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SITE CONCEPTUAL MODEL AND WORK PLAN
1614 Campbell Street
Oakland, California

ERAS Project Number 04-001-02

Prepared for:

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Nas Construction Company, Inc.
6428 Sombrero Avenue
Cypress, CA 90630

Prepared by:

ERAS Environmental, Inc.
October 11, 2004

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CERTIFICATION

This **Site Conceptual Model and Work Plan** for 1614 Campbell Street in Oakland, California, has been prepared by ERAS Environmental, Inc. (ERAS) under the professional supervision of the Geologist whose signature appears hereon.

This report has been prepared by ERAS according to the State and local agency suggested guidance documents for these investigations and in general accordance with the accepted standard of practice that exists in Northern California at the time the investigation was performed. The interpretations, conclusions and recommendations made herein are based upon the data and analysis for the soil and water samples collected on-site. ERAS is not responsible for errors in laboratory analysis and reporting, or for information withheld during the course of the study. The purpose of this study is to screen for the presence of contamination that may affect the use or value of the Property. As such, the evaluation of the geologic and environmental conditions on this site is made with very limited data. Judgments leading to conclusions are generally made with an incomplete knowledge of the conditions present. Additional conditions and materials at the site could exist that were not encountered during this investigation. No warranty or guarantee is expressed or implied therein.

This report may be used only by the client and only for the purposes stated within a reasonable time from its issuance. Land use, site conditions (both on-site and off-site) or other factors may change over time, and additional work may be required with the passage of time. Any party other than the client who wishes to use this report shall notify ERAS of such intended use. Based on the intended use of report, ERAS may require that additional work be performed and that an updated report be issued. Non-compliance with any of these requirements by the client or anyone else will release ERAS from any liability resulting from the use of this report by any unauthorized party.

Respectfully submitted,

Gail M. Jones

Gail M. Jones
California Registered Geologist 5725

October 12, 2004

1.0 INTRODUCTION

The purpose of this Site Conceptual Model and Work Plan for 1614 Campbell Street (the Property) is based on conversations between ERAS and Robert Schultz of the Alameda County Environmental Health (ACEH). In a 13 September 2004 telephone conversation with Gail Jones of ERAS, Mr. Schultz indicated that the County would like to receive a single report with all of the relevant history and environmental data collected at the Property. During the same conversation Mr. Schultz indicated he believed additional investigation would likely be necessary prior to closure, including groundwater sampling in the area of the former Hazardous Waste Storage Area in the partial basement of the building on the Property. A Work Plan is included in this report with proposals to address identified gaps in the Site Conceptual Model (SCM).

1.1 Property Location and Description

The Property is located at 1614 Campbell Street in the northwest part of Oakland, California. The Property is located about one mile east of the San Francisco Bay, one-quarter mile southeast of Interstate 880, and one mile west of Interstate 980 (see **Figure 1**).

The following description in based on a site inspection conducted by ERAS on 7 November 2003. **Figure 2** shows a facility sketch map from the Phase I.

The Property is located in northwest Oakland, bounded on the northwest by Campbell Street, on the southeast by an unused railroad spur and on the southwest and northeast by 16th and 17th Streets, respectively.

The Property is occupied by a 3-story office, warehouse and manufacturing building with a partial basement. The site also includes a loading dock area, cistern, a single story communications equipment room, and a central courtyard with parking. The main building is of brick construction with concrete foundation, wooden or concrete floors, wooden roof and interior office walls. Following damage suffered in the 1989 Loma Prieta earthquake, the brick walls were repaired, the building was structurally reinforced,

and the water tower and a free-standing building were removed. The loading dock with a metal canopy is located near the east corner of the Property.

The Property is currently occupied by Reliance Upholstery, a manufacturer of Polarguard™ synthetic insulation. Two above-ground storage tanks (ASTs) located on the southwest side of the courtyard are used to store latex.

A basement with the floor about 3 feet below outside ground surface underlies the whole of the L-shaped building. A large concrete lined sump in the basement is used to drain groundwater from the foundation. Groundwater from the sump is pumped into the driveway on the southeast side of the building where it drains into the street gutter of 17th Street. An industrial production well with concrete casing was observed in the shed near the ASTs. This well has been abandoned (see pertinent documents in **Appendix A**).

A hazardous materials storage room in the basement room (see **Figure 2**) contained large amounts of disused machinery, buckets and drums of waste oil and other regulated substances.

1.2 Site Occupation History

The known occupation history of the site as indicated by available City of Oakland building records and Sanborn Maps is listed below.

1912-Oakland Warehouse Company (Sanborn Map)
1940-National Lamp Works (Oakland Building)
1951-Oakland Lamp Division of the GE Company (Sanborn Map)
1958-General Electric Company (Oakland Building)
1963-California Cotton Mills (Oakland Building)
1967-California Cotton Mills (Sanborn Map)
1969-Reliance Products (Oakland Building)
1989-Reliance Upholstery (Oakland Building)

1.3 Previous Investigations and Reports

Phase I Environmental Site Assessment, ERAS 15 December 2003: ERAS was contracted to perform a Phase I investigation by a prospective purchaser of the Property. The investigations included records review, site reconnaissance conducted on 7 November 2003, and interviews in accordance with ASTM E1527. The Sanborn maps reviewed showed a 1,000-gallon underground gasoline storage tank (UST) identified by a circle near the center of the property.

The findings of the Phase I investigation included the following items.

- The covered loading dock area was used for storage of some old machinery and an old refrigerator. No indication of spills or unauthorized releases of hazardous substance was noted in this area.
- No monitoring wells, septic systems or drywells were observed on property.
- A water filled sump was later determined to be an unused industrial water production well that was abandoned by the owner. (See permit in **Appendix A.**)
- A water-filled sump was observed in the basement of the northeast side of the building.
- No evidence of current USTs was found except for a vent pipe in the transformer area.
- The basement contained a large amount of old machinery and one room containing waste oil and regulated materials.
- The site at 1600 Peralta Street was considered a potential environmental concern.

ERAS made the following recommendations in the Phase I Report.

1. The owner of the Property should contact the City of Oakland Fire Department to determine the requirements for a formal facility closure.
2. Labeled and unlabeled drums of used oil and hazardous waste stored in the basement should be properly disposed and the surface spills in this area cleaned. Unused equipment should be removed. Mr. Mark Johnson of NAS Construction provided the manifests for the disposal of the hazardous wastes included in

Appendix B. According to Mr. Johnson, the transformer observed by ERAS is currently in use and therefore does not need to be disposed.

3. Small quantities of used motor oil, auto tires, auto batteries and other debris should be removed form the loading dock and the well shed areas. According to Mr. Mark Johnson of NAS Construction, these waste materials were to be properly disposed by the current tenant of the Property.
4. The owner should consult with the appropriate regulatory agencies to determine where the water filled sump and the industrial water well should be sampled, removed or properly abandoned.
5. Perform a detailed utility survey of the courtyard focusing on the former warehouse building site for indications of the former USTs and piping. The survey should include an investigation of the apparent vent pipe. Subsequent communication with the Property owner determined this to be an electrical conduit.
6. Advance soil boring in the vicinity of current and former USTs and associated piping to collect soil and groundwater samples
7. Advance soil borings and collect groundwater samples near the southeast side of the Property to determine whether groundwater contamination may be migrating beneath the Property from the potential up-gradient source at 1600 Peralta Street.

Limited Soil and Groundwater Investigation, ERAS 18 February 2004: ERAS was contracted by a representative of the current owner, Mr. Mark Johnson to conduct subsurface sampling to address recommendations 6 and 7 from the Phase I report. Specifically ERAS was to investigate for evidence of leaks from the two UST onsite. Borings A' and B' were advanced using a direct-push sample rig in the locations shown on **Figure 2** to investigate fuel hydrocarbon contamination associated with the underground USTs. Additionally two more borings were advanced in locations adjacent to the Property to the southeast to detect contamination advancing from the site at 1600 Peralta Street, if present.

Groundwater samples collected from the borings located adjacent to the southeast property boundary did not contain detectable fuel hydrocarbon concentrations. ERAS

concluded that fuel hydrocarbons in groundwater do not appear to be migrating from 1600 Peralta Street to beneath the Property.

Fuel hydrocarbon compounds were detected in the samples collected from borings A' and B' above the applicable ESLs. ERAS recommended additional subsurface investigation to assess the extent of fuel contamination in groundwater around the gasoline UST, and to assess if the dissolved fuel oil contamination associated with the fuel oil tank has advanced offsite of the Property.

Limited Groundwater Investigation, ERAS, 22 March 2004: The previous investigation provided evidence of fuel hydrocarbon leaks from both former USTs. The second investigation was designed to ascertain the local groundwater flow direction, and to gain data for an estimate of the horizontal extent of the known (in the case of the fuel oil UST) or expected (in the case of the gasoline UST) dissolved fuel hydrocarbon plume. The investigation was not designed as a full site investigation. The investigation was designed to gain preliminary information necessary to design a site characterization study and to assess the whether groundwater monitoring wells are appropriate or necessary for site plume characterization.

On 5 March 2004 ERAS seven borings, A through F, to a depth of 10 feet for collection and chemical analysis of groundwater grab-samples. Temporary casings were left in the four on-site borings. Depth to groundwater was measured six hours apart on 8 March 2004 to determine the groundwater flow direction and to assess if it is tidally influenced.

ERAS concluded that dissolved TPH-mo concentrations associated with the former fuel oil tank have not migrated offsite. ERAS also concluded that any dissolved gasoline hydrocarbons associated with the former gasoline UST have not migrated as fare as the borings D through G located 30 to 40 feet from the location of the former gasoline UST.

2.0 SITE CONCEPTUAL MODEL

2.1 Hydrogeological Setting

During drilling in January and March of 2004, the subsurface was found to be comprised of silty sand and poorly-graded fine to medium grained sand to at least 10 feet bgs. First groundwater was encountered at 4 feet bgs. The depth to groundwater was measured in four temporary onsite borings to 10 feet twice, six hours apart on 8 March 2004. The measured top of static water level ranged from 3.1 to 4.3 feet below ground surface. Because static water level is very close to where first water was observed in the formation, the shallow groundwater does not appear to be significantly confined.

Figures 3 and 4 show the groundwater elevation map on 8 March 2004 at high and low tides. The groundwater flow direction was found to be toward the west at both times with a gradient of .01 to .02 foot/foot (1% to 2%). The groundwater flow direction does not appear to change directions due to the change in tidal flow direction.

2.2 Extent of Contamination

Figure 5 shows the estimated locations of the gasoline and fuel oil USTs based upon the 1951 Sanborn Map. This figure also shows the distribution of total petroleum hydrocarbons in the groundwater samples collected to date.

2.2.1 Former Gasoline UST

The location of the former gasoline UST shown on **Figure 5** is taken from the Sanborn map where it is represented as a 10 foot diameter circle. It is labeled as a 1,000 gallon tank which is typically approximately 4 feet in diameter by 12 feet long. Groundwater occurs at about 4 feet bgs. Therefore the tank was buried with the base below the top of groundwater.

Fuel hydrocarbons have a specific gravity less than that of water. Leaked fuel hydrocarbon will tend to float on the groundwater (depressing the top of groundwater) and adsorb to soil in the vadose zone where interstices are not saturated with water. Likewise the most concentrated portion of the dissolved hydrocarbon plume will tend to

stay near the top of groundwater unless there is significant recharge of uncontaminated water such as meteoric water filtering down from an uncovered area or irrigation water filtering down from a landscaped area. The courtyard area where the gasoline UST was located is covered in concrete. Therefore a plunging hydrocarbon plume is unlikely. The most concentrated portion of a possible dissolved hydrocarbon plume is expected to occur at or near the top of groundwater.

The boring at A' encountered auger refusal at five feet bgs against what appeared to be concrete. Oily silty sand was encountered from 4 to 5 feet bgs and sampled for chemical analysis. ERAS believes that this oily sand may be backfill in the former pit above the concrete "dead boy" used to prevent the UST from floating on groundwater when empty. The sand sample was analyzed for total extractable petroleum hydrocarbons (TEPH,), total petroleum hydrocarbons in the gasoline range (TPH-g, EPA 8015), benzene, toluene, ethylbenzene, total xylenes (BTEX) and methyl tertiary butyl ether (MTBE). The analytical results are tabulated below.

Table 1. Analytical Results for Solid Sample A',4.5-5 – January 29 2004

	TPH-mo	TPH-d	TPH-k	TPH-g	B	T	E	X	MTBE
A'	**5,810**	**5,720**	**3,270**	**327**	<0.250	0.398	0.772	3.30	<0.250
ESL - DW	500	100	100	100	0.044	2.86	3.28	1.47	0.023
ESL - NDW	**500**	**500**	**500**	**100**	0.177	9.29	4.7	1.47	2.0

Notes:
All concentrations in milligrams per kilogram (mg/kg)
ESL-DW = Environmental Screening Level for residential land use (RWQCB July 2003) for shallow soil overlying potential drinking water.
ESL-NDW = ESL for shallow soil overlying groundwater that is not potential drinking water.

Groundwater grab-samples were collected from borings D through G to assess the horizontal extent of dissolved hydrocarbon around the former gasoline UST if present. Groundwater was collected from at an interval of the top of groundwater to ten feet bgs, approximately the top six feet of groundwater. The groundwater samples were analyzed for TPH-g, TPH-d, TPH-mo, BTEX and MTBE. None of the analytes were detected above the detection limit.

Figure 5 shows the boring locations and results for TPH-g and TPH-mo. Note boring D is 20 feet directly down-gradient of boring A' and 30 feet down-gradient of the location of the former UST shown on the Sanborn map (1951). Therefore any dissolved fuel hydrocarbon associated with the former gasoline UST has not migrated more than 30 feet in the down-gradient direction.

2.2.2 Fuel Oil UST

The estimated location of the fuel oil tank is shown on **Figure 5.** This location is based on the 1951 Sanborn map where the label "fuel oil" appeared. There was no symbol showing the actual location, or any indication whether the tank was above ground or underground. If the tank was buried it was likely set as shallowly as possible because fuel oil tanks typically fed the boiler or other equipment by gravity rather than by pump.

Figure 5 shows the location of boring B' as well as the analytical results for groundwater. The groundwater grab sample collected at the depth interval of 4 to 8 feet bgs from boring B' was analyzed for TEPH and found to contain 3,200 µg/L TPH-mo, while total petroleum hydrocarbons in the diesel range (TPH-d) and the kerosene range (TPH-k) were not detected above the laboratory reporting limit of 50 µg/L. This result indicates that boring B' is located in the vicinity of the former fuel oil tank and that a leak from the former fuel oil tank has impacted the groundwater above the ESL for residential land use.

Figure 5 shows the locations of offsite borings A through C along Campbell Street as well as the analytical results for groundwater. Groundwater grab-samples collected from the depth interval of 4 to 10 feet bgs, or approximately the top six feet of the saturated zone. As discussed the Section 2.2.1, because the specific gravity of fuel oil is lighter than water, the most concentrated portion of a dissolved fuel hydrocarbon is typically found at or near the top of the saturated zone unless there is a recharge area. The area between the fuel oil tank and the offsite borings is mostly under the building and completely covered

2.3 Risk Evaluation for Potential Receptors

Figures 6 and 7 present a flow chart to evaluate the risk of potential exposure routes to various receptors by comparing the analytical results for soil and groundwater samples to the RWQCB Tier I ESLs (July 2003) for residential land use where groundwater is not potential drinking water.

2.3.1 Former Gasoline UST

Figure 6 presents the risk flow chart for the former gasoline UST located near the center of the Property. Sample A'4.5-5 was collected from shallow soil either at the site of the former UST or within 10 feet of the UST location as shown on the Sanborn Map.

The chart shows that the sample contained TPH-g and TPH-mo above the ceiling ESL. The ceiling ESL is based on nuisance concerns such as odor. However these concentrations are below the ESLs for direct exposure, therefore there is not a significant risk associated with dermal contact or ingestion of the soil.

Following the volatilization pathway, The BTEX concentrations detected in are below the ESLs for indoor air. Therefore, there is not a significant risk posed by inhalation of vapors emanating from the shallow soil.

Comparing the analytical results to the ESL for leaching to groundwater, only the TPH-mo is above the ESL. Thus, residual TPH-mo contamination in the shallow soil may act as a source of contamination to the underlying groundwater. The groundwater samples collected from borings D through G, which surround the area of the former gasoline UST, were not found to contain detectable concentrations of petroleum hydrocarbons. These results demonstrate that any dissolved plume has not advanced offsite. Therefore no risk to offsite aquatic habitat is posed by a leak from the former gasoline UST. However, groundwater immediately below the former UST has not been sampled. Therefore, the absence of potential risks to future residence of the property has not been shown. Therefore potential risk to future residents are indicated on **Figure 6** by dermal contact or ingestion of groundwater in that immediate area (for example if an irrigation well is

installed at that location), and by inhalation of indoor air (for example if a residential structure is built over the former UST location).

2.3.2 Former Fuel Oil UST

Figure 7 presents the risk exposure route and receptor flow chart for the former fuel oil UST believed to have been located along the northwest wall of the central courtyard. Vadose zone soil samples have not been collected because groundwater is at about 4 feet bgs, so that a leak from a UST is likely to be directly into the saturated zone. However, due to this fact potential current or future risks to human health due to dermal contact or ingestion of shallow soil or inhalation of fuel hydrocarbons volatilized to indoor air have not been eliminated. Also the potential of leaching of residual contamination in the soil to the groundwater has not been eliminated.

As shown in the "secondary source" column of **Figure 7,** the maximum concentration of TPH-mo in groundwater, detected in the sample from source area boring B', is above the ceiling ESL (odor etc.). The maximum concentration of TPH-g in groundwater was detected in the sample from offsite boring A at 284µg/L, below the ceiling ESL. However, it should be noted that analysis for TPH-g was not run for the groundwater sample from boring B'.

The maximum TPH-g concentration is below the ESL for the protection of aquatic habitat. None of the three groundwater samples collected along Campbell Street were found to contain TPH-mo, TPH-d, or TPH-k. Therefore risk to offsite aquatic habitat is not posed by groundwater migrating down-gradient from the Property. However, since the last subsurface investigation, it has come to the attention of ERAS that groundwater collected in the basement sump adjacent to the former fuel oil tank is pumped out to the driveway, which then presumably flows into the storm sewer and ultimately the San Francisco Bay. Therefore pending testing of the water in the sump, aquatic habitat is cited at potentially at risk based on the high concentration of TPH-mo in the groundwater near the sump.

Concentrations of BTEX in the groundwater sample from boring A were found to be below the ESLs for indoor air. However, groundwater collected from the area near the former fuel UST or the area under the building between boring A and the former fuel oil tank has not been analyzed for BTEX. Therefore, the northeast portion of the Property has not been fully characterized with respect to BTEX contamination of the indoor air and current workers and visitors and future site residents are sited as potentially at risk on **Figure 7**.

The concentration of TPH-mo in groundwater from boring B' is above the ESL for drinking water toxicity. Therefore, future onsite residents are cited as potentially at risk if a well is installed in the vicinity of the former fuel oil tank, creating a pathway for dermal contact with or ingestion of the shallow groundwater. The concentration of TPH-g in offsite boring A is slightly above the drinking water ESL. Therefore, offsite wells located down-gradient of the Property, if present, are cited as a potential receptor.

2.4 Data Gaps in Site Conceptual Model

The previous investigations were not designed to fully characterize contamination at the site. However it is useful at this juncture to use the Site Conceptual Model to risk evaluation to identify areas in need of further investigation.

ERAS identifies the following data gaps.

1. Groundwater collected from the basement sump should be analyzed to assess potential risk to aquatic habitat.
2. The subsurface under the hazardous waste storage area has not been analyzed for hazardous waste compounds (TPH-g TEPH, volatile organic compounds, semi-volatile organic compounds, CAM 17 metals, and PCBs).
3. Analysis for TPH-g of groundwater from vicinity former fuel oil UST and hazardous waste storage room to asses these areas as possible sources of the TPH-g concentrations in groundwater from boring A.
4. The groundwater from the area of the former gasoline UST should be analyzed for TPH-g/BTEX and TEPH for comparison to the ESLs for volatilization to

indoor air and drinking water toxicity and confirm or eliminate future residents as potential receptors at risk.

5. Analysis of vadose zone soil from the area of the fuel oil UST for comparison to ESLs for direct exposure, leaching to groundwater, and volatilization to indoor air.
6. Analysis groundwater from the vicinity of fuel oil tank for comparison of results to ESLs for drinking water toxicity and volatilization to indoor air.

3.0 WORK PLAN

The purpose of the proposed remediation and investigation is to remove contaminated soil around the two former USTs that may act as a source of contamination to the groundwater and to collect data to address gaps identified in the Site Conceptual Model (SCM).

3.1 SCOPE OF WORK

The proposed scope of work is as follows.

- Groundwater appears to enter into the basement sump from the southeast and northeast sides of the sump and is discharged the driveway flowing to 17th Street. Collect a water sample from the basement sump for analysis of TPH-g, TEPH, and BTEX for comparison to ESLs for aquatic habitat (**SCM data gap 1**).
- The basement sump does not receive groundwater directly from the area under the former hazardous waste storage area. Therefore, to screen the subsurface for contaminant leaks a boring will be advanced to about 8 feet bgs, a soil sample from the unsaturated zone and a groundwater grab-sample will be collected (**SCM data gap 2**). The samples will be analyzed for TPH-g and TEPH (EPA Method 8015), volatile organic compounds (VOCs, EPA Method 8260), semi-volatile organic compounds (SVOCs, EPA Method 8270), CAM 17 metals (EPA Method series 6010), and PCBs (EPA Method 8082). Additionally, analytical results for TPH-g in the groundwater will be used to assess whether the source of the TPH-g

detected in the groundwater samples along Campbell Street is on the Property (**SCM data gap 3**).

- Excavate soil in the area of the former fuel oil tank to an initial depth of about 8 feet bgs. Collect bottom and sidewall confirmatory samples from the saturated zone. Instruct laboratory to decant moisture from the confirmatory samples and analyze the samples for TEPH.
- Collect vadose zone samples from northwest sidewall of the fuel oil UST excavation (adjacent to building wall). Analyze samples for TEPH and TPH-g/BTEX for comparison to the ESLs for direct exposure, leaching to groundwater and volatilization to indoor air (SCM data gap 5).
- Collect a groundwater sample from the fuel oil UST excavation and analyze for TPH-g/BTEX and TEPH (SCM data gap 3). Compare the analytical results to ESLs for drinking water toxicity and volatilization to indoor air (SCM data gap 6).
- Excavate soil around the former gasoline UST to an initial depth of about 8 feet bgs. Collect bottom and sidewall confirmatory soil samples. Instruct the laboratory to decant off the soil moisture and analyze the sample solid for TPH-g/BTEX and TEPH.
- Collect a groundwater sample from the gasoline UST excavation. Analyze sample for TEPH and TPH-g/BTEX and compare results to ESLs for drinking water toxicity and volatilization to indoor air (SCM data gap 4).
-

3.2 INVESTIGATION ACTIVITIES

Figure 8 shows the locations of the proposed hand-auger boring, HA-1, sump water sample SS-1, and the two proposed excavations in the areas of the former fuel oil and gasoline USTs.

3.2.1 Pre-field Activities

ERAS will obtain a drilling permit for from the Alameda County Public Works and prepare a site-specific Health & Safety Plan. Underground Service Alert will be notified of the subsurface work at least three working days prior to field work. This will allow the various utilities with underground lines in the area to mark their line locations before final clearance. Before excavation and boring is begun, a private underground line locator will be used to give final clearance for the proposed work locations.

3.2.2 Sump Water Sample Collection

Groundwater collected in the sump will be collected using a peristaltic pump. The base of the sample tubing set near the floor of the sump to avoid the top few inches of water where VOCs may have volatilized into the atmosphere. A water sample will be decanted into the containers for TPH-g/BTEX first, followed by decanting into sample containers for TEPH analysis. Samples will be labeled and kept in a cooler with ice or refrigerated until transport under chain-of-custody procedures to the state-certified environmental laboratory.

3.2.3 Hand-Auger Boring and Sampling

The concrete floor at the location for soil boring HA-1 will be cored. The boring will be advanced to a total depth of about 5 feet bgs using a post-hole digger or hand-auger. Immediately under the concrete and fill, a soil sample will be collected in the natural formation using a slide hammer to fill two four or six-inch brass tubes. The Standard Operating Procedure for Hand Coring and Soil Sampling is included as the **Appendix C.**

Groundwater is expected at about 1 foot below the floor of the basement. The boring will be dug to about 4 feet below the top of water. A five-foot length of one-inch diameter PVC well screen will be inserted into the boring. The groundwater sample will be withdrawn using a peristaltic pump. The groundwater will be decanted into appropriate containers, labeled and held in a cooler with ice or refrigerated until transport under chain of custody procedures to the laboratory.

3.2.4 Soil Excavation

A hazardous waste removal contractor will be contracted to excavate soil in the areas of the fuel oil and gasoline USTs. The hazardous waste removal contractor will excavate soil from the areas as shown on **Figure 8** to an initial depth of 8 feet bgs. If no NAPL or hydrocarbon stain is visible, four sidewall and two bottom confirmatory soil samples will be collected (six total samples from each excavation). Standard Operating Procedures for soil sampling are included in **Appendix C**. The final depth and area of the excavation will be determined by the analytical results of the confirmatory soil samples.

If additional excavation is required in either excavation, confirmation soil samples will be collected at a minimum of every 30 feet along the sidewall and a bottom sample for every 900 square feet of excavation floor. Excavation will continue until the analytical results for the confirmatory soil samples are below the Target Contaminant Levels (TCLs), or until excavation is no longer feasible due to the presence of above or below ground facilities.

The following **TCLs** are proposed based on the ceiling ESL for shallow soil, residential land use, where impacted groundwater is not potential drinking water:
TPH-residual equal to or less than **500 mg/kg**; and
TPH-g equal to or less than **100 mg/kg.**

The confirmation soil samples will be collected from below the top of groundwater. Therefore, the laboratory will be instructed to decant free water from the samples and analyze the solid portion. All confirmatory soil samples will be analyzed for an extractable fuel scan (TEPH) by EPA Method 8015 with silica gel cleanup and for TPH-g/BTEX bye EPA Method 8015/8020 on a 24 hour turnaround time.

3.2.5 Solid Waste Profile and Disposal

Excavated soil will be stockpiled on plastic sheeting. Following excavation, soil samples will be collected. Four soil samples will be collected and composited into one sample for laboratory analysis to profile the soil for proper disposal. The stockpiled soil will be covered with plastic sheeting until removal for disposal to an appropriate facility.

3.3 CHEMICAL ANALYSIS OF SAMPLES

All soil and water samples will be stored in a cooler with ice or refrigerated until transport under chain-of-custody procedures to a state-certified environmental analytical laboratory.

The chemical analyses for each sample with method number are tabulated below.

Table 2. Sample Analysis Summary

Sample Location	TPH-g/ BTEX (8015/ 8020)	TEPH w/silica gel stnd (8015)	Total Pb (7000)	TPH-g (8015)	VOC (8260)	SVOC (8270)	PCBs (8082)	CAM 17 Metals (6010)
Gas UST Excavation								
Soil	X[1]	X[1]						
Water	X	X						
FO UST Excavation								
Soil	X[1]	X[1]						
Water	X	X						
Stockpile								
Soil	X	X	X					
Sump SS-1								
Water	X	X						
HazWaste HA-1								
Soil		X		X	X	X	X	X
Groundwater		X		X	X	X	X	X[2]

1 Instruct Laboratory decant free-water from sample and analyze solid portion. If concentrations in excavation water sample are found to be high enough to potentially impact the analytical results for soil, then the soil samples will be analyzed for percent moisture and the decanted water will be analyzed also. These results will be used to calculate the impact of concentrations in water on the results for soil samples.
2 Collect into unpreserved container. Instruct laboratory to filter sample prior to analysis.

3.7 REPORT PREPARATION

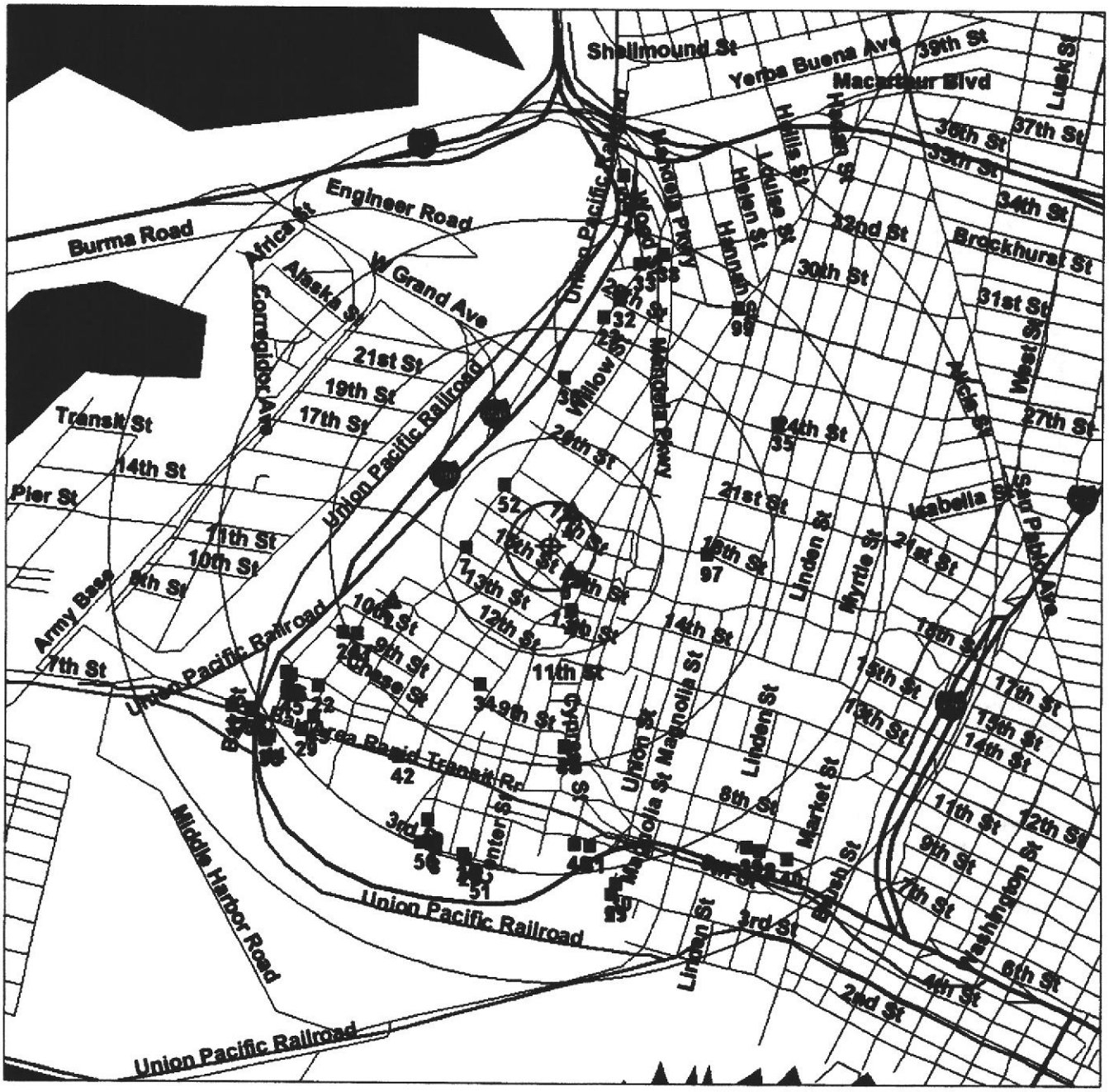
A report will be submitted to the ACEHS within 60 days following the end of field data collection. The report will include details of the field procedures, scale map showing extent of the excavations and sample locations, analytical results for all samples, a refined SCM and updated risk analysis.

Environmental FirstSearch

1 Mile Radius

ASTM: NPL, RCRACOR, STATE

1614 CAMPBELL ST, OAKLAND CA 94607



Source: 1999 U.S. Census TIGER Files

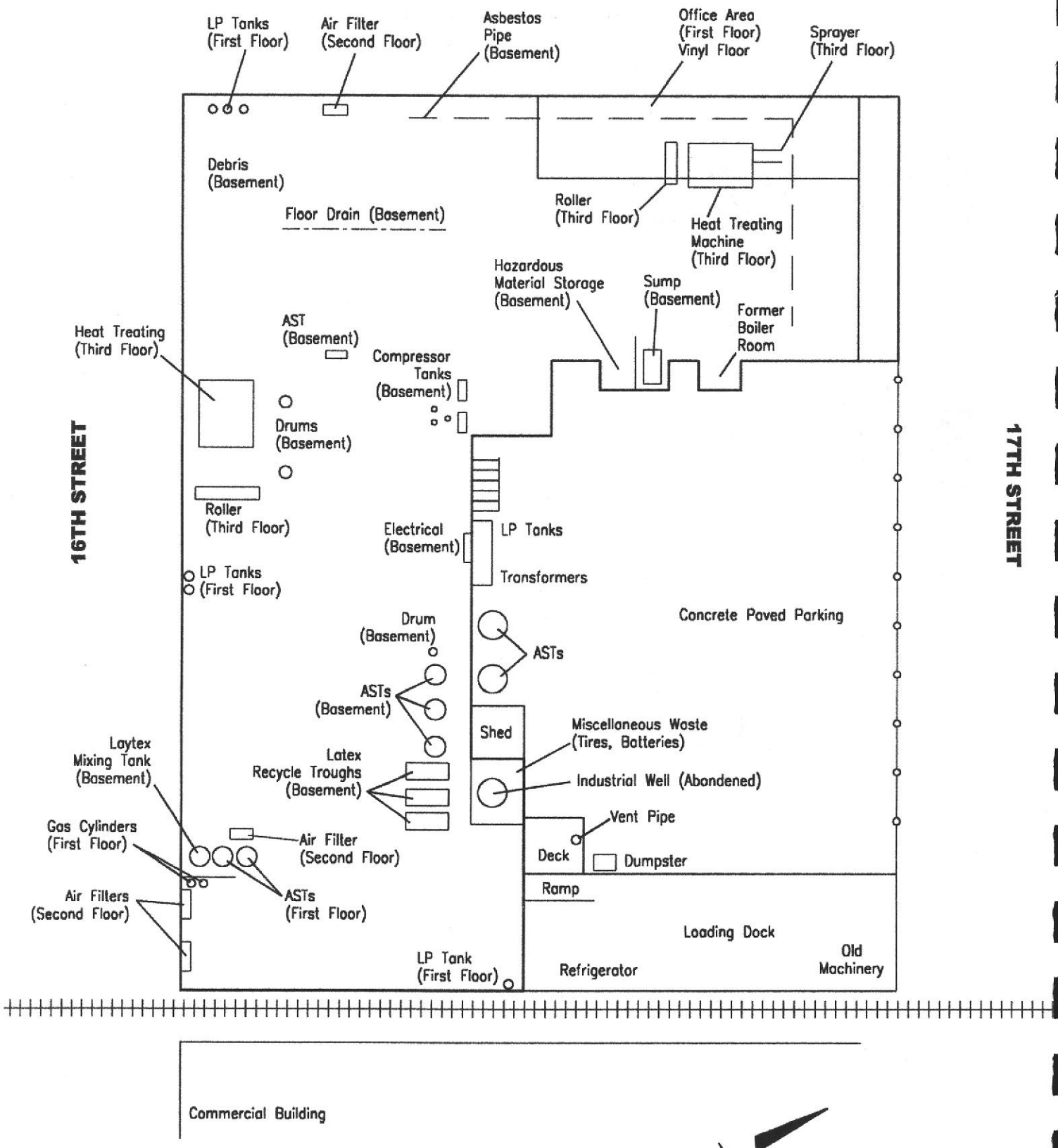
Target Site (Latitude: 37.813568 Longitude: -122.294144) .....

Identified Site, Multiple Sites, Receptor .....

NPL, Solid Waste Landfill (SWL) or Hazardous Waste .....

Railroads .....

Black Rings Represent 1/4 Mile Radii; Red Ring Represents 500 ft. Radius

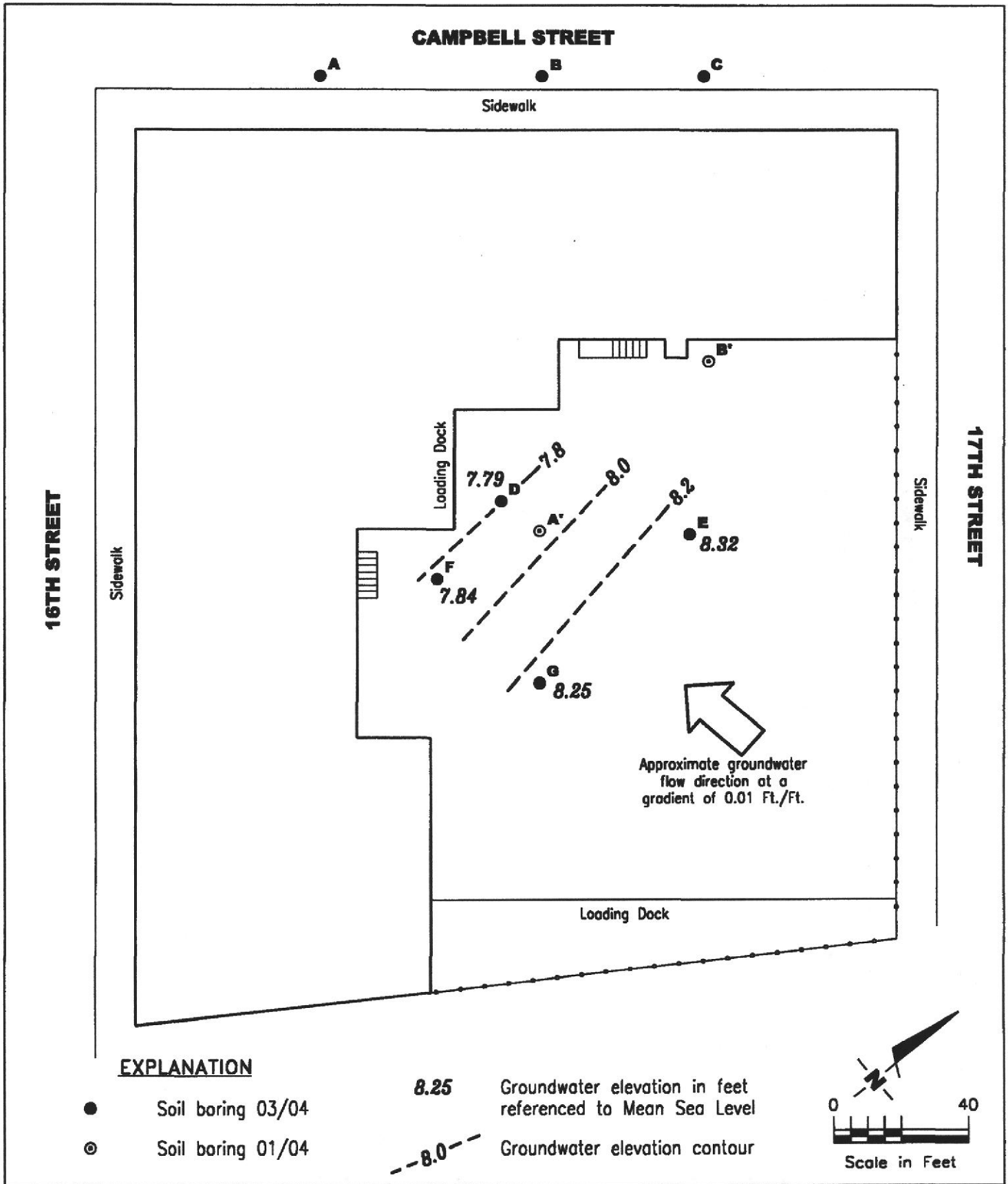


PROPERTY SITE PLAN **FIGURE 2**

Project No. 03184
1614 Campbell Street
Oakland, California

November, 2003
Not to Scale

ERAS Environmental

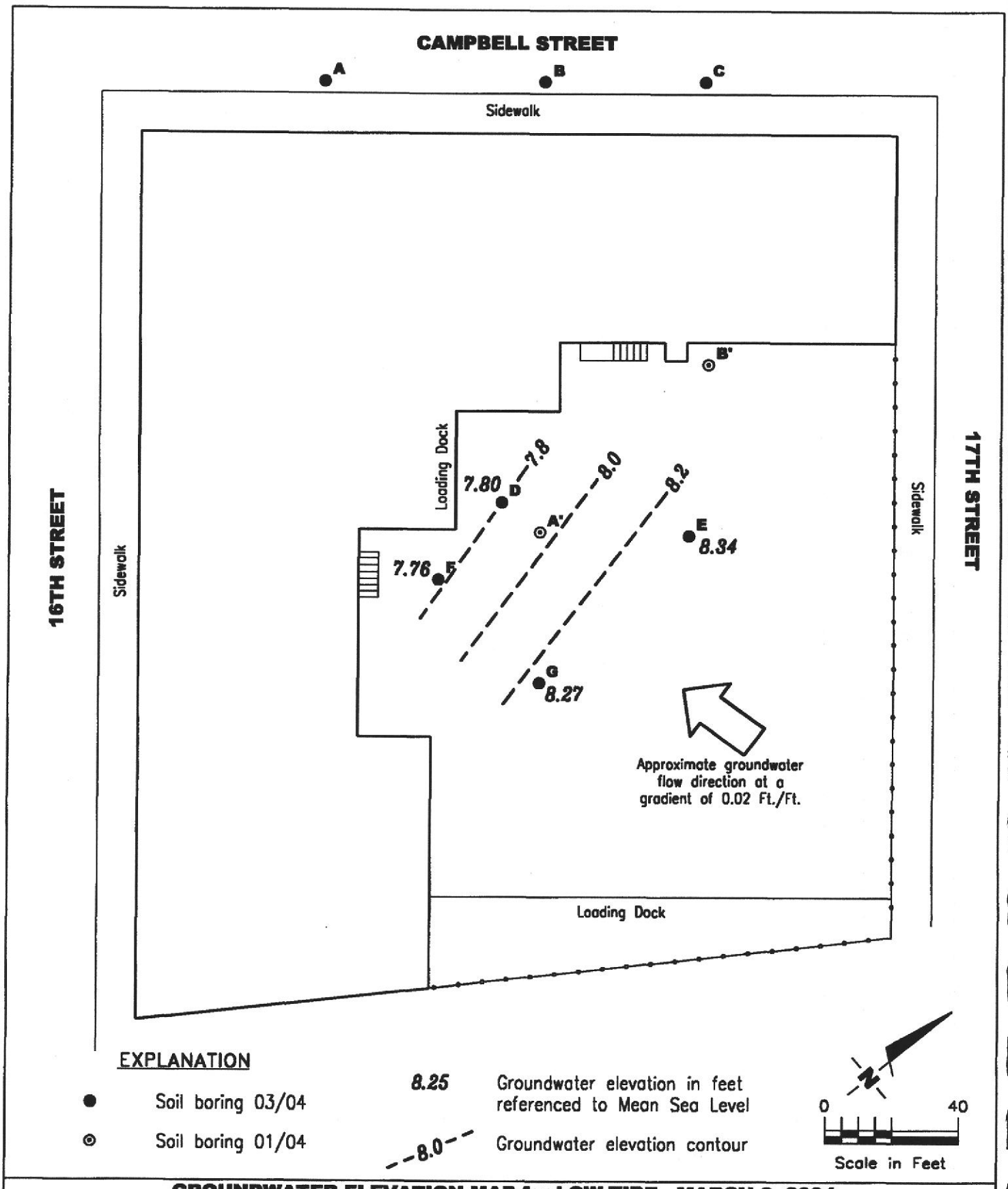


GROUNDWATER ELEVATION MAP for HIGH TIDE - MARCH 8, 2004

DATE 03/04 REVIEWED BY DS	1614 Campbell Street Oakland, California	JOB NUMBER 03184B FIGURE 3

ERAS Environmental Inc.

ERAS 03-21-04 GWEN:03-04.dwg

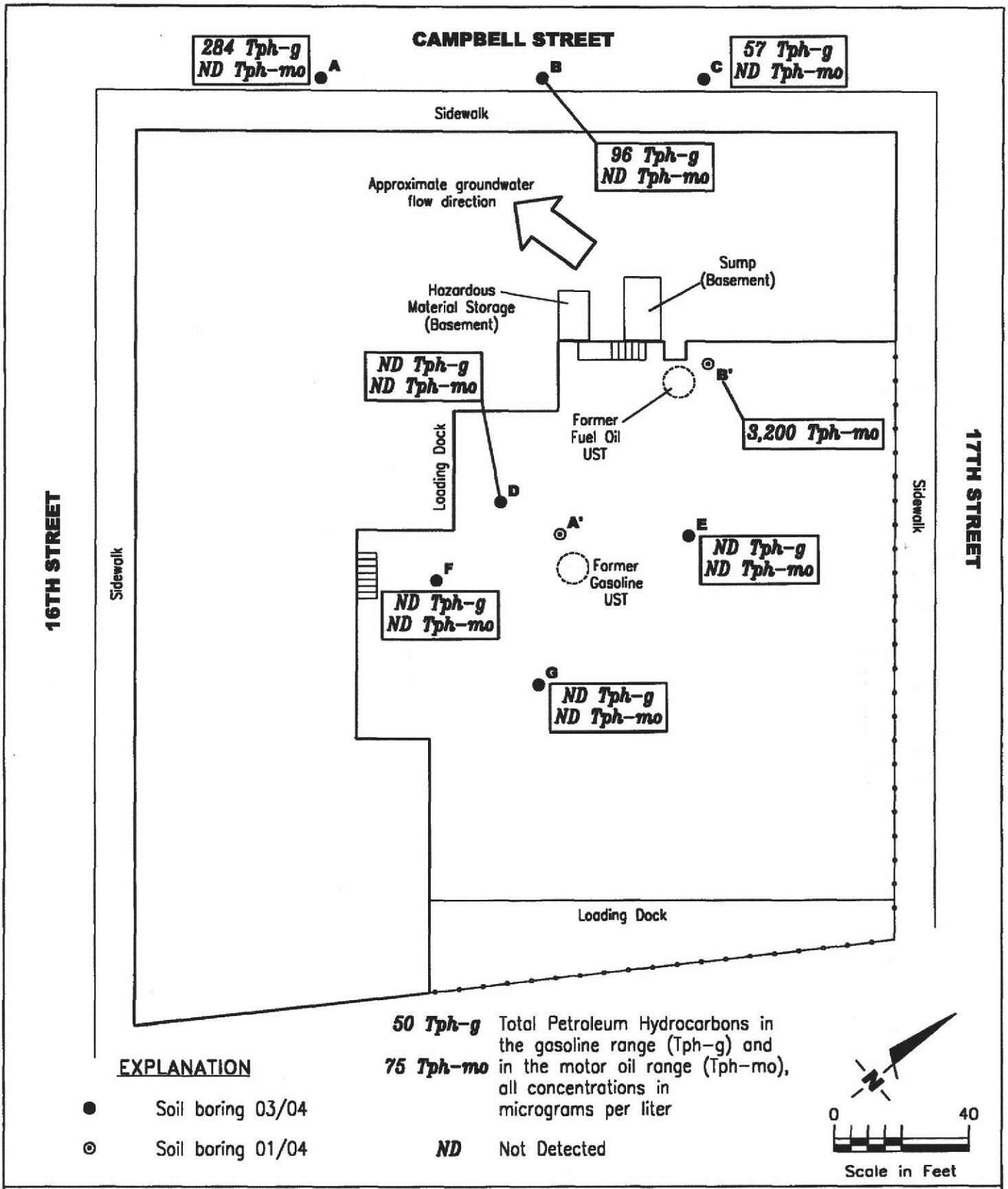


GROUNDWATER ELEVATION MAP for LOW TIDE - MARCH 8, 2004

DATE 03/04 REVIEWED BY DS	1614 Campbell Street Oakland, California	JOB NUMBER 03184B FIGURE 4

ERAS Environmental Inc.

ERAS 03-21-04 GWE1t03-04.dwg



DISTRIBUTION of PETROLEUM HYDROCARBONS in GROUNDWATER

DATE		JOB NUMBER
09/04	1614 Campbell Street Oakland, California	04-001-02
REVIEWED BY GMJ		FIGURE 5

ERAS Environmental Inc.

ERAS 09-28-04 Tphg-no.dwg

FIGURE 6. RISK EXPOSURE ROUTE AND RECEPTOR FLOWCHART - GASOLINE UST SCREENING LEVELS FOR RESIDENTIAL LAND USE, NOT POTENTIAL DRINKING WATER

1614 Campbell Street, Oakland, CA

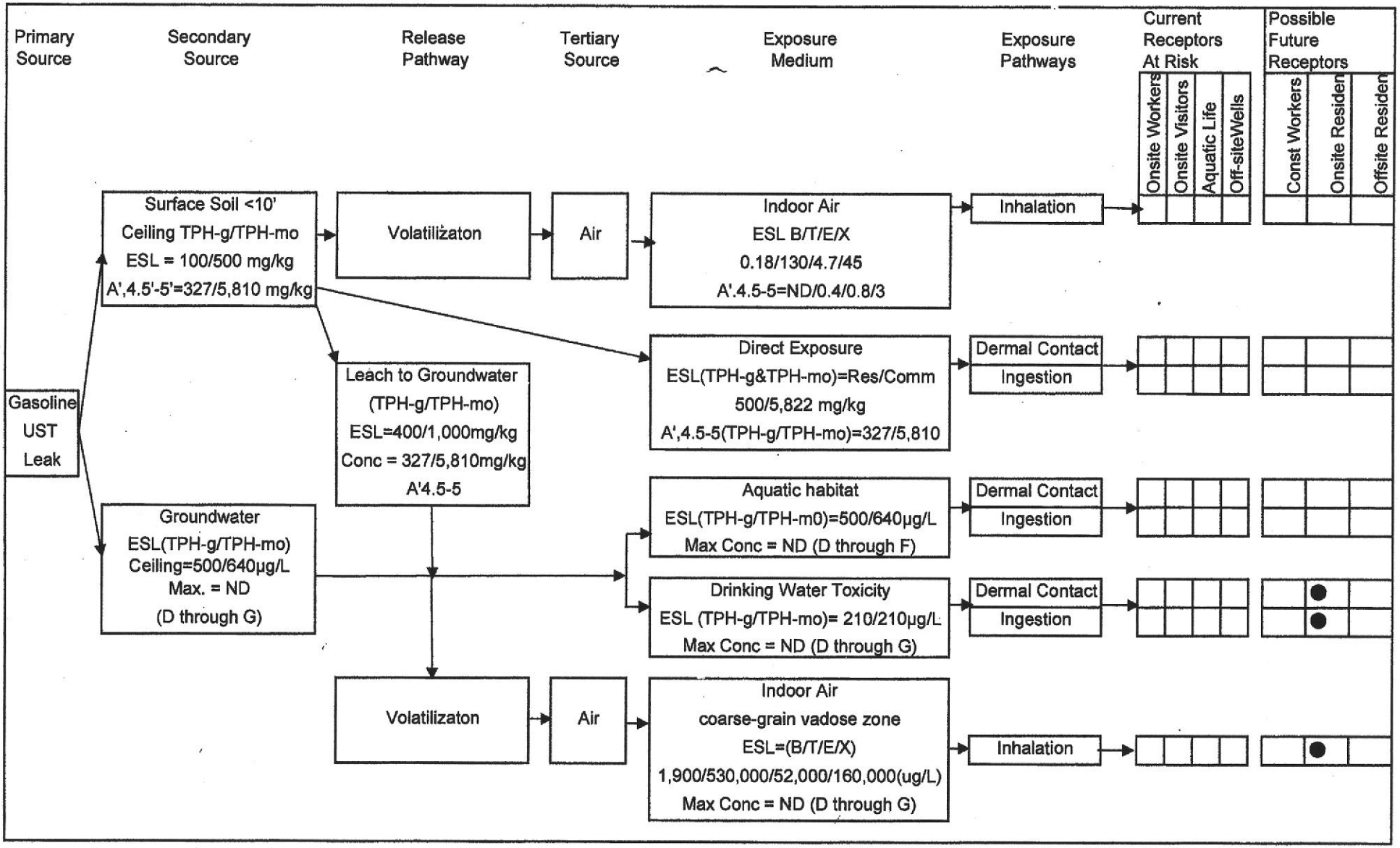
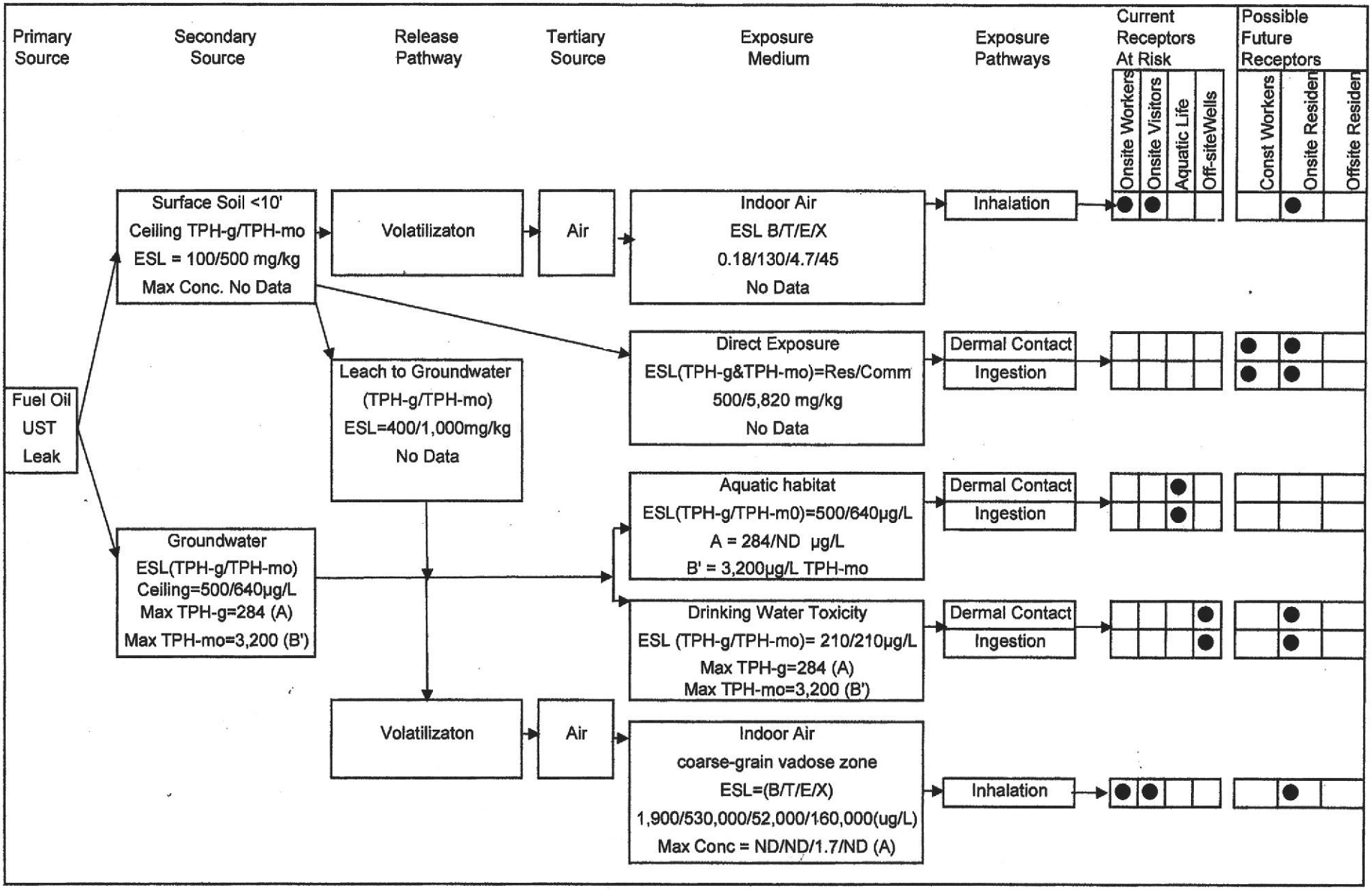
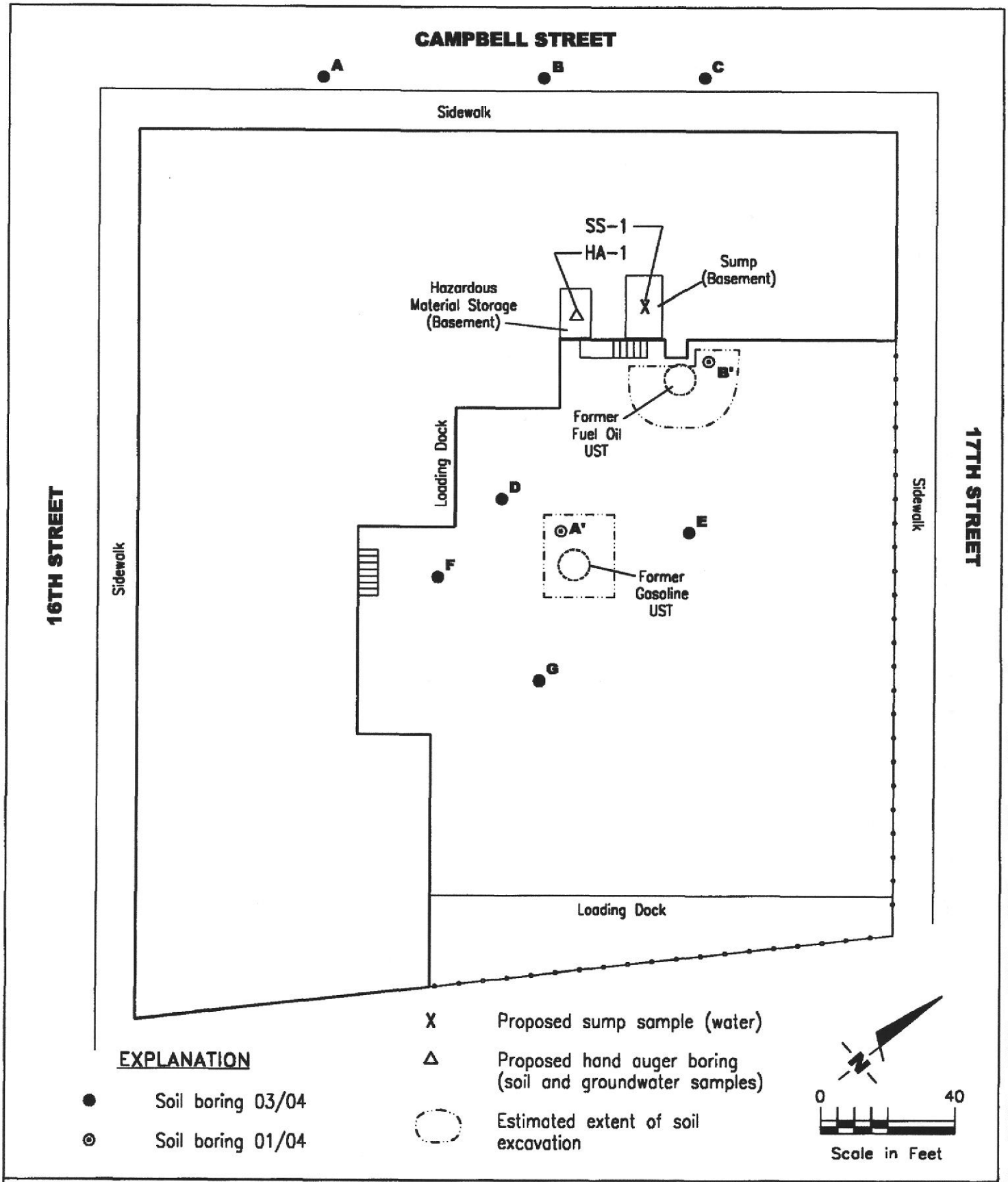


FIGURE 7. RISK EXPOSURE ROUTE AND RECEPTOR FLOWCHART - FUEL OIL UST SCREENING LEVELS FOR RESIDENTIAL LAND USE, NOT POTENTIAL DRINKING WATER

1614 Campbell Street, Oakland, CA





PROPOSED SOIL EXCAVATION AND SAMPLE LOCATIONS

DATE 09/04 REVIEWED BY GMJ	1614 Campbell Street Oakland, California	JOB NUMBER 04-001-02 FIGURE 8

ERAS Environmental Inc.

ERAS 09-28-04 Proposed Excav-Sample.dwg

APPENDIX A

WELL ABANDONMENT DOCUMENTS

ALAMEDA COUNTY PUBLIC WORKS AGENCY

WATER RESOURCES SECTION
399 ELMHURST ST. HAYWARD, CA. 94544-1395
PHONE (510) 670-6633 James Yoo FAX (510) 782-1939

PERMIT NO. W04-0121

WATER RESOURCES SECTION
GROUNDWATER PROTECTION ORDINANCE
Destruction of Wells (Less than 45 feet in depth)

Destruction Requirements: **PRESSURE GROUTING # 1**

1) Remove any casing(s) and annular seal to 3-5 feet below finished grade of original ground, whichever is the lower elevation

2) Destroy well by grouting neat cement with a tremie pipe or pressure grouting (25 psi for 5min.) to the bottom of the well and by filling with neat cement to three (3-5) feet below surface grade. Allow the sealing material to spill over the top of the casing to fill any annular space between casing and soil (Cement) OK. JY.

3) After the seal has set, backfill the remaining hole with concrete or compacted material to match existing conditions.

4) Drilling permits are valid from the start date to the completion date. Permits can be extended by a phone call, but drilling permit applications will not be extended beyond 90 days from the approved start date. **Permit is valid from February 4 to February 11, 2004.**

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

6) Permit is valid only for the purpose specified herein. No changes in construction procedures, as described on this permit application. This permit may be voided if it contains incorrect information.

7) Drilling Permit(s) can be voided/ canceled only in writing. It is the applicants responsibilities to notify Alameda County Public Works Agency, Water Resources Section in writing for an extension or to cancel the drilling permit application. No drilling permit application(s) shall be extended beyond ninety (90) days from the original start date. Applicants may not cancel a drilling permit application after the completion date of the permit issued has passed

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

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

ALAMEDA COUNTY PUBLIC WORKS AGENCY

WATER RESOURCES SECTION
399 ELMHURST ST. HAYWARD CA. 94544-1395
PHONE (510) 670-6633 Jerome Yau
FAX (510) 782-1939
APPLICATIONS PLEASE ATTACH A SITE MAP FOR ALL DRILLING PERMIT APPLICATIONS
DESTRUCTION OF WELLS OVER 45 FEET REQUIRES A SEPARATE PERMIT APPLICATION

DRILLING PERMIT APPLICATION

FOR APPLICANT TO COMPLETE

LOCATION OF PROJECT
1614 Campbell Street
Oakland CA

CLIENT
Name Nas Construction & Inc
Address 11542 Knoll St #1 Phone 714-838-1876
City Garden Grove CA Zip 92641

APPLICANT
Name Pacific Coast Well & Pump Inc
Fax 925-827-5913
Address 25 Crescent Drive #142 Phone 925-798-8825
City Pleasant Hill CA Zip 94523

TYPE OF PROJECT

Well Construction		Geotechnical Investigation	
Cathodic Protection	☐	General	☐
Water Supply	☐	Contamination	☐
Monitoring	☐	Well Destruction	☒

PROPOSED WATER SUPPLY WELL USE

New Domestic	☐	Replacement Domestic	☐
Municipal	☐	Irrigation	☐
Industrial	☐	Other	☐

DRILLING METHOD:

Mud Rotary	☐	Air Rotary	☐	Auger	☐
Cable	☐	Other	☐		

DRILLER'S NAME Jonathan Leavitt / Michael Klossen

DRILLER'S LICENSE NO. 810579

WELL PROJECTS
Drill Hole Diameter 10 in. Maximum
Casing Diameter ____ in. Depth 12 ft.
Surface Seal Depth 12 ft. Owner's Well Number ____

GEOTECHNICAL PROJECTS
Number of Borings ____ Maximum
Hole Diameter ____ in. Depth ____ ft.

STARTING DATE 2-5-04

COMPLETION DATE 2-11-04

I hereby agree to comply with all requirements of this permit and Alameda County Ordinance No. 73-68.

APPLICANT'S SIGNATURE [signature] DATE 2-2-04

PLEASE PRINT NAME Jonathan Leavitt

Rev.9-18-02

FOR OFFICE USE
PERMIT NUMBER WR4-0121
WELL NUMBER ____
APN ____

PERMIT CONDITIONS
Circled Permit Requirements Apply

A. GENERAL
1. A permit application should be submitted so as to arrive at the ACPWA office five days prior to proposed starting date.
2. Submit to ACPWA within sixty days after completion of permitted original Department of Water Resources Well Completion Report.
3. Permit is void if project not begun within 90 days of approved date.

B. WATER SUPPLY WELLS
1. Minimum surface seal thickness is two inches of cement grout placed by tremie.
2. Minimum seal depth is 50 feet for municipal and industrial wells or 20 feet for domestic and irrigation wells unless a lesser depth is specially approved.

C. GROUNDWATER MONITORING WELLS INCLUDING PIEZOMETERS
1. Minimum surface seal thickness is two inches of cement grout placed by tremie.
2. Minimum seal depth for monitoring wells is the maximum depth practicable or 20 feet.

D. GEOTECHNICAL
Backfill bore hole by tremie with cement grout or cement grout/sand mixture. Upper two inches to be replaced in kind or with compatible cuttings.

E. CATHODIC
Fill hole above anode zone with concrete placed by tremie.

F. WELL DESTRUCTION
Send a copy of work plan. A separate permit is required for wells deeper than 45 feet.

G. SPECIAL CONDITIONS PG #1

NOTE: One application must be submitted for each well or well destruction. Multiple borings on one application are acceptable for geotechnical and contamination investigations.

APPROVED [signature] DATE 2-4-04

APPENDIX B

WASTE DISPOSAL DOCUMENTS

WASTE MANIFEST CAC00DSDY5575 1876 of 1

is not required by Federal law

1. Generator's Name and Mailing Address: WESTERN NON WOVENS / 1051 CAMPBELL ST / [illegible]

4. Generator's Phone [illegible]

A. State Manifest Document Number **22951876**

B. State Generator's ID

5. Transporter 1 Company Name: SAFETY-KLEEN SYSTEMS, INC

6. US EPA ID Number: TXR000050930

C. State Transporter's ID (Reserved.)

D. Transporter's Phone 800 669-5840

7. Transporter 2 Company Name

8. US EPA ID Number

E. State Transporter's ID (Reserved.)

F. Transporter's Phone

9. Designated Facility Name and Site Address: 050702 EVERGREEN OIL INC / 6880 SMITH AVE / NEWARK CA 94560

10. US EPA ID Number: CAD980887418

G. State Facility's ID: CAD980887418

H. Facility's Phone: 510 795-4400

11. US DOT Description (including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	Type	13. Total Quantity	14. Unit Wt/Vol	I. Waste Number
a. NON-RCRA HAZARDOUS WASTE LIQUID OIL, ~~WATER, SLUDGE (NOT DOT REGULATED)~~	001	TT	02600	G	State 221 EPA/Other NONE
b.					State EPA/Other
c.					State EPA/Other
d.					State EPA/Other

J. Additional Descriptions for Materials Listed Above: 55270

K. Handling Codes for Wastes Listed Above: a. 01 b. c. d.

15. Special Handling Instructions and Additional Information

MFST R/T#000000000 7-178-01

EMERGENCY RESP 800-468-1760(24 HR). IF UNDELIVERABLE RETURN TO GENERATOR. SK CORP AUTHORIZED TO RETAIN LICENSED SUBSEQUENT CARRIERS AS NECESSARY.

SKDOT# A. 23106 B. C: D:

16. GENERATOR'S CERTIFICATION: I hereby declare that the contents of this consignment are fully and accurately described above by proper shipping name and are classified, packed, marked, and labeled, and are in all respects in proper condition for transport by highway according to applicable international and national government regulations.

If I am a large quantity generator, I certify that I have a program in place to reduce the volume and toxicity of waste generated to the degree I have determined to be economically practicable and that I have selected the practicable method of treatment, storage, or disposal currently available to me which minimizes the present and future threat to human health and the environment; OR, if I am a small quantity generator, I have made a good faith effort to minimize my waste generation and select the best waste management method that is available to me and that I can afford.

Printed/Typed Name: Mike Klassen | Signature: [signature] | Month Day Year: 02 17 04

17. Transporter 1 Acknowledgement of Receipt of Materials

Printed/Typed Name: CRAIG KICKG | Signature: [signature] | Month Day Year: 02 17 04

18. Transporter 2 Acknowledgement of Receipt of Materials

Printed/Typed Name | Signature | Month Day Year

19. Discrepancy Indication Space

20. Facility Owner or Operator Certification of receipt of hazardous materials covered by this manifest except as noted in Item 19.

Printed/Typed Name: PARAM S SINGH | Signature: [signature] | Month Day Year: 02 18 04

IN CASE OF EMERGENCY OR SPILL, CALL THE NATIONAL RESPONSE CENTER 1-800-424-8802. WITHIN CALIFORNIA, CALL 1-800-852-7550

DO NOT WRITE BELOW THIS LINE.

DTSC 8022A (1/99)
EPA 8700-22

Yellow: TSDF SENDS THIS COPY TO GENERATOR WITHIN 30 DAYS (Generators who submit hazardous waste for transport out-of-state, produce completed copy of this copy and send to DTSC within 30 days.)

WASTE MANIFEST CAK002574551 | 0 | 1 | 0 | 7 | 5 of

3. Generator's Name and Mailing Address: WASTERN Non Wovens, 1614 CAMPBELL ST, OAKLAND CA 94607

4. Generator's Phone: 925 209-3696

A. State Manifest Document Number: 22951875

B. State Generator's ID

5. Transporter 1 Company Name: SAFETY-KLEEN SYSTEMS, INC

6. US EPA ID Number: TXR000050930

C. State Transporter's ID [Reserved.]

D. Transporter's Phone: 800 669-5840

7. Transporter 2 Company Name

8. US EPA ID Number

E. State Transporter's ID [Reserved.]

F. Transporter's Phone

9. Designated Facility Name and Site Address: 050702
EVERGREEN OIL INC
6880 SMITH AVE
NEWARK CA 94560

10. US EPA ID Number: CAD980887418

G. State Facility's ID: CAD980887418

H. Facility's Phone: 510 795-4400

11. US DOT Description (including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	12. Containers Type	13. Total Quantity	14. Unit Wt/Vol	I. Waste Number
a. NON-RCRA HAZARDOUS WASTE LIQUID ~~OIL, WATER, SLUDGE(NOT DOT REGULATED)~~	001	TT	02100	G	State 221; EPA/Other NONE
b.					State; EPA/Other
c.					State; EPA/Other
d.					State; EPA/Other

J. Additional Descriptions for Materials Listed Above

K. Handling Codes for Wastes Listed Above: a. 01 b. c. d.

15. Special Handling Instructions and Additional Information

MFST R/T#000000000 7-178-01
EMERGENCY RESP 800-468-1760(24 HR). IF UNDELIVERABLE RETURN TO GENERATOR.
SK CORP AUTHORIZED TO RETAIN LICENSED SUBSEQUENT CARRIERS AS NECESSARY.
SKDOT# A. 3287 B. C. D.

16. GENERATOR'S CERTIFICATION: I hereby declare that the contents of this consignment are fully and accurately described above by proper shipping name and are classified, packed, marked, and labeled, and are in all respects in proper condition for transport by highway according to applicable international and national government regulations.

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Printed/Typed Name: Mike Kausin | Signature: [signature] | Month 02 Day 17 Year 04

17. Transporter 1 Acknowledgement of Receipt of Materials

Printed/Typed Name: CRAIG PACHECO | Signature: [signature] | Month 02 Day 17 Year 04

18. Transporter 2 Acknowledgement of Receipt of Materials

Printed/Typed Name | Signature | Month Day Year

19. Discrepancy Indication Space

20. Facility Owner or Operator Certification of receipt of hazardous materials covered by this manifest except as noted in Item 19.

Printed/Typed Name | Signature | Month Day Year

GENERATOR / TRANSPORTER / FACILITY

IN CASE OF EMERGENCY OR SPILL, CALL THE NATIONAL RESPONSE CENTER 1-800-424-8802; WITHIN CALIFORNIA, CALL 1-800-852-7550

DO NOT WRITE BELOW THIS LINE.

DTSC 8022A (1/99)
EPA 8700—22

Yellow: GENERATOR RETAINS

22906097

IN CASE OF EMERGENCY OR SPILL, CALL THE NATIONAL RESPONSE CENTER 1-800-424-8802 WITHIN CALIFORNIA, CALL 1-800-852-7550

WASTE MANIFEST

CAR000036111 | 06071 | 1 of 1

is not required by Federal law.

GENERATOR

3. Generator's Name and Mailing Address: Reliance Products, 1614 Campbell Street, Oakland, CA 94607

4. Generator's Phone: 510 893-7687

A. State Manifest Document Number: 2290609**7**

B. State Generator's ID:

5. Transporter 1 Company Name: DASH Environmental Inc.

6. US EPA ID Number: CAR000112722

C. State Transporter's ID (Required):

D. Transporter's Phone: 800-559-3274

7. Transporter 2 Company Name:

8. US EPA ID Number:

E. State Transporter's ID (Required):

F. Transporter's Phone:

9. Designated Facility Name and Site Address: DeMenno Kerdoon, 2000 North Alameda St, Compton, CA 90222

10. US EPA ID Number: CAT080013352

G. State Facility's ID:

H. Facility's Phone: 310-537-7100

11. US DOT Description (including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	12. Containers Type	13. Total Quantity	14. Unit Wt/Vol	I. Waste Number
a. RQ waste, Paint related material, 3, UN1263, PG III	001	DM	00040	G	State 343 EPA/Other 0801
b.					State EPA/Other
c.					State EPA/Other
d.					State EPA/Other

J. Additional Descriptions for Materials Listed Above: 11a) oil base paints & thinners ERG# 128

K. Handling Codes for Wastes Listed Above: a. b. c. d.

15. Special Handling Instructions and Additional Information: wear proper ppe

Emergency phone # 707-551-3711

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Printed/Typed Name: [illegible] | Signature: | Month: 03 | Day: 02 | Year: 04

TRANSPORTER

17. Transporter 1 Acknowledgement of Receipt of Materials

Printed/Typed Name: David B. H. Fremont | Signature: David B. H. Fremont | Month: 03 | Day: 02 | Year: 04

18. Transporter 2 Acknowledgement of Receipt of Materials

Printed/Typed Name: | Signature: | Month: | Day: | Year:

FACILITY

19. Discrepancy Indication Space

20. Facility Owner or Operator Certification of receipt of hazardous materials covered by this manifest except as noted in Item 19

Printed/Typed Name: | Signature: | Month: | Day: | Year:

DO NOT WRITE BELOW THIS LINE.

DTSC 8022A (1/89)
EPA 8700-22

Yellow: GENERATOR RETAINS

IN CASE OF EMERGENCY OR SPILL, CALL THE NATIONAL RESPONSE CENTER 1-800-424-8802 WITHIN CALIFORNIA, CALL 1-800-852-7550

UNIFORM HAZARDOUS WASTE MANIFEST

CAR000361106 95 1 of 1

Is not required by federal law.

GENERATOR

3. Generator's Name and Mailing Address: Reliance Products 1614 Campbell Street Oakland CA. 94607

4. Generator's Phone (510) 893-9887

A. State Manifest Document Number: 22906095

B. State Generator's ID:

5. Transporter 1 Company Name: DASH Environmental Inc

6. US EPA ID Number: CARP00112722

C. State Transporter's ID (Reserved.):

D. Transporter's Phone: 800-559-3274

7. Transporter 2 Company Name:

8. US EPA ID Number:

E. State Transporter's ID (Reserved.):

F. Transporter's Phone:

9. Designated Facility Name and Site Address: D/K Environmental 3650 East 26th Street Los Angeles, CA. 90023

10. US EPA ID Number: CAT080033681

G. State Facility's ID:

H. Facility's Phone: 323-268-5056

11. US DOT Description (including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	Type	13. Total Quantity	14. Unit Wt/Vol	I. Waste Number
a. Non RCRA Hazardous Waste, liquid, "Adhesives"	018	DM	00900	G	State 281 / EPA/Other None
b. Non RCRA Hazardous waste, liquid, "Oily water	003	DM	00150	G	State 223 / EPA/Other None
c. Non RCRA Hazardous waste, liquid "Oily water with water based latex"	002	DM	00100	G	223-291 / EPA/Other None
d. #8 Hazardous waste, Solid, N.O.S., (Lead) NA 3077 (ER) UN3077 PG II	001	DF	00005	P	State 352 / EPA/Other D008

J. Additional Descriptions for Materials Listed Above:
11a) water base Adhesives ERG #171
11b) oily water ERG #171
11c) oily water with latex ERG #171
11d) Lead paint pigment ERG #171

K. Handling Codes for Wastes Listed Above: a. b. c. d.

15. Special Handling Instructions and Additional Information: wear proper PPE

Emergency phone # 707-534-3711

16. GENERATOR'S CERTIFICATION: I hereby declare that the contents of this consignment are fully and accurately described above by proper shipping name and are classified, packed, marked, and labeled, and are in all respects in proper condition for transport by highway according to applicable international and national government regulations.

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Printed/Typed Name: David Fremaux (Agent For) Signature: David Fremaux (Agent For) Month 03 Day 01 Year 04

TRANSPORTER

17. Transporter 1 Acknowledgement of Receipt of Materials

Printed/Typed Name: David B. H. Fremaux Signature: David BH Fremaux Month 03 Day 01 Year 04

18. Transporter 2 Acknowledgement of Receipt of Materials

Printed/Typed Name: Signature: Month Day Year

FACILITY

19. Discrepancy Indication Space

20. Facility Owner or Operator Certification of receipt of hazardous materials covered by this manifest except as noted in item 19.

Printed/Typed Name: Signature: Month Day Year

DO NOT WRITE BELOW THIS LINE.

BTSC 8022A (1/99)
EPA 8700-22

Yellow GENERATOR RETAINS

UNIFORM HAZARDOUS WASTE MANIFEST

CAR000036111 | 0 | 6 | 0 | 9 | 6 | 1 of 1 | is not required by federal law

2. Generator's Name and Mailing Address: Reliance Products, 1614 Campbell Street, Oakland, CA 94607

4. Generator's Phone: 510 893-7687

A. State Manifest Document Number: 22906096

B. State Generator's ID:

5. Transporter 1 Company Name: OASIS Environmental Inc.

6. US EPA ID Number: CAR000112722

C. State Transporter's ID (Reserved.)

D. Transporter's Phone: 800-559-3274

7. Transporter 2 Company Name:

8. US EPA ID Number:

E. State Transporter's ID (Reserved.)

F. Transporter's Phone:

9. Designated Facility Name and Site Address: D/K Environmental, 3650 East 26th Street, Los Angeles, CA 90023

10. US EPA ID Number: CAT080033681

G. State Facility's ID:

H. Facility's Phone: 323-268-5056

11. US DOT Description (including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	12. Containers Type	13. Total Quantity	14. Unit Wt/Vol	I. Waste Number
a. Non RCRA Hazardous waste liquid, "used oil"	002	DM	00110	G	State 221 / EPA/Other None
b. Non RCRA Hazardous waste, solid, "Oily Debris"	003	DM	00600	P	State 223 / EPA/Other None
c. Non RCRA Hazardous waste, liquid, "Latex Paint"	001	DM	00040	G	State 291 / EPA/Other None
d.					State / EPA/Other

J. Additional Descriptions for Materials Listed Above

IIa) Used Oil — ERG #171

IIb) Oily Debris — ERG #171

IIc) Latex paint — ERG #171

K. Handling Codes for Wastes Listed Above

a. b. c. d.

15. Special Handling Instructions and Additional Information

wear proper PPE

Emergency phone # 707-551-3711

16. GENERATOR'S CERTIFICATION: I hereby declare that the contents of this consignment are fully and accurately described above by proper shipping name and are classified, packed, marked, and labeled, and are in all respects in proper condition for transport by highway according to applicable international and national government regulations.

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Printed/Typed Name: [illegible] | Signature: [illegible] | Month | Day | Year

17. Transporter 1 Acknowledgement of Receipt of Materials

Printed/Typed Name: David B.H. Fremont | Signature: [illegible] | Month: 03 | Day: 02 | Year: 04

18. Transporter 2 Acknowledgement of Receipt of Materials

Printed/Typed Name | Signature | Month | Day | Year

19. Discrepancy Indication Space

20. Facility Owner or Operator Certification of receipt of hazardous materials covered by this manifest except as noted in Item 19.

Printed/Typed Name | Signature | Month | Day | Year

DO NOT WRITE BELOW THIS LINE.

GENERATOR

TRANSPORTER

FACILITY

IN CASE OF EMERGENCY OR SPILL CALL THE NATIONAL RESPONSE CENTER 1-800-424-8802; WITHIN CALIFORNIA, CALL 1-800-852-7550

DISC 8022A (1/99)
EPA 8700-22

Yellow — GENERATOR RETAINS

APPENDIX C

STANDARD OPERATING PROCEDURES

STANDARD OPERATING PROCEDURE A– HAND BORINGS

SOIL CORING AND SAMPLING PROCEDURES

Prior to drilling, the surface is either cored if concrete or hammered through using a pick, if asphalt.

A hand operated coring device equipped with a 3-inch diameter auger bit is advanced into the soil until full. The auger is removed and emptied and this process is repeated until the desired depth is reached. The hand auger is removed and a slide hammer core sampling device, equipped with two 3-inch long, 2-inch diameter brass liners is advanced six inches into the undisturbed soil at the bottom of the borehole.

One of the 3-inch liners is selected and the ends of the tube are covered with Teflon liner and sealed with plastic caps. The soil-filled liner is labeled with the borehole number, sample depth, site location, date, and time. The samples are placed in bags and stored in a cooler containing ice. Soil from the core adjacent to the interval selected for analyses is placed in a plastic zip-top bag. The soil is allowed to volatilize for a period of time, depending on the ambient temperature. The soil is scanned with a flame-ionization detector (FID) or photo-ionization detector (PID).

All sample barrels, rods, and tools are cleaned with Alconox or equivalent detergent and de-ionized water. All rinsate from the cleaning is contained in covered 5-gallon plastic buckets or 55-gallon drums at the project site.

BOREHOLE GROUTING FOR HAND BORINGS

Upon completion of soil and water sampling, boreholes will be abandoned with neat cement grout. If the borehole was advanced into groundwater, the grout is pumped through a grouting tube positioned at the bottom of the borehole.

STANDARD OPERATING PROCEDURE - SOIL SAMPLING BY HAND

Sites that require shallow soil samples such as soil stockpiles, excavation sidewalls, backhoe buckets, surface contamination, shallow subsurface contamination, drums containing soil, etc., will be collected by hand. A relatively undisturbed sample shall be obtained in a clean brass liner. For shallow (generally five feet or less) subsurface soil sampling use a steel core sampler equipped with a clean brass liner and advanced into the soil with a slide hammer. For soil stockpiles excavations and surface contamination, the outer surface of the soil is removed and a clean brass liner is immediately driven into the soil by hand or with a hammer. In deep excavations where safety factors preclude the direct sampling of the bottom or sidewall, a backhoe bucket retrieves soil.

TOOL SELECTION AND OPERATION

For soil stockpiles, backhoe buckets, surface contamination or drums, a shovel or trowel may be used to move the surface of the soil. Dig or scrape away at least four inches of soil at the selected sample location. A brass liner should immediately be pushed into the soil by hand or if necessary driven with a hammer. To avoid damaging the liner, hold a block of wood against the liner and hit the wood to drive the liner into the soil until full.

In cases where a deeper sample is required use a hand auger to dig to the required sample depth. Remove the hand auger and use a slide hammer sample equipped with a clean brass liner to obtain the sample. The sampler consists of a stainless steel shoe that holds the sample liner. Place a clean liner in the shoe and screw it tightly to the slide hammer. Place a chalk mark on the slide hammer six inches above the ground surface and drive the sampler until the chalk mark is at the surface. Remove the sample by back-hitting the slide weight up against the handle of the slide hammer until the shoe is free. The hand auger and sampler shoe will by cleaned with water, then soap solution and then rinsed with distilled water between samples to minimize the possibility of cross contamination.

SAMPLE PRESERVATION

After the liner is packed full with soil, the ends of the liner will be sealed with aluminum foil plastic caps and tape, labeled with pertinent sample information and stored in a chilled ice chest for preservation in the field. The sample information is logged on a chain-of-custody form, and the chilled samples are transported to the state-certified laboratory.