4 @5' | 3.0 for 4.0 | | 5 | | | As Above |
| SB-4 @7.5' | | ▽ Approximate ground water level. | 10 | | | As Above, moist |
| | | | | | | End Boring at 10 feet below ground surface. |
| | | | 15 | | | |
| | | | 20 | | | |
| | | | 25 | | | |
| | | | 30 | | | |
| | | | 35 | | | |

basics environmental

# Geologic Log

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|---|---|---|---|
| PROJECT NO: 99-ENV168A | BORING NO: SB-6 | SHEET 1 OF 1 | |

| | | | |
|---|---|---|---|
| CLIENT: MR. ALLAN A. SEABANC | | SITE: 2301-2307 Lincoln Avenue, Alameda, California | |
| LOGGED BY: Jennifer Pucci | CHECKED BY: Marda T. Herbert, R.G., C.E.G. | | DATE: 7/24/99 |
| DATE(S) DRILLED: 7/24/99 | DATE(S) WELL INSTALLED: | BORING DIA: 2" | TOTAL DEPTH: 10ft. |
| GROUND ELEV: | T.O.C. ELEV: | DEPTH/ELEV. GROUND WATER (ATD): 8ft. | |
| DRILLING CO: Fast-Tek, Inc. | DRILLER: TF | DRILLING EQUIP: Geoprobe | |
| COORDINATES: | | SAMPLING INFORMATION: | |

DRILLING SUMMARY: Continous core advanced to 10 feet in depth: soil sample collected at 5' and 10'. Screened with PVC liner. Ground water encountered at 8'. Backfilled with neat cement slurry.

| | | Well Diagram | Depth Elev. | | Lithologic Description Description, Color, Density, Moisture |
|---|---|---|---|---|---|
| | | | 0 | | ASPHALT SURFACE |
| | 3.0 for 4.0 | | | | SAND (SP) - Firm, well graded; medium brown, no moisture, no odor |
| SB-6 @5' | | | 5 | | As Above |
| | 3.0 for 4.0 | | | | |
| | | ▽ Approximate ground water level. | | | As Above, moist |
| SB-6 @10' | | | 10 | | As Above, color change, gray |
| | | | | | End Boring at 10 feet below ground surface. |
| | | | 15 | | |
| | | | 20 | | |
| | | | 25 | | |
| | | | 30 | | |
| | | | 35 | | |

basics environmental

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|---|---|
| PROJECT: 2310-2307 LINCOLN AVENUE<br>Alameda, California | **Log of Boring No. EB-1** |
| BORING LOCATION: N: 2106513.72; E: 6058187.37 | ELEVATION AND DATUM: Not surveyed; datum is ground surface |
| DRILLING CONTRACTOR: Vironex, Inc. | DATE STARTED: 8/15/07 / DATE FINISHED: 8/15/07 |
| DRILLING METHOD: Direct push | TOTAL DEPTH (ft.): 15.0 / MEASURING POINT: Ground surface |
| DRILLING EQUIPMENT: Geoprobe 66DT | DEPTH TO WATER (ft.) FIRST: NA / COMPL.: NA |
| SAMPLING METHOD: Geoprobe DT21 dual-tube sampling system [4' x 1.25"] | LOGGED BY: C. Payne |
| HAMMER WEIGHT: NA / DROP: NA | RESPONSIBLE PROFESSIONAL: R. Schultz / REG. NO.: CHG 833 |

| DEPTH (feet) | SAMPLES: Sample No. | SAMPLES: Sample | SAMPLES: Blows/ Foot | OVM READING (ppm) | DESCRIPTION<br>NAME (USCS): color, moist, % by wt., plast. density, structure, cementation, react. w/HCl, geo. inter.<br>Surface Elevation: Not surveyed | REMARKS |
|---|---|---|---|---|---|---|
| 0 | | | | | ASPHALTIC CONCRETE : (4 inches thick) | |
| 1 | | | | | POORLY GRADED GRAVEL with SILT and SAND (GP-GM): dark brown (10YR 3/3), moist, 60% fine to coarse gravel, 30% fine to coarse sand, 10% nonplastic fines [FILL] | OVM = MiniRAE 2000 PID calibrated with 100 ppm isobutylene standard. |
| | | | | 3.1 | | |
| 2 | | | | | POORLY GRADED SAND with SILT and GRAVEL (SP-SM): dark yellowish brown (10YR 3/4), moist, 70% fine to coarse sand, 20% fine to coarse gravel, 10% nonplastic fines | |
| | | | | 1.6 | | |
| | | | | 0.6 | POORLY GRADED GRAVEL with SAND and SILT (SP-SM) | |
| 3 | | | | 0 6 | very dark brown (10YR 2/2) | |
| | EB-1-4 | | | | greenish black (10Y 2.5/1) | Hand augered to 5 feet bgs; cuttings logged for lithology. |
| 4 | | | | 188 | | |
| 5 | | | | 153 | | Boring location coordinates based on the California Coordinate System NAD 83, Zone III. |
| 6 | | | | | POORLY GRADED GRAVEL with SAND (GP) | |
| | | | | 423 | POORLY GRADED SAND with SILT (SP-SM): greenish black (5GY 2.5/1), moist, 90% fine sand, 10% nonplastic fines | |
| 7 | | | | 98.1 | | |
| 8 | | | | | | Grab groundwater sample EB-1-081607 collected through 5 feet of 1-inch OD Sch. 40 PVC screen (0.010-inch slot size) placed in borehole from 10 to 15 feet bgs. Drive casing retracted from bottom of boring to 10 feet bgs to maintain surface seal. |
| 9 | | | | | | |
| 10 | EB-1-10.5 | | | | dark greenish gray (10BG 4/1) | |
| | | | | 1588 | | |
| 11 | | | | | wet | |
| | | | | 62 | | |
| 12 | | | | | | |
| | | | | 11.2 | yellowish brown (10YR 5/4) | |
| 13 | | | | | | Borehole destroyed using Type I-II neat cement grout placed from total depth to ground surface with a tremie pipe. |
| 14 | EB-1-14 | | | 3.9 | | |
| 15 | | | | | Bottom of boring at 15.0 feet | |

OAKBOREV (REV. 8/2007)

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|---|---|
| PROJECT: 2310-2307 LINCOLN AVENUE<br>Alameda, California | **Log of Boring No. EB-2** |
| BORING LOCATION: N: 2106499.42; E: 6058183.62 | ELEVATION AND DATUM: Not surveyed; datum is ground surface |
| DRILLING CONTRACTOR: Vironex, Inc. | DATE STARTED: 8/16/07 / DATE FINISHED: 8/16/07 |
| DRILLING METHOD: Direct push | TOTAL DEPTH (ft.): 15.0 / MEASURING POINT: Ground surface |
| DRILLING EQUIPMENT: Geoprobe 66DT | DEPTH TO WATER (ft.) FIRST: NA / COMPL.: NA |
| SAMPLING METHOD: Geoprobe DT21 dual-tube sampling system [4' x 1.25"] | LOGGED BY: C. Payne |
| HAMMER WEIGHT: NA / DROP: NA | RESPONSIBLE PROFESSIONAL: R. Schultz / REG. NO. CHG 833 |

| DEPTH (feet) | SAMPLES: Sample No. | SAMPLES: Sample | SAMPLES: Blows/ Foot | OVM READING (ppm) | DESCRIPTION<br>NAME (USCS): color, moist, % by wt., plast. density, structure, cementation, react. w/HCl, geo. inter.<br>Surface Elevation: Not surveyed | REMARKS |
|---|---|---|---|---|---|---|
| 0 | | | | | ASPHALTIC CONCRETE : (4 inches thick) | |
| 1 | | | | 0 | POORLY GRADED GRAVEL with SILT and SAND (GP-GM): dark grayish brown (10YR 4/2), moist, 60% fine to coarse gravel, 30% fine to coarse sand, 10% nonplastic fines (FILL) | OVM = MiniRAE 2000 PID calibrated with 100 ppm isobutylene standard. |
| 2 | | | | 3.2 | POORLY GRADED SAND with SILT (SP-SM): dark yellowish brown (10YR 4/3), moist, 70% fine to coarse sand, 20% fine to coarse gravel, 10% nonplastic fines<br>very dark greenish gray (10BG 3/1) or 10GY 3/1 | |
| 3 | | | | | CONCRETE | Hand augered to 3 feet bgs; cuttings logged for lithology. |
| 4 | | | | 50.4<br>14.1 | | |
| 5 | | | | | POORLY GRADED GRAVEL with SAND and SILT (GP-GM) | Boring location coordinates based on the California Coordinate System NAD 83, Zone III. |
| 6 | | | | 164 | POORLY GRADED SAND with SILT and GRAVEL (SP-SM)<br>ASPHALTIC CONCRETE | |
| 7 | | | | 12 | | Grab groundwater sample EB-2 collected through 5 feet of 1-inch OD Sch. 40 PVC screen (0.010-inch slot size) placed in borehole from 10 to 15 feet bgs. drive casing retracted from bottom of boring to 10 feet bgs to maintain surface seal. |
| 8 | | | | 127 | | |
| 9 | EB-2-9 | | | 1175 | wet<br>contains bone fragments | |
| 10 | | | | 1312 | | |
| 11 | | | | 6.7 | | |
| 12 | | | | | dark yellowish brown (10YR 4/4) | |
| 13 | EB-2-13 | | | 2.3 | | Borehole destroyed using Type I-II neat cement grout placed from total depth to ground surface with a tremie pipe. |
| 14 | | | | 2 | | |
| 15 | | | | | Bottom of boring at 15.0 feet | |

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|---|---|
| PROJECT: 2310-2307 LINCOLN AVENUE<br>Alameda, California | **Log of Boring No. EB-3** |
| BORING LOCATION: N: 2106484.08; E: 6058180.63 | ELEVATION AND DATUM: Not surveyed; datum is ground surface |
| DRILLING CONTRACTOR: Vironex, Inc. | DATE STARTED: 8/16/07 / DATE FINISHED: 8/16/07 |
| DRILLING METHOD: Direct push | TOTAL DEPTH (ft.): 15.0 / MEASURING POINT: Ground surface |
| DRILLING EQUIPMENT: Geoprobe 66DT | DEPTH TO WATER (ft.) FIRST: NA / COMPL: NA |
| SAMPLING METHOD: Geoprobe DT21 dual-tube sampling system [4' x 1.25"] | LOGGED BY: C. Payne |
| HAMMER WEIGHT: NA / DROP: NA | RESPONSIBLE PROFESSIONAL: R. Schultz / REG. NO. CHG 833 |

Surface Elevation: Not surveyed

| DEPTH (feet) | SAMPLES: Sample No. | SAMPLES: Sample | SAMPLES: Blows/Foot | OVM READING (ppm) | DESCRIPTION (NAME (USCS): color, moist, % by wt., plast. density, structure, cementation, react. w/HCl, geo. inter.) | REMARKS |
|---|---|---|---|---|---|---|
| 0 | | | | 0.9 | ASPHALTIC CONCRETE : (4 inches thick) | |
| 1 | | | | 0.5 | POORLY GRADED GRAVEL with SILT and SAND (GP-GM): dark grayish brown (10YR 4/2), moist, 60% fine to coarse gravel, 30% fine to coarse sand, 10% nonplastic fines [FILL] | OVM = MiniRAE 2000 PID calibrated with 100 ppm isobutylene standard. |
| 2 | | | | | POORLY GRADED SAND with SILT and GRAVEL (SP-SM): dark yellowish brown (10YR 3/4), moist, 70% fine to coarse sand, 20% fine to coarse gravel, 10% nonplastic fines | |
| 3 | | | | 4.8 | POORLY GRADED GRAVEL with SAND and SILT (GP-GM) | Hand augered to 5 feet bgs; cuttings logged for lithology. |
| 4 | | | | 0 | | |
| 5 | | | | | | Boring location coordinates based on the California Coordinate System NAD 83, Zone III. |
| 6 | | | | | POORLY GRADED GRAVEL with SILT (SP-SM) | |
| 7 | | | | | POORLY GRADED GRAVEL with SILT (SP-SM) | |
| 8 | | | | | POORLY GRADED SAND with SILT (SP-SM): dark greenish gray (10Y 4/1), moist, 90% fine sand, 10% nonplastic fines | |
| 9 | EB-3-9 | | | 1556 | | Grab groundwater sample EB-3-081607 collected through 5 feet of 1-inch OD Sch. 40 PVC screen (0.010-inch slot size) placed in borehole from 10 to 15 feet bgs. drive casing retracted from bottom of boring to 10 feet bgs to maintain surface seal. |
| 10 | | | | 6.5 | dark yellowish brown (10YR 4/4)<br>wet | |
| 11 | | | | 1.4 | | |
| 12 | EB-3-11.8 | | | 1.3 | | |
| 13 | | | | | | Borehole destroyed using Type I-II neat cement grout placed from total depth to ground surface with a tremie pipe. |
| 14 | EB-1-14 | | | 0.8 | | |
| 15 | | | | | Bottom of boring at 15.0 feet | |

OAKBOREV (REV. 8/2007)

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| PROJECT: 2310-2307 LINCOLN AVENUE<br>Alameda, California | **Log of Boring No. EB-4** |
| BORING LOCATION: N: 2106486.10; E: 6058164.55 | ELEVATION AND DATUM: Not surveyed; datum is ground surface |
| DRILLING CONTRACTOR: Vironex, Inc. | DATE STARTED: 8/16/07 / DATE FINISHED: 8/16/07 |
| DRILLING METHOD: Direct push | TOTAL DEPTH (ft.): 15.0 / MEASURING POINT: Ground surface |
| DRILLING EQUIPMENT: Geoprobe 66DT | DEPTH TO WATER (ft.) FIRST: NA / COMPL.: NA |
| SAMPLING METHOD: Geoprobe DT21 dual-tube sampling system (4' x 1.25") | LOGGED BY: C. Payne |
| HAMMER WEIGHT: NA / DROP: NA | RESPONSIBLE PROFESSIONAL: R. Schultz / REG. NO. CHG 833 |

| DEPTH (feet) | SAMPLES: Sample No. | SAMPLES: Sample | SAMPLES: Blows/ Foot | OVM READING (ppm) | DESCRIPTION<br>NAME (USCS): color, moist, % by wt., plast. density, structure, cementation, react. w/HCl, geo. inter.<br>Surface Elevation: Not surveyed | REMARKS |
|---|---|---|---|---|---|---|
| 0 | | | | 0 | ASPHALTIC CONCRETE : (4 inches thick) | |
| 1 | | | | | POORLY GRADED GRAVEL with SILT and SAND (GP-GM): dark brown (10YR 3/3), moist, 60% fine to coarse gravel, 30% fine sand, 10% nonplastic fines [FILL] | OVM = MiniRAE 2000 PID calibrated with 100 ppm isobutylene standard. |
| 2 | | | | 0 | POORLY GRADED SAND with SILT and GRAVEL (SP-SM): dark yellowish brown (10YR 3/4), moist, 70% fine to coarse sand, 20% fine to coarse gravel, 10% nonplastic fines | |
| 3 | | | | 0 | POORLY GRADED GRAVEL with SILT and SAND (GP-GM) | Hand augered to 5 feet bgs; cuttings logged for lithology. |
| 4 | | | | 0 | POORLY GRADED SAND with SILT (SP-SM): dark yellowish brown (10YR 4/4), moist, 90% fine sand, 10% nonplastic fines | |
| 5 | | | | 1 | | Boring location coordinates based on the California Coordinate System NAD 83, Zone III. |
| 6 | EB-4-6.5 | | | | | |
| 7 | | | | 0.9 | | |
| 8 | | | | | | Grab groundwater sample EB-4-081607 collected through 5 feet of 1-inch OD Sch. 40 PVC screen (0.010-inch slot size) placed in borehole from 10 to 15 feet bgs. drive casing retracted from bottom of boring to 10 feet bgs to maintain surface seal. |
| 9 | | | | | | |
| 10 | EB-4-10.2 | | | 13.1 | brown (10YR 4/3), wet | |
| 11 | | | | | mottled brown (10YR 4/3) and dark yellowish brown (10YR 3/4) | |
| 12 | | | | | | |
| 13 | EB-4-13 | | | 0.5 | | Borehole destroyed using Type I-II neat cement grout placed from total depth to ground surface with a tremie pipe. |
| 14 | | | | | | |
| 15 | | | | | dark yellowish brown (10YR 3/4)<br>Bottom of boring at 15.0 feet | |

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| PROJECT: 2310-2307 LINCOLN AVENUE<br>Alameda, California | **Log of Boring No. EB-5** |
| BORING LOCATION: N: 2106500.51; E: 6058173.64 | ELEVATION AND DATUM: Not surveyed; datum is ground surface |
| DRILLING CONTRACTOR: Vironex, Inc. | DATE STARTED: 8/16/07 / DATE FINISHED: 8/16/07 |
| DRILLING METHOD: Direct push | TOTAL DEPTH (ft.): 15.0 / MEASURING POINT: Ground surface |
| DRILLING EQUIPMENT: Geoprobe 66DT | DEPTH TO WATER (ft.) FIRST: NA / COMPL.: NA |
| SAMPLING METHOD: Geoprobe DT21 dual-tube sampling system [4' x 1.25"] | LOGGED BY: C. Payne |
| HAMMER WEIGHT: NA / DROP: NA | RESPONSIBLE PROFESSIONAL: R. Schultz / REG. NO.: CHG 833 |

| DEPTH (feet) | SAMPLES: Sample No. | SAMPLES: Sample | SAMPLES: Blows/ Foot | OVM READING (ppm) | DESCRIPTION<br>NAME (USCS): color, moist, % by wt., plast. density, structure, cementation, react. w/HCl, geo. inter. | REMARKS |
|---|---|---|---|---|---|---|
| | | | | | Surface Elevation: Not surveyed | |
| 0 | | | | | ASPHALTIC CONCRETE : (4 inches thick) | |
| 1 | | | | | POORLY GRADED GRAVEL with SILT and SAND (GP-GM): dark grayish brown (10YR 4/2), moist, 60% fine to coarse gravel, 30% fine to coarse sand, 10% nonplastic fines [FILL] | OVM = MiniRAE 2000 PID calibrated with 100 ppm Isobutylene standard. |
| 2 | | | | 3.2<br>5.5 | POORLY GRADED SAND with SILT and GRAVEL (SP-SM): dark yellowish brown (10YR 3/3), moist, 65% fine to coarse sand, 25% fine to coarse gravel, 10% nonplastic fines | |
| 3 | EB-5-2.5 (sample not drawn correctly for 2.5 ID?) | | | | POORLY GRADED SAND with SILT (SP-SM): very dark grayish brown (10YR 2/2), moist, 90% fine sand, 10% nonplastic fines | Hand augered to 5 feet bgs; cuttings logged for lithology. |
| 4 | | | | 28 | | |
| 5 | | | | 20.6 | | Boring location coordinates based on the California Coordinate System NAD 83, Zone III. |
| 6 | | | | 979 | | |
| 7 | | | | 492 | very dark greenish gray (10GY 3/1) | |
| 8 | | | | | | |
| 9 | EB-5-9 | | | 1385 | | Grab groundwater sample EB-5-081607 collected through 5 feet of 1-inch OD Sch. 40 PVC screen (0.010-inch slot size) placed in borehole from 10 to 15 feet bgs. drive casing retracted from bottom of boring to 10 feet bgs to maintain surface seal. |
| 10 | | | | 158 | wet | |
| 11 | | | | | | |
| 12 | EB-5-12.5 | | | 8.8 | dark yellowish brown (10YR 4/4) | |
| 13 | | | | 1.5 | | Borehole destroyed using Type I-II neat cement grout placed from total depth to ground surface with a tremie pipe. |
| 14 | | | | | | |
| 15 | | | | 1.2 | Bottom of boring at 15.0 feet | |

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| PROJECT: 2310-2307 LINCOLN AVENUE<br>Alameda, California | **Log of Boring No. EB-6** |
| BORING LOCATION: N: 2106515.42; E: 6058175.77 | ELEVATION AND DATUM: Not surveyed; datum is ground surface |
| DRILLING CONTRACTOR: Vironex, Inc. | DATE STARTED: 8/16/07 / DATE FINISHED: 8/16/07 |
| DRILLING METHOD: Direct push | TOTAL DEPTH (ft.): 15.0 / MEASURING POINT: Ground surface |
| DRILLING EQUIPMENT: Geoprobe 66DT | DEPTH TO WATER (ft.) FIRST: NA / COMPL.: NA |
| SAMPLING METHOD: Geoprobe DT21 dual-tube sampling system [4' x 1.25"] | LOGGED BY: C. Payne |
| HAMMER WEIGHT: NA / DROP: NA | RESPONSIBLE PROFESSIONAL: R. Schultz / REG. NO. CHG 833 |

| DEPTH (feet) | SAMPLES: Sample No. | SAMPLES: Sample | SAMPLES: Blows/Foot | OVM READING (ppm) | DESCRIPTION<br>NAME (USCS): color, moist, % by wt., plast. density, structure, cementation, react. w/HCl, geo. inter.<br>Surface Elevation: Not surveyed | REMARKS |
|---|---|---|---|---|---|---|
| 0 | | | | | ASPHALTIC CONCRETE : (4 inches thick) | |
| 1 | | | | 2.1 | POORLY GRADED GRAVEL with SILT and SAND (GP-GM): dark grayish brown (10YR 4/2), moist, 60% fine to coarse gravel, 30% fine to coarse sand, 10% nonplastic fines [FILL] | OVM = MiniRAE 2000 PID calibrated with 100 ppm isobutylene standard. |
| 2 | | | | 0 | POORLY GRADED SAND with SILT and GRAVEL (SP-SM): dark yellowish brown (10YR 3/4), moist, 60% fine to coarse sand, 30% fine gravel, 10% nonplastic fines | |
| 3 | | | | 0 | | Hand augered to 5 feet bgs; cuttings logged for lithology. |
| 4 | | | | 9.1 | POORLY GRADED SAND with SILT (SP-SM): dark grayish brown (2.5Y 4/2), moist, 90% fine sand, 10% nonplastic fines | |
| 5 | | | | | | Boring location coordinates based on the California Coordinate System NAD 83, Zone III. |
| 6 | | | | 84 | grayish brown (2.5Y 5/2) | |
| 7 | | | | 221 | | |
| 8 | | | | | dark greenish gray (10Y 4/1) | Grab groundwater sample EB-6-081607 collected through 5 feet of 1-inch OD Sch. 40 PVC screen (0.010-inch slot size) placed in borehole from 10 to 15 feet bgs. drive casing retracted from bottom of boring to 10 feet bgs to maintain surface seal. |
| 9 | EB-6-9.5 | | | 1481 | | |
| 10 | | | | 1487 | wet | |
| 11 | | | | 23.5 | | |
| 12 | | | | | | |
| 13 | | | | 7.9 | yellowish brown (10YR 5/6) | Borehole destroyed using Type I-II neat cement grout placed from total depth to ground surface with a tremie pipe. |
| 14 | EB-6-14 | | | 2.6 | | |
| 15 | | | | | Bottom of boring at 15.0 feet | |

OAKBOREV (REV. 6/2007)

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| PROJECT: 2310-2307 LINCOLN AVENUE<br>Alameda, California | **Log of Boring No. EB-8** |
| BORING LOCATION: Parking lot, 47' E, 41' N of property line | ELEVATION AND DATUM: Not surveyed; datum is ground surface |
| DRILLING CONTRACTOR: Vironex, Inc. | DATE STARTED: 8/15/07 / DATE FINISHED: 8/15/07 |
| DRILLING METHOD: Hand auger | TOTAL DEPTH (ft.): 3.0 / MEASURING POINT: Ground surface |
| DRILLING EQUIPMENT: Hand auger | DEPTH TO WATER (ft.) FIRST: NA / COMPL.: NA |
| SAMPLING METHOD: Hand auger | LOGGED BY: C. Payne |
| HAMMER WEIGHT: NA / DROP: NA | RESPONSIBLE PROFESSIONAL: R. Schultz / REG. NO. CHG 833 |

| DEPTH (feet) | SAMPLES: Sample No. | SAMPLES: Sample | SAMPLES: Blows/ Foot | OVM READING (ppm) | DESCRIPTION<br>NAME (USCS): color, moist, % by wt., plast. density, structure, cementation, react. w/HCl, geo. inter.<br>Surface Elevation: Not surveyed | REMARKS |
|---|---|---|---|---|---|---|
| 0 | | | | | ASPHALTIC CONCRETE : (4 inches thick) | |
| 1 | | | | 1.8 | POORLY GRADED GRAVEL with SILT and SAND (GP-GM): dark brown (10YR 3/3), moist, 60% fine to coarse gravel, 30% fine to coarse sand, 10% nonplastic fines (FILL) | OVM = MiniRAE 2000 PID calibrated with 100 ppm isobutylene standard. |
| 2 | EB-9-2 | | | 0.6 | POORLY GRADED SAND with SILT and GRAVEL (SP-SM): dark yellowish brown (10YR 3/4), moist, 70% fine to coarse sand, 20% fine to coarse gravel, 10% nonplastic fines | |
| 3 | | | | | Bottom of boring at 3.0 feet | Hand augered to 3 feet bgs; cuttings logged for lithology |
| 4 | | | | | | |
| 5 | | | | | | Borehole destroyed using Type I-II neat cement grout placed from total depth to ground surface with a tremie pipe. |
| 6 | | | | | | |
| 7 | | | | | | |
| 8 | | | | | | |
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| 12 | | | | | | |
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| 14 | | | | | | |
| 15 | | | | | | |

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|---|---|
| PROJECT: 2310-2307 LINCOLN AVENUE<br>Alameda, California | **Log of Boring No. EB-9** |
| BORING LOCATION: Parking lot, 51' E, 40' N of property line | ELEVATION AND DATUM: Not surveyed; datum is ground surface |
| DRILLING CONTRACTOR: Vironex, Inc. | DATE STARTED: 8/15/07 / DATE FINISHED: 8/15/07 |
| DRILLING METHOD: Hand auger | TOTAL DEPTH (ft.): 3.0 / MEASURING POINT: Ground surface |
| DRILLING EQUIPMENT: Hand auger | DEPTH TO WATER (ft.) FIRST: NA / COMPL.: NA |
| SAMPLING METHOD: Hand auger | LOGGED BY: C. Payne |
| HAMMER WEIGHT: NA / DROP: NA | RESPONSIBLE PROFESSIONAL: R. Schultz / REG. NO.: CHG 833 |

| DEPTH (feet) | SAMPLES: Sample No. | SAMPLES: Sample | SAMPLES: Blows/Foot | OVM READING (ppm) | DESCRIPTION<br>NAME (USCS): color, moist, % by wt., plast. density, structure, cementation, react. w/HCl, geo. inter.<br>Surface Elevation: Not surveyed | REMARKS |
|---|---|---|---|---|---|---|
| 0 | | | | | ASPHALTIC CONCRETE : (4 inches thick) | |
| 1 | | | | 2.7 | POORLY GRADED GRAVEL with SILT and SAND (GP-GM): dark brown (10YR 3/3), moist, 60% fine to coarse gravel, 30% fine to coarse sand, 10% nonplastic fines [FILL] | OVM = MiniRAE 2000 PID calibrated with 100 ppm isobutylene standard. |
| 2 | EB-9-2 | | | 0.4 | POORLY GRADED SAND with SILT and GRAVEL (SP-SM): dark yellowish brown (10YR 3/4), moist, 55% fine to coarse sand, 35% fine gravel, 10% nonplastic fines | |
| 3 | | | | | POORLY GRADED SAND with SILT (SP-SM)<br>Bottom of boring at 3.0 feet | Hand augered to 3 feet bgs; cuttings logged for lithology. |
| 4 | | | | | | |
| 5 | | | | | | Borehole destroyed using Type I-II neat cement grout placed from total depth to ground surface with a tremie pipe. |
| 6 | | | | | | |
| 7 | | | | | | |
| 8 | | | | | | |
| 9 | | | | | | |
| 10 | | | | | | |
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| 12 | | | | | | |
| 13 | | | | | | |
| 14 | | | | | | |
| 15 | | | | | | |

| | |
|---|---|
| PROJECT: 2310-2307 LINCOLN AVENUE<br>Alameda, California | **Log of Boring No. EB-10** |
| BORING LOCATION: Parking lot, 48' E, 23' N of property line | ELEVATION AND DATUM: Not surveyed; datum is ground surface |
| DRILLING CONTRACTOR: Vironex, Inc. | DATE STARTED: 8/16/07 / DATE FINISHED: 8/16/07 |
| DRILLING METHOD: Hand auger | TOTAL DEPTH (ft.): 2.0 / MEASURING POINT: Ground surface |
| DRILLING EQUIPMENT: Hand auger | DEPTH TO WATER (ft.) FIRST: NA / COMPL.: NA |
| SAMPLING METHOD: Hand auger | LOGGED BY: C. Payne |
| HAMMER WEIGHT: NA / DROP: NA | RESPONSIBLE PROFESSIONAL: R. Schultz / REG. NO.: CHG 833 |

| DEPTH (feet) | SAMPLES: Sample No. | SAMPLES: Sample | SAMPLES: Blows/Foot | OVM READING (ppm) | DESCRIPTION<br>NAME (USCS): color, moist, % by wt., plast. density, structure, cementation, react. w/HCl, geo. inter. | REMARKS |
|---|---|---|---|---|---|---|
| | | | | | Surface Elevation: Not surveyed | |
| | | | | | ASPHALTIC CONCRETE : (4 inches thick) | |
| 1 | | | | | POORLY GRADED GRAVEL with SILT and SAND (GP-GM): dark brown (10YR 3/3), moist, 60% fine to coarse gravel, 30% fine to coarse sand, 10% nonplastic fines [FILL] | |
| 2 | EB-10-2 | | | | POORLY GRADED SAND with SILT and GRAVEL (SP-SM): dark yellowish brown (10YR 3/3), moist, 60% fine to coarse sand, 30% fine gravel, 10% nonplastic fines | |
| | | | | | Bottom of boring at 2.0 feet | |
| 3 | | | | | | Hand augered to 2 feet bgs; cuttings logged for lithology. |
| 4 | | | | | | |
| 5 | | | | | | Borehole destroyed using Type I-II neat cement grout placed from total depth to ground surface with a tremie pipe. |
| 6 | | | | | | |
| 7 | | | | | | |
| 8 | | | | | | |
| 9 | | | | | | |
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| 12 | | | | | | |
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| 14 | | | | | | |
| 15 | | | | | | |

| | |
|---|---|
| PROJECT: 2310-2307 LINCOLN AVENUE<br>Alameda, California | **Log of Boring No. EB-11** |
| BORING LOCATION: Parking lot, 56' E, 22' N of property line | ELEVATION AND DATUM: Not surveyed; datum is ground surface |
| DRILLING CONTRACTOR: Vironex, Inc. | DATE STARTED: 8/16/07 / DATE FINISHED: 8/16/07 |
| DRILLING METHOD: Hand auger | TOTAL DEPTH (ft.): 2.0 / MEASURING POINT: Ground surface |
| DRILLING EQUIPMENT: Hand auger | DEPTH TO WATER (ft.) FIRST: NA / COMPL.: NA |
| SAMPLING METHOD: Hand auger | LOGGED BY: C. Payne |
| HAMMER WEIGHT: NA / DROP: NA | RESPONSIBLE PROFESSIONAL: R. Schultz / REG. NO.: CHG 833 |

| DEPTH (feet) | SAMPLES: Sample No. | SAMPLES: Sample | SAMPLES: Blows/Foot | OVM READING (ppm) | DESCRIPTION<br>NAME (USCS): color, moist, % by wt., plast. density, structure, cementation, react. w/HCl, geo. inter.<br>Surface Elevation: Not surveyed | REMARKS |
|---|---|---|---|---|---|---|
| 0 | | | | | ASPHALTIC CONCRETE : (4 inches thick) | |
| 1 | | | | 1.1 | POORLY GRADED GRAVEL with SILT and SAND (GP-GM): dark brown (10YR 3/3), moist, 60% fine to coarse gravel, 30% fine to coarse sand, 10% nonplastic fines [FILL] | OVM = MiniRAE 2000 PID calibrated with 100 ppm Isobutylene standard. |
| 2 | EB-11-2 | | | | POORLY GRADED SAND with SILT and GRAVEL (SP-SM): dark yellowish brown (10YR 3/3), moist, 75% fine to coarse sand, 15% fine gravel, 10% nonplastic fines<br>Bottom of boring at 2.0 feet | |
| 3 | | | | | | Hand augered to 2 feet bgs; cuttings logged for lithology. |
| 4 | | | | | | |
| 5 | | | | | | Borehole destroyed using Type I-II neat cement grout placed from total depth to ground surface with a tremie pipe. |
| 6 | | | | | | |
| 7 | | | | | | |
| 8 | | | | | | |
| 9 | | | | | | |
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OAKBOREV (REV: 6/2007)

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Fax: 510-420-9170

# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | B-5 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 18-Feb-09 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 27-Feb-09 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485185 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Direct-push | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 2" | SCREENED INTERVALS | NA |
| LOGGED BY | E. Reinhart | DEPTH TO WATER (First Encountered) | 9.00 fbg |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA |
| REMARKS | Air knifed to 5 fbg | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | ASPHALT. | 0.3 | |
| | | | | | | | Silty SAND with gravel (SM) ; very dark brown (7.5YR 2.5/3); dry; 20% silt, 60% fine to medium sand, 20% fine gravel. | | |
| 0.0 | | | | | | | @ 3' - Silty SAND (SM) ; 25% silt, 65% fine to medium sand; 10% fine gravel. | | |
| | | | | 5 | SM | | | | |
| 0.0 | | B-5-5 .5' | | | | | @ 5' - dark yellowish brown (10YR 4/6); 20% silt, 80% fine to medium sand. | | |
| 0.0 | | | | | | | | | Portland Type I/II |
| | | | | | | | @ 7' - moist. | | |
| 0.0 | | B-5-8 .5' | | | | | | | |
| | | | | | | | ▽ | 9.0 | |
| | | B-5 GW@9-13' | | 10 | | | @ 9-13' -Groundwater grab sample collected. No lithologic log. | | |
| | | | | | | | | 13.0 | Bottom of Boring @ 13 fbg |

WELL LOG (PID) I:\SHELL\S-CHARS\0602-060204-110648E9-1\060204-GINT.GPJ DEFAULT.GDT 4/1/09

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | B-6 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 13-Jul-10 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 13-Jul-10 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Air-knife & Direct-push | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 2.5" | SCREENED INTERVALS | NA |
| LOGGED BY | P. Schaefer | DEPTH TO WATER (First Encountered) | 12.20 fbg |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA |
| REMARKS | | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| 0.0 | | | | | | | Silty SAND (SM) ; brown (10YR 4/3); moist; 15% silt, 85% fine grained sand. | | |
| 0.0 | | B-6-5 .25 | | 5 | | | | | |
| | | | | | | | @ 6.5' - yellowish brown (10YR 5/4). | | |
| 0.0 | | | | | SM | | | | |
| | | B-6-8 .0 | | | | | | | |
| 0.0 | | B-6-9 .5 | | 10 | | | | | |
| | | | | | | | @ 11' - wet. | | |
| 0.0 | | | | | | | ▽ | | |
| 0.0 | | | | | | | | | |
| | | | | 15 | | | | 15.0 | Bottom of Boring @ 15 fbg |

WELL LOG (PID) I:\SHELL\6-CHARS\0602--060204--10648E6--1\060204-1.GPJ DEFAULT.GDT 8/24/10

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | B-7 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 19-Feb-09 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 27-Feb-09 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Direct-push | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 2" | SCREENED INTERVALS | NA |
| LOGGED BY | E. Reinhart | DEPTH TO WATER (First Encountered) | 9.00 fbg |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA |
| REMARKS | Air knifed to 5 fbg | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | ASPHALT. | 0.3 | |
| | | | | | | | Silty SAND (SM); very dark brown (7.5YR 2.5/3); dry; 25% silt, 75% fine to medium sand. | | |
| 0.0 | | | | | | | | | |
| 0.0 | | B-7-5 .5' | | 5 | SM | | @ 5' - brown (7.5YR 4/4); 20% silt, 80% fine to medium sand. | | |
| 0.0 | | | | | | | | | Portland Type I/II |
| 0.0 | | | | | | | @ 7' - moist. | | |
| 13.0 | | | | | | | @ 8' - very dark grayish brown (10YR 3/2). | | |
| 1,487 | | B-7-8 .5' | | | | | | 9.0 | |
| | | B-7 GW@9- 13' | | 10 | | | @ 9-13' -Groundwater grab sample collected. No lithologic log. | | |
| | | | | | | | | 13.0 | Bottom of Boring @ 13 fbg |

WELL LOG (PID) I:\SHELL\6-CHARS\0602--\060204--\1084\ES~1\060204-GINT.GPJ DEFAULT.GDT 4/1/09

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | B-8 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 18-Feb-09 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 27-Feb-09 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Direct-push | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 2" | SCREENED INTERVALS | NA |
| LOGGED BY | E. Reinhart | DEPTH TO WATER (First Encountered) | 9.00 fbg |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA |
| REMARKS | Air knifed to 5 fbg | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | ASPHALT. | 0.3 | |
| | | | | | SM | | Silty SAND (SM); very dark brown (7.5YR 2.5/3); dry; 25% silt, 75% fine to medium sand. | | |
| | | | | 5 | | | | | |
| 0.0 | | B-8-5 .5' | | | | | @ 5' - dark yellowish brown (10YR 4/4); 20% silt, 80% fine to medium sand. | | |
| 3.3 | | | | | | | | | Portland Type I/II |
| 6.57 | | | | | | | @ 7' - dark greenish gray (5GY 4/1); moist. | | |
| 1,156 | | B-8-8 .5' | | | | | | | |
| | | | | | | | ▽ | 9.0 | |
| | | B-8 (GW@9 -13') | | 10 | | | @ 9-13' -Groundwater grab sample collected. No lithologic log. | | |
| | | | | | | | | 13.0 | Bottom of Boring @ 13 fbg |

WELL LOG (PID) I:\SHELL\6-CHARSV\0802--060204--1\060204-GINT.GPJ DEFAULT.GDT 4/1/09

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | SVP-1 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 19-Feb-09 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 19-Feb-09 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Air-knife | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 3" | SCREENED INTERVALS | 4.9 to 5 fbg |
| LOGGED BY | E. Reinhart | DEPTH TO WATER (First Encountered) | NA |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA |
| REMARKS | | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| 0.0 | | | | 5 | SM | | ASPHALT<br>Silty SAND (SM) ; very dark brown (7.5YR 2.5/3); dry; 25% silt, 75% fine to medium sand. | 0.3<br>5.0 | Portland Type I/II<br>Bentonite Seal<br>Monterey Sand #2/12<br>High Density Porous Polyethylene Soil Vapor Implant<br>Bottom of Boring @ 5 fbg |

WELL LOG (PID) I:\SHELL\6-CHARS\0502_-\060204-1\0848E9-1\060204-GINT.GPJ DEFAULT.GDT 4/1/09

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | SVP-2 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 19-Feb-09 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 19-Feb-09 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Air-knife | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 3" | SCREENED INTERVALS | 4.9 to 5 fbg |
| LOGGED BY | E. Reinhart | DEPTH TO WATER (First Encountered) | NA |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA |
| REMARKS | | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| 0.0 | | | | 5 | SM | | ASPHALT<br>Silty SAND (SM); very dark brown (7.5YR 2.5/3); dry; 25% silt, 65% fine to medium sand, 10% fine gravel. | 0.3<br>5.0 | Portland Type I/II<br>Bentonite Seal<br>Monterey Sand #2/12<br>High Density Porous Polyethylene Soil Vapor Implant<br>Bottom of Boring @ 5 fbg |

WELL LOG (PID) I:\SHELL\8-CHARS\0602--060204--1064829--1060204-GINT.GPJ DEFAULT.GDT 4/1/09

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | SVP-3 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 18-Feb-09 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 18-Feb-09 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Air-knife | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 3" | SCREENED INTERVALS | 4.9 to 5 fbg |
| LOGGED BY | E. Reinhart | DEPTH TO WATER (First Encountered) | NA |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA |
| REMARKS | | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| 0.0 | | | | 5 | SM | | **ASPHALT**<br>**Silty SAND with gravel (SM)**; very dark brown (7.5YR 2.5/3); dry; 25% silt, 45% fine to medium sand, 30% gravel; fill, asphalt pieces 1-3", garbage.<br><br>@ 2' - **Silty SAND (SM)**; 25% silt, 65% fine to medium sand, 10% fine gravel. | 0.3<br>5.0 | Portland Type I/II<br>Bentonite Seal<br>Monterey Sand #2/12<br>High Density Porous Polyethylene Soil Vapor Implant<br>Bottom of Boring @ 5 fbg |

WELL LOG (PID) I:\SHELL\6-CHARS\0602--060204--10648E9-(1060204-GINT.GPJ DEFAULT.GDT 4/1/09

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | SVP-4 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 18-Feb-09 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 18-Feb-09 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Air-knife | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 3" | SCREENED INTERVALS | 4.9 to 5 fbg |
| LOGGED BY | E. Reinhart | DEPTH TO WATER (First Encountered) | NA |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA |
| REMARKS | | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| 0.0 | | | | 5 | SM | | ASPHALT<br>Silty SAND (SM) ; very dark brown (7.5YR 2.5/3); dry; 25% silt, 65% fine to medium sand, 10% fine gravel. | 0.3<br>5.0 | Portland Type I/II<br>Bentonite Seal<br>Monterey Sand #2/12<br>High Density Porous Polyethylene Soil Vapor Implant<br>Bottom of Boring @ 5 fbg |

WELL LOG (PID) I:\SHELL\6-CHARS\0602-060204-1\060204-1\060204-GINT.GPJ DEFAULT.GDT 4/1/09

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| **CLIENT NAME** | Shell Oil Products US | **BORING/WELL NAME** | SVP-4 |
| **JOB/SITE NAME** | Former Shell Service Station | **DRILLING STARTED** | 25-Mar-10 |
| **LOCATION** | 2301-2307 Lincoln Avenue, Alameda, CA | **DRILLING COMPLETED** | 25-Mar-10 |
| **PROJECT NUMBER** | 060204 | **WELL DEVELOPMENT DATE (YIELD)** | NA |
| **DRILLER** | Gregg Drilling, C-57 #485165 | **GROUND SURFACE ELEVATION** | NA |
| **DRILLING METHOD** | Air-knife | **TOP OF CASING ELEVATION** | NA |
| **BORING DIAMETER** | 3" | **SCREENED INTERVALS** | 2-2.1, 5-5.1 |
| **LOGGED BY** | S. Lewis | **DEPTH TO WATER (First Encountered)** | NA |
| **REVIEWED BY** | P. Schaefer | **DEPTH TO WATER (Static)** | NA |
| **REMARKS** | | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| 0.0 | | | | | SM | | **ASPHALT**<br>**Silty SAND (SM)**; Very dark brown (7.5YR 2.5/3); dry; 25% silt, 65% fine to medium grained sand, 10% fine gravel. | 0.3 | |
| | | | | 5 | | | | 5.0 | Bottom of Boring @ 5 fbg |

WELL LOG (PID) I:\SHELL\9-CHARS\06002--060204-1\06484EB-1\060204-1.GPJ DEFAULT.GDT 5/6/10

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| **CLIENT NAME** | Shell Oil Products US | **BORING/WELL NAME** | SVP-5 |
| **JOB/SITE NAME** | Former Shell Service Station | **DRILLING STARTED** | 18-Feb-09 |
| **LOCATION** | 2301-2307 Lincoln Avenue, Alameda, CA | **DRILLING COMPLETED** | 18-Feb-09 |
| **PROJECT NUMBER** | 060204 | **WELL DEVELOPMENT DATE (YIELD)** | NA |
| **DRILLER** | Gregg Drilling, C-57 #485165 | **GROUND SURFACE ELEVATION** | NA |
| **DRILLING METHOD** | Air-knife | **TOP OF CASING ELEVATION** | NA |
| **BORING DIAMETER** | 3" | **SCREENED INTERVALS** | 4.9 to 5 fbg |
| **LOGGED BY** | E. Reinhart | **DEPTH TO WATER (First Encountered)** | NA |
| **REVIEWED BY** | P. Schaefer | **DEPTH TO WATER (Static)** | NA |
| **REMARKS** | | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| 0.0 | | | | 5 | SM | | **ASPHALT**<br>Silty SAND with gravel (SM) ; very dark brown (7.5YR 2.5/3); dry; 25% silt, 45% fine to medium sand, 30% gravel; fill.<br>@ 1' - Silty SAND (SM) ; 25% silt, 65% fine to medium sand, 10% fine gravel. | 0.3<br>5.0 | Portland Type VII<br>Bentonite Seal<br>Monterey Sand #2/12<br>High Density Porous Polyethylene Soil Vapor Implant<br>Bottom of Boring @ 5 fbg |

WELL LOG (PID) I:\SHELL\6-CHARS\0602--\060204--1\060204E9--1\060204-GINT.GPJ DEFAULT.GDT 4/1/09

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | SVP-5A |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 23-Mar-10 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 23-Mar-10 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #486165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Air-knife | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 4" | SCREENED INTERVALS | 2 to 2.1 fbg |
| LOGGED BY | S. Lewis | DEPTH TO WATER (First Encountered) | NA |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA |
| REMARKS | | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | SM | | ASPHALT<br>**Silty SAND with Gravel (SM)**: Brown (10YR 4/3); dry; 20% silt, 65% fine grained size sand, 15% fine gravel.<br>@ 1' - **Silty SAND (SM)**: 15% silt, 85% fine grained sand. | 0.3<br>2.2 | Bottom of Boring @ 2.2 fbg |

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | SVP-6 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 23-Mar-10 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 23-Mar-10 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Air-knife | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 4" | SCREENED INTERVALS | NA |
| LOGGED BY | S. Lewis | DEPTH TO WATER (First Encountered) | NA |
| REVIEWED BY | P. Scheefer | DEPTH TO WATER (Static) | NA |
| REMARKS | | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | ASPHALT | 0.3 | |
| | | | | | SM | | Silty SAND (SM); Brown (10YR 4/3); dry; 15% silt, 85% fine sand. | | |
| | | | | 5 | | | | 5.1 | Bottom of Boring @ 5.1 fbg |

WELL LOG (PID) I:\SHELL\6-CHARTS\0602--060204--1084859--1060204-1.GPJ DEFAULT.GDT 5/6/10

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | SVP-7 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 23-Mar-10 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 23-Mar-10 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Air-knife | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 4" | SCREENED INTERVALS | NA |
| LOGGED BY | S. Lewis | DEPTH TO WATER (First Encountered) | NA |
| REVIEWED BY | P. Schaefer | DEPTH TO WATER (Static) | NA |
| REMARKS | | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | CONCRETE | 0.3 | |
| | | | | | SM | | Silty SAND (SM): Very dark grayish brown (10YR 5/3); dry; 15% silt, 80% fine grained sand, 5% fine gravel. | | |
| | | | | 5 | | | | 5.4 | Bottom of Boring @ 5.4 fbg |

WELL LOG (PID) I:\SHELL\6-CHARS\0602--060204--1\060448EP-1\060204-1.GPJ DEFAULT.GDT 5/6/10

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | SVP-8 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 23-Mar-10 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 23-Mar-10 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Gregg Drilling, C-57 #485165 | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Air-knife | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 4" | SCREENED INTERVALS | NA |
| LOGGED BY | S. Lewis | DEPTH TO WATER (First Encountered) | NA |
| REVIEWED BY | P. Scheefer | DEPTH TO WATER (Static) | NA |
| REMARKS | | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | 5 | SM | | Silty SAND with Gravel (SM); Brown (10YR 4/3); dry; 20% silt, 60% fine grained sand, 20% fine gravel.<br><br>Silty SAND (SM); 15% silt, 85% fine sand. | 5.4 | Bottom of Boring @ 5.4 fbg |

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | SVP-9 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 07-Mar-11 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 07-Mar-11 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Vapor Tech Services | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Air-knife | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 6" | SCREENED INTERVALS | NA |
| LOGGED BY | O. Yan | DEPTH TO WATER (First Encountered) | NA |
| REVIEWED BY | P. Schaefer PG# 5612 | DEPTH TO WATER (Static) | NA |
| REMARKS | | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | **ASPHALT** | 0.3 | Concrete |
| | | | | | | | **Silty SAND (SM):** Dark grayish brown (10 YR 5/3); moist; 5% clay, 20% silt, 75% fine sand. | | Bentonite Seal |
| | | | | | SM | | | | Monterey Sand #2/12 1"-diam., Stainless Steel Probe |
| | | | | | | | | | Bentonite Seal |
| 0.3 | | | | | | | @ 4 fbg: Cobble approximately 5" diameter. | | Monterey Sand #2/12 1"-diam., Stainless Steel Probe |
| | | | | 5 | | | | 5.0 | Bottom of Boring @ 5 fbg |

WELL LOG (PID) I:\SHELL\6-CHARS\0602~1\060204~1\06048EB~1\060204~1.GPJ DEFAULT.GDT 8/2/11

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | COMP-1 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 07-Mar-11 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 07-Mar-11 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Vapor Tech Services | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Hand-Auger | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 3" | SCREENED INTERVALS | NA |
| LOGGED BY | O. Yan | DEPTH TO WATER (First Encountered) | 7.00 fbg (07-Mar-11) |
| REVIEWED BY | P. Schaefer PG# 5612 | DEPTH TO WATER (Static) | NA |
| REMARKS | Air knifed to 5 fbg | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | **ASPHALT** | 0.3 | |
| | | | | | | | **Silty SAND (SM):** Moderate dark brown (10 YR 4/3); dry; 5% clay, 15% silt, 75% fine sand, 5% fine gravel. | | |
| | | COMP-1A | | | | | | | |
| | | | | | | | @ 4fbg: Cobbles approximately 5" diameter. | | |
| 0.4 | | COMP-1B | | 5 | SM | | | | Portland Type I/II |
| | | | | | | | @ 6 fbg: 20% clay, 25% silt, 55% fine sand. | | |
| | | | | | | | @ 7 fbg: Wet. ▽ | | |
| | | COMP-1C | | | | | | | |
| | | | | | | | @ 9 fbg: Greenish gray (5 GY 5/1). | | |
| 956 | | COMP-1D | | 10 | | | | 10.0 | Bottom of Boring @ 10 fbg |

WELL LOG (PID): I:\SHELL\E-CHARS\0602--\060204--\10648EB--\060204-1.GPJ DEFAULT GDT 6/2/11

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# BORING / WELL LOG

| | | | |
|---|---|---|---|
| CLIENT NAME | Shell Oil Products US | BORING/WELL NAME | COMP-2 |
| JOB/SITE NAME | Former Shell Service Station | DRILLING STARTED | 07-Mar-11 |
| LOCATION | 2301-2307 Lincoln Avenue, Alameda, CA | DRILLING COMPLETED | 07-Mar-11 |
| PROJECT NUMBER | 060204 | WELL DEVELOPMENT DATE (YIELD) | NA |
| DRILLER | Vaport Tech Services | GROUND SURFACE ELEVATION | NA |
| DRILLING METHOD | Air-knife | TOP OF CASING ELEVATION | NA |
| BORING DIAMETER | 3" | SCREENED INTERVALS | NA |
| LOGGED BY | O. Yan | DEPTH TO WATER (First Encountered) | NA |
| REVIEWED BY | P. Schaefer PG# 5612 | DEPTH TO WATER (Static) | NA |
| REMARKS | | | |

| PID (ppm) | BLOW COUNTS | SAMPLE ID | EXTENT | DEPTH (fbg) | U.S.C.S. | GRAPHIC LOG | LITHOLOGIC DESCRIPTION | CONTACT DEPTH (fbg) | WELL DIAGRAM |
|---|---|---|---|---|---|---|---|---|---|
| | | | | | | | **ASPHALT** | 0.3 | |
| | | COMP-2A | | | SM | | **Silty SAND (SM):** Moderate dark brown (10 YR 4/3); dry; 5% clay, 25% silt, 70% fine sand. | | Portland Type I/II |
| | | COMP-2B | | | | | @ 2.5 fbg: Moist. | | |
| | | COMP-2C | | | | | | | |
| | | COMP-2D | | | | | | 4.0 | Bottom of Boring @ 4 fbg |

WELL LOG (PID) I:\SHELL\S-CHARS\0602--060204--1\060449E9--1\060204-1.GPJ DEFAULT.GDT 6/2/11