



**GROUNDWATER INVESTIGATION REPORT AND
WORKPLAN FOR ADDITIONAL INVESTIGATIONS**

1600 63rd Street

Emeryville, California

LOP 11/1

January 10, 2000

SOMA Project 96-2081

Prepared for

1600 63rd Street Associates, Inc.
c/o Wareham Development Group
1120 Nye Street, Suite 400
San Rafael, California 94901

Prepared by

SOMA Corporation
1260B 45th Street
Emeryville, California 94608
(510) 654-3900 /
(510) 654-1960 (Facsimile)

00 JAN 12 AM 9:33
ENVIRONMENTAL
PROTECTION



January 10, 2000

SOMA 96-2081

Ms. Susan Hugo
Alameda County Health Care Services Agency
Department of Environmental Health
1131 Harbor Bay Parkway, Suite 250
Alameda, California 94502

Subject: Report for 1600 63rd Street/Fedex Site in Emeryville, California

Dear Susan,

Enclosed is a report entitled "*Groundwater Investigation Report and Workplan for Additional Investigations*" for the 1600 63rd Street Site in Emeryville for your review and comment. The report documents the investigation work completed to date for both the shallow and deeper groundwater investigations.

The report does provide recommendations for work required for closure of the out of service waste oil underground storage tank located at the Site. It is assumed that the tank closure work will be facilitated by Fedex.

If you have any questions, please call me at (510) 654-3900 or fax comments or suggestions to (510) 654-1960.

Sincerely,

A handwritten signature in black ink, appearing to read "Glenn M. Leong", with a long horizontal flourish extending to the right.

Glenn M. Leong
Vice President and Senior Scientist

A handwritten signature in black ink, appearing to read "Jeff Hennier", with a long horizontal flourish extending to the right.

Jeff Hennier, R.G.
Associate Hydrogeologist

enclosure

TABLE OF CONTENTS

SIGNATURE PAGE..... ii

1.0 INTRODUCTION..... 1

 1.1 Site Description 1

 1.2 Site Background Summary..... 2

2.0 RESULTS OF ADDITIONAL GROUNDWATER INVESTIGATIONS..... 2

 2.1 Shallow Groundwater Investigations 2

 2.1.1 Introduction 2

 2.1.2 Results of Shallow Groundwater Sample Analyses..... 3

 2.1.3 Conclusions..... 4

 2.2 Deep Groundwater Investigations 5

 2.2.1 Introduction 5

 2.2.2 Results of Deep Groundwater Sample Analyses..... 6

 2.2.3 Conclusions..... 6

3.0 ADDITIONAL GROUNDWATER INVESTIGATION AND PRODUCT REMOVAL WORKPLAN 7

 3.1 Additional Groundwater Investigations 7

 3.2 Product Removal at Well MW-2 10

 3.3 Groundwater Investigation and Product Removal Report 10

4.0 SCHEDULE 11

5.0 SELECTED REFERENCES 11

TABLES

Table 1 Historical Summary of Groundwater Elevation Data

Table 2A Shallow Groundwater Analytical Results

Table 2B Summary of Historical Groundwater Analytical Results

Table 3 Deep Groundwater Analytical Results

FIGURES

Figure 1 Site Vicinity Map

Figure 2 Shallow Groundwater Elevations on May 14, 1999

Figure 3 Groundwater Investigation Sampling Results, TPH Gasoline and Diesel

Figure 4 Proposed Additional Groundwater Sampling and Monitoring Well Locations

APPENDICES

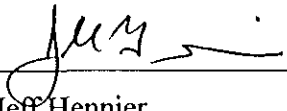
Appendix A: Boring Logs, HP-1 through HP-5

Appendix B: Laboratory Certificates

Appendix C: CPT Data Log and Drillers Report

SIGNATURE PAGE

All hydrogeologic and geologic information, conclusions, and recommendations contained in this report have been prepared by a California Certified Hydrogeologist.



Jeff Hennier
California Registered Geologist (4605)
California Certified Hydrogeologist (105)

1/10/00

Date

January 10, 2000

SOMA 96-2081

**GROUNDWATER INVESTIGATION REPORT AND
WORKPLAN FOR ADDITIONAL INVESTIGATIONS
1600 63rd Street
Emeryville, California**

1.0 INTRODUCTION

This Groundwater Investigation Report and Workplan for Additional Investigations ("Investigation Report") is submitted to the Alameda County Health Care Services (ACHCSA) on behalf of the property owner, 1600 63rd Street Associates, Inc., for property at 1600 63rd Street, Emeryville, California ("the Site"). This Investigation Report presents the results of recent shallow and deep groundwater investigations conducted at the Site and SOMA's recommended scope of work to further assess the presence of petroleum hydrocarbons in shallow groundwater at the Site. Recent groundwater investigations were conducted in accordance with SOMA's report entitled "Additional Groundwater Investigation Workplan" dated February 23, 1999 (SOMA, 1999a), as modified by an addendum to the Workplan dated July 7, 1999 (SOMA, 1999b). The Workplan and addendum were approved with modifications by the ACHCSA in their letters to the property owner dated April 29, 1999 and July 19, 1999, respectively.

The objectives of the work described in this Investigation Report were to assess the possible presence of residual chemicals in deep groundwater near the location of a former deep industrial water well at the Site and to assess the extent of petroleum hydrocarbons in shallow groundwater in the vicinity of shallow monitoring well MW-2. Previous investigations and remedial actions conducted of the deep industrial water well at the Site in 1988 indicated petroleum hydrocarbons and other chemicals, including floating product, were reported in groundwater samples collected from depth intervals between approximately 90- and 300-feet below grade. The floating product was pumped out and approximately 13,000 gallons of water were reportedly purged from the industrial well in 1988. Recent sampling results indicate floating product was observed in shallow monitoring well MW-2. Floating product was also noted at well MW-2 during sampling events conducted in 1990 and 1991.

This Investigation Report describes the results of shallow and deep groundwater sampling activities to assess the extent of petroleum hydrocarbons near shallow well MW-2 and to assess the possible presence of residual chemicals in the vicinity of the former deep industrial water well at the Site. Results of groundwater investigations are evaluated to develop recommendations for additional shallow groundwater investigations and interim corrective actions.

1.1 Site Description

The Site is located at 1600 63rd Street in Emeryville, approximately 2,000 feet east of the San Francisco Bay (Figure 1). The Site is approximately 2.75-acres in size and is currently occupied

by FedEx. The Site vicinity consists primarily of commercial and industrial land uses. The Site is bounded by 63rd and 64th Streets to the south and north, respectively, the City of Emeryville Fire Station No. 2 to the east, and Overland Avenue and the BART/Southern Pacific Railroad right-of-way to the west (Figure 1).

The ground surface in the Site vicinity is approximately 10- to 15-feet above mean sea level and slopes gently towards the Bay. Due to the Site's proximity to the Bay, shallow-depth sediments in the Site vicinity consist primarily of fill materials and fine-grained silt and clay sediments deposited in tidal marsh and estuarine environments.

1.2 Site Background Summary

The Site was originally developed and operated as a tallow manufacturing plant by Peterson Manufacturing Company ("Peterson") in 1914 (ES, 1988). In 1987, the Site was purchased by 1600 63rd Street Associates, Inc. and the manufacturing plant was demolished during redevelopment. Historical records indicate six underground storage tanks (USTs) were previously located at the Site (Figure 2). Six USTs, six sumps, seven aboveground storage tanks (AST), a water-supply well and other appurtenances related to Peterson's manufacturing operations were removed prior to and during redevelopment activities in 1988 (ES, 1988).

Engineering Science (ES) conducted soil and groundwater investigations at the Site during the period of Site demolition and UST, sump and AST removal in 1988 (ES, 1988). In addition to tank and sump removals, remedial actions were conducted at the Site in 1988 that included excavation, remediation and replacement of petroleum hydrocarbon impacted soil and closure of the deep industrial water well located at the Site.

The current tenant has operated a FedEx shipping facility at the Site since 1989, when the Site was redeveloped and construction of the FedEx building was completed. FedEx currently operates one 10,000-gallon gasoline UST at the Site. The FedEx gasoline UST was reportedly relined in 1998. FedEx also reportedly stopped using a waste oil UST located in the general area of the gasoline UST in 1998.

2.0 RESULTS OF ADDITIONAL GROUNDWATER INVESTIGATIONS

2.1 Shallow Groundwater Investigations

2.1.1 Introduction

SOMA conducted shallow groundwater investigation activities at the Site on May 14 and August 5, 1999. Groundwater samples were collected from shallow monitoring wells MW-1 through MW-5 on May 14, 1999 to confirm previous monitoring results collected from the wells during the period between 1989 and 1994. Additionally, groundwater grab samples were collected from five borings (HP-1 through HP-5) on August 5, 1999 to assess the lateral extent of petroleum hydrocarbons in shallow groundwater at the general downgradient (i.e., northwest)

area of the Site near well MW-2. The monitoring well and groundwater grab sampling locations are illustrated in Figures 2 and 3.

Water-level measurements and calculated groundwater elevations were collected from the Site monitoring wells on May 14, 1999 and are summarized with historical water-level data in Table 1. The groundwater surface was encountered at depths between approximately 4- to 5.5-feet in wells MW-1 through MW-5 (Table 1). Groundwater elevations from Site monitoring wells were used to construct potentiometric contours for the shallow groundwater zone (Figure 2). Groundwater elevation data collected at the Site indicate the general direction of groundwater flow is toward the northwest (Figure 2).

Groundwater grab sample borings HP-1 through HP-5 were drilled to a depth of 19-feet below grade. Descriptions of the sediments encountered in the borings are included in the lithologic logs presented in Appendix A. Saturated-zone sediments encountered in the borings (i.e., depth interval between approximately 5- and 19-feet bgs) consisted predominantly of relatively fine-grained silty clay, sandy clay and gravelly clay sediments (Appendix A). Fill materials consisting primarily of sandy gravel sediments were encountered in the depth interval between ground surface and approximately 7-feet below grade. No lithologic data were collected from the borings that appear to indicate the presence of a buried alluvial channel (i.e., well-sorted sand or gravel sediments) or a potential preferential pathway for chemical migration in shallow groundwater.

2.1.2 Results of Shallow Groundwater Sample Analyses

Monitoring well groundwater samples collected on May 14, 1999 were submitted to Chromalab, Inc. for the following analyses: TPH characterized as gasoline (TPHg), diesel (TPHd) and motor oil using EPA Method 8015/5030; benzene, toluene, ethylbenzene, and xylenes (BTEX) compounds using EPA Method 8020; volatile organic compounds (VOCs) using EPA Method 8010; semi-volatile organic compounds (SVOCs) using EPA Method 8270; polychlorinated biphenols (PCBs) and pesticides using EPA Method 8080; and methyl-tert-butyl ether (MTBE) using EPA Method 8260. Groundwater grab samples collected on August 5, 1999 were analyzed for TPHg and TPHd using EPA Method 8015/5030, and BTEX compounds and MTBE using EPA Method 8020. Sampling results are summarized in Table 2A and laboratory certificates are included in Appendix B; TPHg and TPHd results are illustrated in Figure 3.

TPHg, TPHd and xylenes were the only compounds detected in the groundwater samples from monitoring wells MW-1 through MW-3; petroleum hydrocarbons were not detected in the samples from wells MW-4 and MW-5 (Table 2A). Benzene and MTBE were not detected in the monitoring well samples. Though TPHd results were reported in the samples from wells MW-1 through MW-3, the laboratory indicated that the "hydrocarbon reported does not match the pattern of our Diesel standard." Only low concentrations of TPHd (up to 0.2 ppm) were detected in the samples from well MW-1 and MW-3. Approximately 3-feet of floating product was measured at well MW-2. A product sample from well MW-2 was sent to Friedman & Bruya, Inc. laboratory for further hydrocarbon identification analysis. The laboratory results from Friedman

& Bruya, Inc. indicate "The patterns displayed by these peaks are indicative of degraded Bunker C or crude oil."

With the exception of trace concentrations of toluene, ethylbenzene, and xylenes (up to 0.002 ppm) detected at boring HP-4, TPHg and TPHd were the only compounds detected in the groundwater grab samples collected on August 5, 1999 (Table 2A). Benzene and MTBE were not detected in the groundwater grab samples. The TPH results were reported as gasoline and diesel in the samples; however, the laboratory indicated that the "hydrocarbon reported does not match the pattern of our gasoline or diesel standard." Floating product was observed and sampled from boring HP-5. The product sample from boring HP-5 was sent to Friedman & Bruya, Inc. Laboratory for further hydrocarbon identification analysis. The laboratory results from Friedman & Bruya, Inc. indicate "The patterns displayed by these peaks are indicative of degraded Bunker C or crude oil." This result is identical to the hydrocarbon identification analysis result for the product sample from well MW-2.

Historical analysis results collected between 1989 and 1994 from Site monitoring wells MW-1 through MW-5 indicate benzene and halogenated volatile organic compounds were not detected (Table 2B). Only trace concentrations (less than 0.043 ppm) of toluene, ethylbenzene or total xylenes were historically detected. Historically, the highest concentrations of petroleum hydrocarbons were detected in the downgradient well MW-2 (Table 2B). Petroleum hydrocarbons were only sporadically detected in other Site monitoring wells.

2.1.3 Conclusions

Recent shallow groundwater investigations indicate only petroleum hydrocarbons, primarily TPHg and TPHd, were detected (Table 2A). Only low or trace levels of TPHd (up to 0.2 ppm) were detected at sampling locations in the eastern half of the Site, in the general upgradient direction from well MW-2 (Figure 3).

Floating product was observed in well MW-2, located near the former UST and burn pit area at the northwest corner of the Site (Figure 3). Floating product was also observed in boring HP-5, and petroleum hydrocarbons were detected in samples from borings HP-3 and HP-4 located at the downgradient (northwest) perimeter of the Site. Boring HP-5 is located near and generally downgradient of the former UST and burn pit area and the current UST area (Figure 3). FedEx reportedly stores gasoline in the UST that is currently located at the Site and they reportedly stopped using a waste oil UST located in the general area of the gasoline UST in 1998. The product samples from MW-2 and HP-5 do not indicate the characteristics of gasoline. Therefore, sampling results collected to date appear to indicate that the source of the product in shallow groundwater at well MW-2 and boring HP-5 is from historical operations, likely in the area of the former UST and burn pit area (Figure 3).

2.2 Deep Groundwater Investigations

2.2.1 Introduction

SOMA conducted deep groundwater investigation activities at the Site on October 21, 1999. Deep groundwater investigations were conducted after obtaining shallow groundwater investigation results, which indicated only trace concentrations of TPHd (0.087 ppm) were detected at boring HP-1. Groundwater samples were collected from deep cone penetrometer test (CPT) boring CPT-1 to assess the possible presence of residual chemicals within approximately 50 feet and in the assumed downgradient direction from the former deep industrial water well at the Site (Figure 3). The CPT in-situ testing methodology was used to collect groundwater samples from the approximate 90- and 150-foot depth intervals, which correlate to reported perforated intervals in the former deep industrial well at the Site (SOMA, 1999a). Previous investigations conducted prior to decommission of the deep well in 1988 determined that the former well was 322 feet deep with perforated intervals from 72 to 113 feet, 134 to 166 feet, and 195 to 227 feet below ground surface (ES, 1988). No additional deep wells in the Site vicinity have been identified.

CPT sampling was conducted by Gregg Drilling and Testing, Inc. using their CPT rig and support equipment. The CPT rig uses hydraulic direct push equipment to advance the cone penetrometer in the boring and collect soil parameters such as cone bearing, sleeve friction, friction ratio, pore water pressure and resistivity. These parameters are processed and graphically plotted by an on-board data acquisition computer system to allow interpretation of subsurface soil stratigraphy. After collecting the soil parameter data and groundwater samples, the CPT boreholes were sealed with a bentonite-grout mix through PVC tremie pipe, and the ground surface restored using replacement materials (i.e., asphalt patch, concrete). A brief description of the CPT sampling methodology is provided in Appendix C.

A CPT pilot boring was initially drilled at the Site to a depth of approximately 130-feet below grade to collect geologic information of sediment type and depth interval. An adjacent CPT boring was then drilled approximately 5 feet from the pilot boring to a depth of 160-feet below grade to collect groundwater samples from the target sampling depth intervals at approximately 90- and 150-feet. The CPT equipment used to drill to the target sampling depth intervals was able to penetrate approximately 30 feet deeper than the CPT drilling equipment (i.e., drill rods) used to collect geologic information. Descriptions of the sediments encountered in the borings are included in the CPT logs presented in Appendix C. Saturated-zone sediments encountered in the CPT pilot boring (i.e., depth interval between approximately 5- and 130-feet below grade) consisted predominantly of relatively fine-grained silty clay and clayey silt sediments (Appendix C). A relatively thin interval of sandy sediments was encountered between approximately 20- and 27-feet below grade. The CPT data also indicate a slightly coarser-grained sediment interval at depths between approximately 98- and 100-feet below grade.

Groundwater samples were collected from the CPT borehole using a stainless steel bailer lowered into temporary PVC well casing. The temporary well casing was installed through the CPT drill

casing, which sealed the upper sediment intervals and allowed discrete sampling from the target sample depth intervals. Groundwater samples were collected from temporary PVC screen intervals placed at depth intervals of 78- to 103-feet (CPT-1-1W) and 135- to 160-feet (CPT-1-2W). These sample depth intervals correlate to perforated intervals of 72 to 113 feet and 134 to 166 feet in the former deep well at the Site. The groundwater samples were placed in a chilled cooler immediately after collection for transport to the laboratory.

2.2.2 Results of Deep Groundwater Sample Analyses

Deep groundwater samples CPT-1-1W and CPT-1-2W were collected on October 21, 1999 and submitted to Chromalab, Inc. for the following analyses: TPHg and TPHd using EPA Method 8015/5030; BTEX compounds using EPA Method 8020; VOCs using EPA Method 8010; SVOCs using EPA Method 8270; and PCBs and pesticides using EPA Method 8080. Sampling results are summarized in Table 3 and laboratory certificates are included in Appendix B; TPHg and TPHd results are illustrated in Figure 3.

A low concentration of TPHd (0.1 ppm) in sample CPT-1-2W, collected from the depth interval between 135- and 160-feet, was the only compound detected in the deep groundwater samples (Table 3). Though TPHd was reported in the CPT-1-2W sample, the laboratory stated "Compounds reported are in the diesel range. They do not exhibit a pattern characteristic of hydrocarbon." TPHd was not detected (<0.05 ppm) in sample CPT-1-1W, collected from a shallower depth interval of 78- to 103-feet.

Previous investigations conducted of the deep industrial water well in 1988 indicate 24 feet of floating product was reportedly measured in the well. The floating product was pumped out and approximately 13,000 gallons of water were reportedly purged from the well (ES, 1988). Groundwater samples collected from discrete depth intervals in the well at depths of 90-, 150- and 300 feet indicate a trace concentration of PCBs (Aroclor 1254 at 0.0024 ppm) was detected only in the 90-foot depth sample; TPH (up to 40 ppm) was detected in the 90- and 150-foot samples; and concentrations of volatile organic compounds (i.e., acetone at 0.1 ppm) and semi-volatile compounds (i.e., pyrene at 0.016 ppm) were detected in the 300-foot depth sample (ES, 1988). Following completion of investigation and sampling activities in 1988, the well was decommissioned (ES, 1988).

2.2.3 Conclusions

Recent deep groundwater investigations indicate only a low concentration of TPHd (0.1 ppm) was reported in the sample from the depth interval of 135- to 160-feet (Table 3). The laboratory report indicates the compounds detected in the sample "do not exhibit a pattern characteristic of hydrocarbon." Therefore, this result does not appear to be related to a potential release of petroleum hydrocarbons at the Site. PCBs and VOCs that were previously detected in samples collected from the deep industrial well in 1988 were not detected in the deep groundwater samples collected from the CPT boring. Deep groundwater sampling results indicate that residual

chemicals were not detected or were not measured at concentrations that would be expected to impact groundwater beneficial uses. Based on these results, no further deep groundwater investigations are recommended.

3.0 ADDITIONAL GROUNDWATER INVESTIGATION AND PRODUCT REMOVAL WORKPLAN

Based on results of recent shallow groundwater investigations, SOMA recommends additional investigations to assess the extent of petroleum hydrocarbons at the downgradient (northwest) off-site area. Additional monitoring wells are also proposed to confirm the results of recent groundwater investigations and to replace selected existing wells with well screens that are below the shallow groundwater table at the Site. Finally, interim groundwater corrective actions consisting of product removal from shallow well MW-2 are recommended.

The objectives of this Workplan are to further assess the lateral extent of petroleum hydrocarbons in shallow groundwater at the Site and to remove product from the vicinity of well MW-2. The following tasks are proposed to address the objectives of this Workplan:

- Collect groundwater samples from four off-site borings to assess the lateral and downgradient extent of petroleum hydrocarbons in shallow groundwater.
- Collect groundwater samples from the five additional monitoring wells: three new wells are recommended to replace existing wells where the well screen intervals are below the groundwater table; and two new wells are recommended to confirm and monitor the extent of petroleum hydrocarbons at the downgradient (northwest) area of the Site.
- Interim corrective actions to remove petroleum product from well MW-2.
- Evaluate investigation and product removal data and assess whether additional investigation and/or corrective actions may be warranted.

Descriptions of the proposed Scope of Work tasks are provided below.

3.1 Additional Groundwater Investigations

The Scope of Work for the proposed additional groundwater investigations has been organized into specific tasks as follows:

- Task 1: Permitting and Utility Clearance
- Task 2: Off-Site Shallow Groundwater Investigation
- Task 3: Monitoring Well Installation and Sampling

A detailed description of each task follows.

Task 1: Permitting and Utility Clearance

As described below under Tasks 2 and 3, four groundwater grab sampling locations and five monitoring wells are proposed at the Site. Prior to drilling, a subsurface drilling permit will be obtained from Alameda County Public Works Agency. It will be necessary to obtain an encroachment permit from the City of Emeryville for work in the city right of way. Underground Services Alert (USA) will be notified and the drilling locations will be cleared for underground utilities using a private underground utility locating subcontractor.

As required by the Occupational Health and Safety Administration (OSHA) 29 CFR 1910.120, Hazardous Waste Operations and Emergency Responses, a site Health and Safety Plan (HSP) will be prepared for use while conducting proposed field sampling activities. The HSP will be read and approved by the SOMA Project Manager, a Quality Assurance Reviewer, and the On-site Safety Officers of all subcontractors working at the Site.

Task 2: Off-Site Shallow Groundwater Investigation

To assess the lateral and downgradient extent of petroleum hydrocarbons in shallow groundwater, groundwater grab samples are proposed to be collected at four boring locations (Figure 4). The grab sampling locations shown in Figure 4 are contingent upon access limitations (i.e., site features, utilities) and final locations may be moved to the closest accessible location. The groundwater samples will be submitted to a California state-certified laboratory for analysis of TPHg and TPHd using EPA Method 8015/5030 and BTEX compounds using EPA Method 8020.

The ground-water samples are proposed to be collected from temporary borings drilled using portable direct push or Geoprobe™ drilling equipment. Based on previous data collected at the Site, we anticipate that the depth to groundwater is approximately 6 feet below grade. Groundwater grab samples will be collected from borings drilled to approximately 5- to 10-feet below the groundwater surface (i.e., 11- to 16-feet below grade). Groundwater grab samples will be collected from the borings using a Teflon or stainless steel bailer lowered into temporary well casing installed in the borehole. The temporary PVC well casing will be screened across the groundwater surface to allow product to enter the casing, if present. The groundwater samples will be placed in a chilled cooler immediately after collection for transport to the laboratory. In the event that a groundwater grab sample cannot be collected from the boring due to the presence of low permeability sediments, a soil sample will be collected from slightly below the soil/groundwater interface and sent to the laboratory for petroleum hydrocarbon analysis. After collecting the sample, the borehole will be sealed with a bentonite-grout mix and the ground surface restored using replacement materials (i.e., asphalt patch, concrete). All work will be performed under the direction of a California Certified Hydrogeologist.

Task 3: Monitoring Well Installation and Sampling

Additional monitoring wells are proposed to confirm the results of recent groundwater investigations and to replace selected existing wells with well screens that are currently below the

shallow groundwater table at the Site (Figure 4). Monitoring wells are proposed to confirm the shallow groundwater grab sample results and monitor petroleum hydrocarbons in the vicinity of downgradient borings HP-4 and HP-5. Additionally, three monitoring wells are proposed to replace existing wells MW-1, MW-3 and MW-4 and confirm previous sampling results from those wells. Comparison of historical water-level data and depth to screen intervals in the Site monitoring wells indicate the current shallow groundwater table is between approximately 7- and 20-feet higher than the well screen depths (Table 1). Installation and sampling of replacement wells with well screens placed across the shallow groundwater table are proposed to confirm previous monitoring results. The current wells will be retained pending future sampling results.

The proposed sampling and monitoring well locations shown in Figure 4 are contingent upon access limitations (i.e., site features, utilities) and final locations may be moved to the closest accessible location. We anticipate that the total depth of the shallow wells will be approximately 15- to 20-feet below grade. The well borings will be drilled by a licensed drilling contractor using direct push or hollow-stem auger drilling equipment. Monitoring wells will be constructed using flush-threaded, 2-inch diameter polyvinyl chloride (PVC) casing with factory-slotted well screens placed at depth intervals extending across the groundwater table. Soil samples will be collected every 2.5-feet for lithologic description using USCS terminology. Well installation procedures will conform to guidelines established by the California Department of Water Resources. All down-hole drilling and sampling equipment will be cleaned prior to use at each drilling location to prevent potential cross-contamination between each location. Well permits will be obtained prior to drilling at the Site, as described above in Task 1. All work will be performed under the direction of a California Certified Hydrogeologist.

The newly installed wells will be developed after completing well installation activities. The wells will be developed by pumping, bailing and/or surging the well to remove sediment from around the screened interval and enhance hydraulic communication with the surrounding formation.

The wells will be sampled immediately following completion of well development. The groundwater samples will be placed in a chilled cooler immediately after collection for transport to the laboratory. Groundwater samples will be collected from the newly installed wells and submitted to a state-certified laboratory for analysis for TPHg and TPHd using EPA Method 8015/5030, and BTEX compounds using EPA Method 8020. Collection of additional monitoring parameters, including dissolved oxygen, ferrous iron, nitrate and sulfate levels, will be conducted at the newly-installed wells to assess biodegradation processes in Site groundwater.

Following well installation, top-of-casing elevations of each well will be established by a licensed surveyor. Water-level measurements will be collected from the wells prior to sampling to obtain data of groundwater flow direction and gradients at the Site. Depth to water measurements will be measured using an electric water-level meter. Groundwater elevations will be calculated based on the measured depths to groundwater.

Waste soil and water generated during drilling will be securely stored on-site in 55-gallon drums. Results of soil and groundwater sample analyses will be evaluated and appropriate disposal facilities contacted to arrange for transport and disposal of the waste materials.

3.2 Product Removal at Well MW-2

Sampling results collected on May 14, 1999 from well MW-2 indicated the presence of approximately 3 feet of floating product in the well. Historical sampling results collected from the well between May 1990 and May 1991 indicated between 0.01- and 0.03-feet of product was measured in the well (HLA, 1989).

Interim groundwater corrective actions to remove product from well MW-2 are recommended. Product removal activities are recommended to consist of bi-weekly hand bailing and collection of product for proper disposal. Measurement of product thickness in the well and the amount of product removed will be noted for each bi-weekly removal event. The frequency of the product removal activities will be extended in the event that more than two weeks are required for product recovery in the well. Following an initial period of approximately 2 to 3 months of hand bailing product from the well, the product removal data will be used to evaluate the volume and extent of product in the area of the well and the effectiveness of the hand bailing removal actions. Additional recommendations for product removal will be assessed, if warranted.

3.3 Groundwater Investigation and Product Removal Report

Geologic, hydrogeologic and chemical data collected from the groundwater investigation, well installation and product removal activities will be evaluated, summarized, and a report prepared. The report will include the following:

- Detailed descriptions of the methodologies used to collect and analyze the data.
- Descriptions of the Site and site geology, including appropriately scaled base maps showing all boring locations and lithologic logs illustrating sediments encountered in the field.
- Presentation and interpretation of groundwater analytical results and laboratory data certificates, including an assessment of the extent of petroleum hydrocarbons in shallow groundwater at the Site.
- Evaluation of the effectiveness of product removal activities and recommendations for additional removal actions, if warranted.
- Evaluation of the need for additional investigations, remediation and/or groundwater monitoring at the site, if warranted, and an evaluation of Site closure criteria.
- A workplan to evaluate Risk-Based Corrective Actions and complete a Corrective Action Plan for the Site, if warranted.

4.0 SCHEDULE

Once we have received approval of the Workplan from the ACHCSA, it is estimated that the Workplan Scope of Work can be completed within approximately 14 weeks. The time required to complete the groundwater investigation task (Section 3.1) is estimated at approximately 4 to 6 weeks, contingent upon the time required to obtain an encroachment permit from the City of Emeryville. It is anticipated that the product removal task (Section 3.2) will be conducted on a bi-weekly schedule over the next 2 to 3 months after receiving the ACHCSA's approval of the Workplan. A technical report of the results of the groundwater investigation and product removal tasks (Section 3.3) can be prepared within 2 weeks of completing the product removal task.

5.0 SELECTED REFERENCES

- Certified Engineering and Testing Company (Certified). 1994. Subsurface Investigation, 1600 63rd Street, Emeryville. November 22.
- Engineering-Science (ES). 1988. Site Characterization Report for Soil and Groundwater Contamination at 1600 63rd Street Site, Emeryville. December 22.
- Harding Lawson Associates (HLA). 1989. Groundwater Quality Investigation, 1600 63rd Street Emeryville. October 2.
- Harding Lawson Associates. 1991. Quarterly Groundwater Monitoring, 1600 63rd Street Emeryville. November 21.
- Kaldveer Associates (Kaldveer). 1988. Foundation Investigation for Federal Express Building at Peterson Manufacturing Site, Emeryville. April 11.
- SOMA Corporation. 1998. Summary of Remedial Activities and Recommended Site Closure Measures, 1600 63rd Street, Emeryville. July 30.
- SOMA Corporation. 1999a. Additional Groundwater Investigation Workplan, 1600 63rd Street, Emeryville. February 23.
- SOMA Corporation. 1999b. Shallow Groundwater Sampling Results and Addendum to Additional Groundwater Investigation Workplan, 1600 63rd Street, Emeryville. July 7.
- SOMA Corporation. 1999c. Shallow Groundwater Investigation Results, 1600 63rd Street, Emeryville. September 2.

TABLES

TABLE 1
HISTORICAL SUMMARY OF GROUNDWATER ELEVATION DATA
 1600 63rd Street
 Emeryville, California

Well Number	Top-of-Casing Elevation (feet)	Depth of Well Screen Interval (feet)	Date Measured	Depth to Water (feet)	Water Elevation (feet)	Change in Elevation (feet)
MW-1	15.12	13-18	8/3/89	5.99	9.13	
			9/21/89	5.81	9.31	0.18
			10/20/89	6.24	8.88	-0.43
			12/20/89	6.09	9.03	0.15
			3/20/90	5.87	9.25	0.22
			7/20/90	5.75	9.37	0.12
			11/12/90	6.04	9.08	-0.29
			2/7/91	6.65	8.47	-0.61
			5/8/91	6.17	8.95	0.48
			5/14/99	5.78	9.34	0.39
MW-2	14.43	12.5-20.5	8/3/89	6.66	7.77	
			9/21/89	6.32	8.11	0.34
			10/20/89	6.78	7.65	-0.46
			12/20/89	7.32	7.11	-0.54
			3/20/90	6.76	7.67	0.56
			5/11/90	6.66*	--	--
			7/20/90	6.74*	--	--
			11/12/90	6.75*	--	--
			11/21/90	7.00*	--	--
			2/7/91	6.88*	--	--
			5/8/91	6.92*	--	--
5/14/99	NM*	--	--			
MW-3	15.90	20-25	8/3/89	4.06	11.84	
			9/21/89	3.77	12.13	0.29
			10/20/89	4.49	11.41	-0.72
			12/20/89	4.32	11.58	0.17
			3/20/90	3.78	12.12	0.54
			7/20/90	3.73	12.17	0.05
			11/12/90	3.89	12.01	-0.16
			2/7/91	3.92	11.98	-0.03
			5/8/91	3.96	11.94	-0.04
			5/14/99	5.54	10.36	-1.58
MW-4	14.04	22-29	8/3/89	7.10	6.94	
			9/21/89	6.90	7.14	0.20
			10/20/89	6.95	7.09	-0.05
			12/20/89	7.24	6.80	-0.29
			3/20/90	6.94	7.10	0.30
			7/20/90	6.94	7.10	0.00
			11/12/90	7.13	6.91	-0.19
			2/7/91	6.94	7.10	0.19
			5/8/91	7.15	6.89	-0.21
			5/14/99	5.54	8.50	1.61
MW-5	15.21	24-32	8/3/89	4.35	10.86	
			9/21/89	4.38	10.83	-0.03
			10/20/89	4.37	10.84	0.01
			12/20/89	4.48	10.73	-0.11

TABLE 1 (cont.)

Well Number	Top-of-Casing Elevation (feet)	Depth of Wall Screen Interval (feet)	Date Measured	Depth to Water (feet)	Water Elevation (feet)	Change in Elevation (feet)
MW-5 (cont.)	15.21	24-32	3/20/90	4.07	11.14	0.41
			7/20/90	4.12	11.09	-0.05
			11/12/90	4.36	10.85	-0.24
			2/7/91	4.44	10.77	-0.08
			5/8/91	3.90	11.31	0.54
			5/14/99	4.09	11.12	-0.19

NOTES:

* - Petroleum product measured in well (0.01- to 3-feet thick)

TABLE 2A
SHALLOW GROUNDWATER ANALYTICAL RESULTS (ppm)
1600 63rd Street, Emeryville, California

Sample No.	Date Sampled	Notes	Chemical Concentrations Detected (ppm)											
			TPHd	Motor Oil	TPHg	Benzene	Toluene	Ethyl-benzene	Total Xylenes	PCBs	EPA 8010 Analytes	EPA 8080 Analytes	EPA 8270 Analytes	MTBE
Monitoring Wells														
MW-1	5/14/99		0.2	<0.5	<0.05	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	ND	ND	ND	<0.005
MW-2	5/14/99	(1)	550	<3,500	210	<2.5	<2.5	<2.5	4.9	<0.5	NA	NA	NA	NA
MW-3	5/14/99		0.15	<0.5	<0.05	<0.0005	<0.0005	<0.0005	<0.0005	<0.00052	ND	ND	ND	<0.005
MW-4	5/14/99		<0.051	<0.51	<0.05	<0.0005	<0.0005	<0.0005	<0.0005	<0.0005	ND	ND	ND	<0.005
MW-5	5/14/99		<0.05	<0.5	<0.05	<0.0005	<0.0005	<0.0005	<0.0005	<0.00052	ND	ND	ND	<0.005
Groundwater Grab Samples														
HP-1-W	8/5/99		0.087	NA	<0.05	<0.0005	<0.0005	<0.0005	<0.0005	NA	NA	NA	NA	<0.005
HP-2-W	8/5/99		210	NA	3.2	<0.001	<0.001	<0.001	<0.001	NA	NA	NA	NA	<0.01
HP-3-W	8/5/99		150	NA	5.4	<0.005	<0.005	<0.005	<0.005	NA	NA	NA	NA	<0.05
HP-4-W	8/5/99		2	NA	0.13	<0.0005	0.001	0.00082	0.002	NA	NA	NA	NA	<0.005
HP-5-W	8/5/99	(1)	5,800	NA	3	<0.005	<0.005	<0.005	<0.005	NA	NA	NA	NA	<0.05

NOTES:

- ppm = parts per million
- TPHg = Total Petroleum Hydrocarbons as Gasoline
- TPHd = Total Petroleum Hydrocarbons as Diesel
- PCBs = Polychlorinated biphenols
- MTBE = Methyl-tertiary butyl ether
- < = Below Specified Reporting Limits.
- NA = Not Analyzed.
- ND = Not Detected.

(1) Product samples collected from well MW-2 and boring HP-5; Chromalab results indicate hydrocarbon reported does not match diesel standard. Friedman & Bruya results indicate "patterns displayed by these peaks are indicative of degraded Bunker C or crude oil"

TABLE 2B
SUMMARY OF HISTORICAL GROUNDWATER ANALYTICAL RESULTS
1600 63rd Street, Emeryville, California

Sample No.	Date Sampled	Notes	Chemical Concentrations Detected (ppm)									
			TPHd	TPHg	Benzene	Toluene	Ethyl-benzene	Total Xylenes	PCBs	EPA 8080 Analytes	EPA 8270 Analytes	EPA 8240 Analytes
Engineering Science												
ES/MW-1	11/12/87	(1)	NA	NA	1.7	2.6	NA	4.2	NA	NA	NA	NA
ES/MW-2	11/12/87	(2)	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
ES/MW-3	1/13/88	(3)	NA	NA	NA	NA	NA	NA	<0.0003	NA	NA	0.002 (12)
HLA												
MW-1	6/18/89		<0.5	<0.5	<0.001	<0.001	<0.001	<0.001	NA	NA	ND	<0.01
	9/21/89		<0.5	<0.5	<0.005	<0.005	<0.005	<0.005	0.0005	(4)	ND	<0.01
	12/20/89		<0.5	<0.05	<0.005	<0.005	<0.005	<0.005	<0.0005	ND	ND	<0.01
	3/20/90		<0.5	<0.05	<0.005	<0.005	<0.005	<0.005	<0.0005	ND	ND	<0.01
	7/20/90		0.17	<0.05	<0.005	<0.0005	<0.0005	<0.005	NA	ND	NA	NA
	11/12/90		0.16	<0.05	<0.005	<0.0005	<0.0005	<0.005	<0.0005	ND	NA	NA
	2/7/91		0.2	<0.05	<0.005	<0.0005	<0.0005	<0.005	<0.0005	ND	NA	NA
	5/8/91		0.7	<0.05	<0.005	<0.0005	<0.0005	<0.005	<0.0005	ND	NA	NA
MW-2	6/25/89		<0.5	0.3	<0.005	<0.005	<0.005	<0.005	<0.0005	NA	(7)	<0.01
	9/21/89		1	<0.5	<0.005	<0.005	<0.005	<0.005	<0.0005	(5)	(8)	<0.01
	12/20/89		<0.5	0.53	<0.005	<0.005	<0.005	<0.005	<0.0005	ND	(9)	<0.01
	2/20/90		49	0.42	<0.005	<0.005	<0.005	<0.005	<0.0005	(6)	(10)	0.044 (13)
	5/11/90		8.4	1.2	<0.005	<0.005	<0.005	<0.005	NA	NA	NA	<0.01
	5/11/90		<2.5	<0.5	<0.01	<0.01	<0.01	<0.01	NA	NA	NA	<0.02
	7/20/90		27	3.9	<0.005	<0.005	<0.005	0.011	NA	ND	NA	NA
	7/20/90		30	2.3	<0.005	<0.0025	<0.0025	0.0033	NA	ND	NA	NA
	11/12/90		61	380	<0.005	<0.0005	<0.0005	0.0005	<0.0005	ND	NA	NA
	11/12/90		35	7	<0.005	0.0009	0.0001	0.0079	<0.0005	ND	NA	NA
	2/7/91		41	11	<0.005	<0.0005	<0.0005	<0.0005	<0.0005	ND	NA	NA
	2/7/91		27	13	<0.005	<0.0005	<0.0005	0.043	<0.0005	ND	NA	NA
	5/8/91		43	88	<0.005	<0.0005	<0.0005	<0.005	<0.0005	ND	NA	NA
5/8/91		26	150	<0.005	<0.0005	<0.0005	<0.005	<0.0005	ND	NA	NA	
MW-3	7/18/89		<0.5	<0.5	<0.001	<0.001	<0.001	<0.001	NA	NA	ND	<0.01
	9/21/89		<0.5	<0.5	<0.005	<0.005	<0.005	<0.005	<0.0005	ND	ND	<0.01
	12/20/89		<0.5	<0.05	<0.005	<0.005	<0.005	<0.005	<0.0005	ND	ND	<0.01
	3/20/90		<0.5	<0.05	<0.005	<0.005	<0.005	<0.005	<0.0005	ND	ND	<0.01
	7/20/90		<0.05	0.11	<0.005	<0.0005	<0.0005	<0.005	NA	ND	NA	NA
	11/12/90		<0.05	<0.05	<0.005	<0.0005	<0.0005	<0.005	<0.0005	ND	NA	NA
	2/7/91		0.12	<0.05	<0.005	<0.0005	<0.0005	<0.005	<0.0005	ND	NA	NA
	5/8/91		<0.05	<0.05	<0.005	<0.0005	<0.0005	<0.005	<0.0005	ND	NA	NA

TABLE 2B (cont.)

Sample No.	Date Sampled	Notes	Chemical Concentrations Detected (ppm)									
			TPHd	TPHg	Benzene	Toluene	Ethyl-benzene	Total Xylenes	PCB's	EPA 8080 Analytes	EPA 8270 Analytes	EPA 8240 Analytes
MW-4	6/25/89		<0.5	<0.05	<0.005	<0.005	<0.005	<0.005	<0.0005	NA	ND	<0.01
	9/21/89		<0.5	<0.5	<0.005	<0.005	<0.005	<0.005	<0.0005	ND	ND	<0.01
	12/20/89		<0.5	<0.05	<0.005	<0.005	<0.005	<0.005	<0.0005	ND	ND	<0.01
	12/20/89		NA	NA	<0.005	<0.005	<0.005	<0.005	NA	NA	NA	<0.01
	3/20/90		<0.5	<0.05	<0.005	<0.005	<0.005	<0.005	<0.0005	ND	ND	<0.01
	7/20/90		<0.05	0.12	<0.005	<0.0005	<0.0005	<0.005	NA	ND	NA	NA
	11/12/90		<0.05	<0.05	<0.005	<0.0005	<0.0005	<0.005	<0.0005	ND	NA	NA
	2/7/91		<0.05	<0.05	<0.005	<0.0005	<0.0005	<0.005	<0.0005	ND	NA	NA
	5/8/91		<0.05	<0.05	<0.005	<0.0005	<0.0005	<0.005	<0.0005	ND	NA	NA
MW-5	6/30/89		<0.5	<0.05	<0.005	<0.005	<0.005	<0.005	NA	NA	ND	<0.01
	9/21/89		<0.5	<0.5	<0.005	<0.005	<0.005	<0.005	0.0009	(11)	ND	<0.01
	12/20/89		<0.5	<0.05	<0.005	<0.005	<0.005	<0.005	<0.0005	ND	ND	<0.01
	3/20/90		<0.5	<0.05	<0.005	<0.005	<0.005	<0.005	<0.0005	ND	ND	<0.01
	7/20/90		<0.05	<0.05	<0.005	<0.0005	<0.0005	<0.005	NA	ND	NA	NA
	11/12/90		<0.05	<0.05	<0.005	<0.0005	<0.0005	<0.005	<0.0005	ND	NA	NA
	2/7/91		<0.05	<0.05	<0.005	<0.0005	<0.0005	<0.005	<0.0005	ND	NA	NA
	5/8/91		<0.05	<0.05	<0.005	<0.0005	<0.0005	<0.005	<0.0005	ND	NA	NA
Certified												
MW-2	11/19/92		22	0.59	<0.0003	0.0014	<0.0003	0.0015	NA	NA	NA	NA
	7/13/94		6	<2	<0.001	<0.001	<0.001	<0.001	NA	NA	NA	NA

NOTES:

ppm = parts per million
 TOG = Total Petroleum Hydrocarbons as Oil and Grease
 TPHg = Total Petroleum Hydrocarbons as Gasoline
 TPHd = Total Petroleum Hydrocarbons as Diesel
 PCBs = Polychlorinated biphenols
 < = Below Specified Reporting Limits.
 NA = Not Analyzed.
 ND = Not Detected.

- (1) 0.031 ppm lead and 21 ppm total fuel hydrocarbons detected.
- (2) 200 ppm TOG detected.
- (3) 2.7 ppm total fuel hydrocarbons detected.
- (4) 0.0001 ppm endrin aldehyde detected.
- (5) 0.00016 ppm heptachlor and 0.00015 ppm 4,4'-DDD detected.
- (6) 0.00035 ppm Gamma-BHC detected.
- (7) Trace fluorene detected.
- (8) 0.006 ppm fluorene, 0.005 ppm bis(2-ethyl-hexyl) phthalate and 0.0061 ppm 2-methyl-naphthalene detected.
- (9) 0.012 ppm 2-methyl-naphthalene detected.
- (10) 0.0061 ppm fluorene, 0.018 ppm 2-methyl-naphthalene and 0.0055 phenanthrene detected.
- (11) 0.00015 ppm endrin aldehyde detected.
- (12) 0.002 ppm unknown EPA 8240 analyte detected.
- (13) 0.044 ppm acetone detected.

TABLE 3
DEEP GROUNDWATER ANALYTICAL RESULTS (ppm)
1600 63rd Street, Emeryville, California

Sample No.	Date Sampled	Depth (feet)	Notes	Chemical Concentrations Detected (ppm)									
				TPHd	TPHg	Benzene	Toluene	Ethyl-benzene	Total Xylenes	PCBs	EPA 8010 Analytes	EPA 8080 Analytes	EPA 8270 Analytes
CPT Ground-Water Grab Samples													
CPT-1-1W	10/21/99	78' - 103'		<0.05	<0.05	<0.0005	<0.0005	<0.0005	<0.0005	<0.005	ND	ND	ND
CPT-1-2W	10/21/99	135' - 160'	(1)	0.1	<0.05	<0.0005	<0.0005	<0.0005	<0.0005	<0.013	ND	ND	ND

NOTES:

- ppm = parts per million
- TPHg = Total Petroleum Hydrocarbons as Gasoline
- TPHd = Total Petroleum Hydrocarbons as Diesel
- PCBs = Polychlorinated biphenols
- < = Below Specified Reporting Limits.
- ND = Not Detected.
- (1) Chromalab analytical results state "Compounds reported are in the diesel range. They do not exhibit pattern characteristic of hydrocarbon."

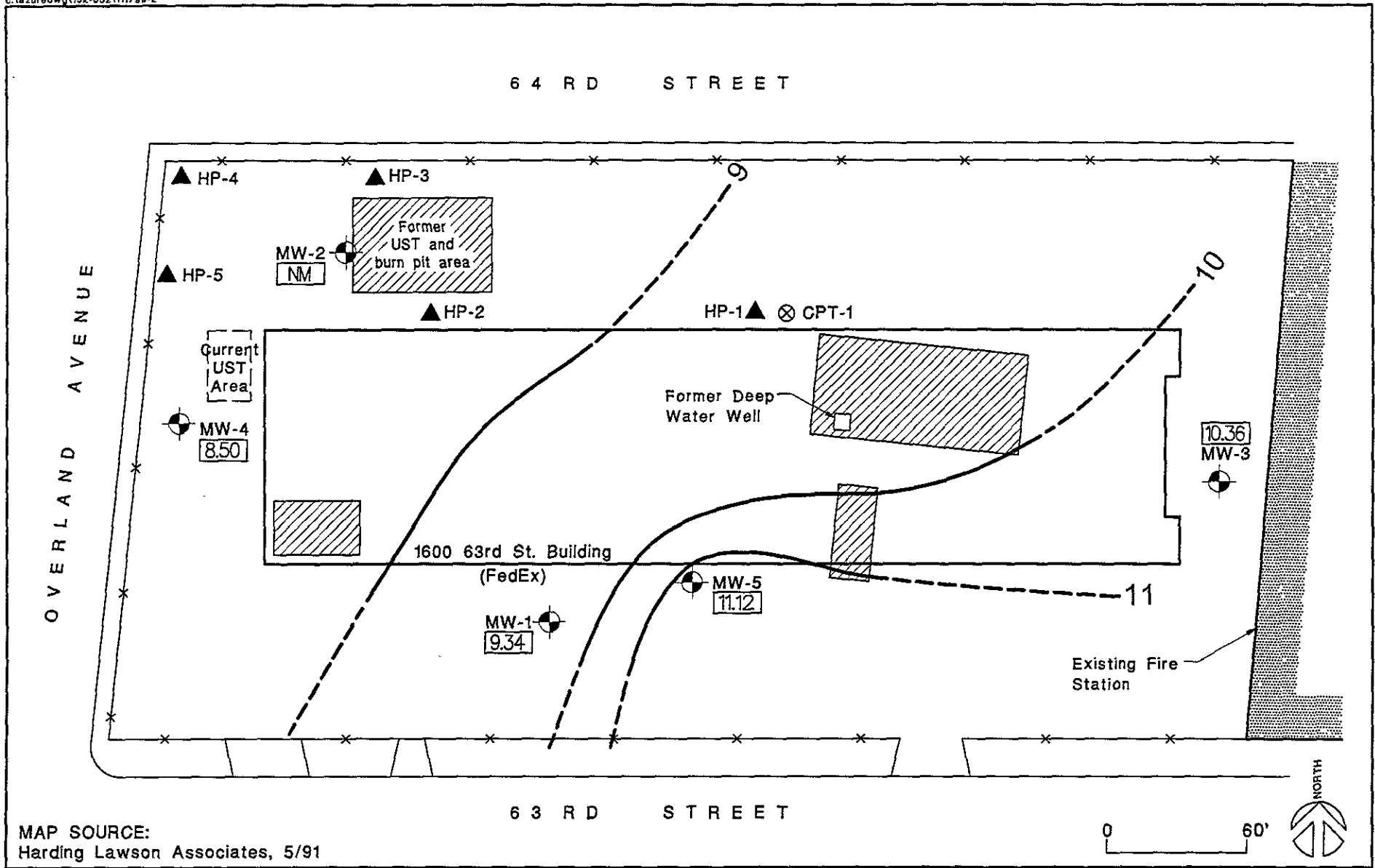
FIGURES



MAP SOURCE:
 U.S.G.S. Oakland West, California
 1:24,000 - Scale Series (Topographic)
 Photo revised - 1980

Figure 1: Site Vicinity Map

SOMA CORPORATION

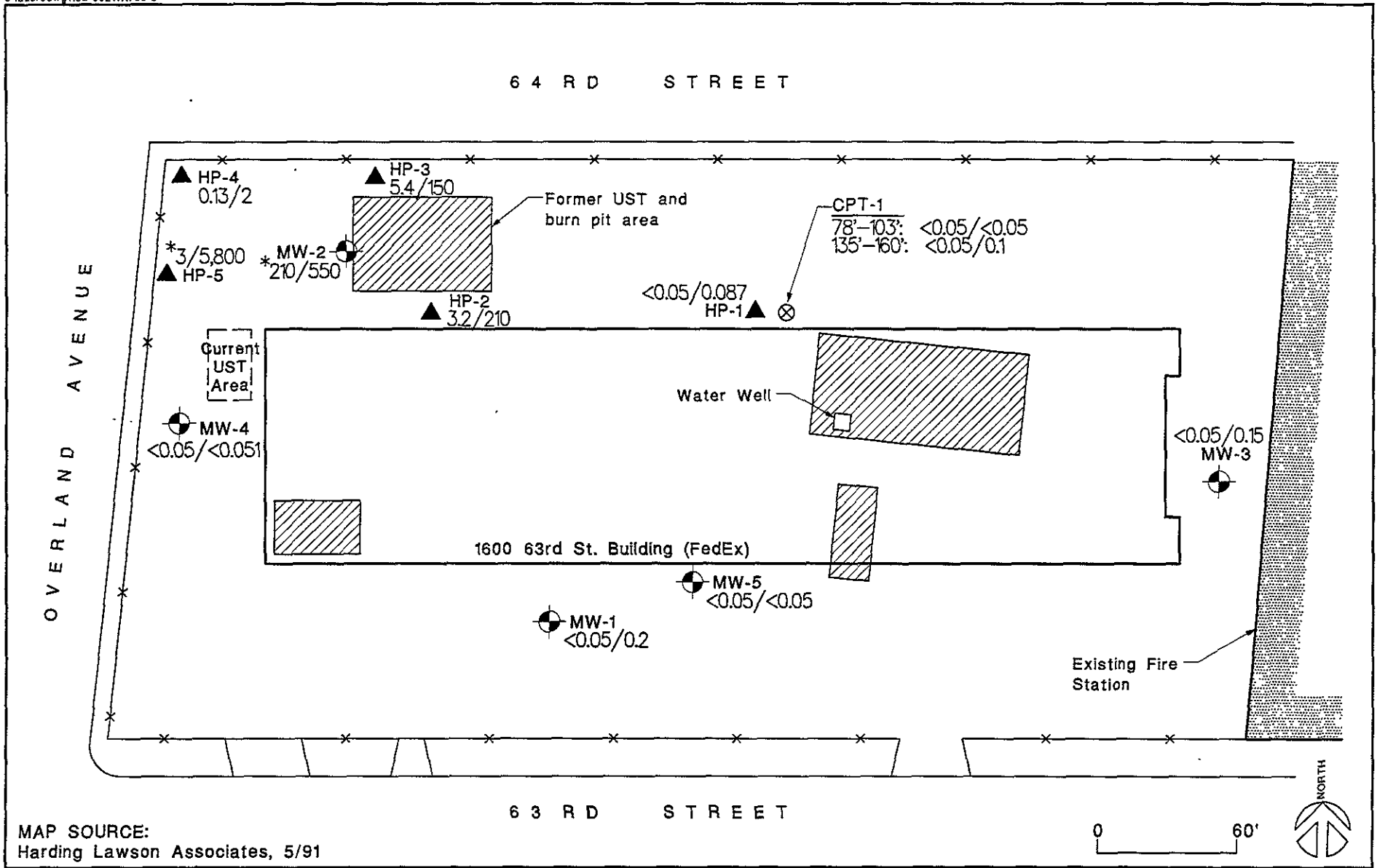


EXPLANATION:

	Monitoring Well		Soil and Tank Excavation Areas
	Groundwater Grab Sample Location		Groundwater Elevation (feet MSL)
	CPT Sampling Location	NM	Not Measured
			Groundwater Elevation Contour (feet MSL)

Figure 2: Shallow Groundwater Elevations on May 14, 1999

SOMA CORPORATION



EXPLANATION:






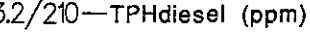
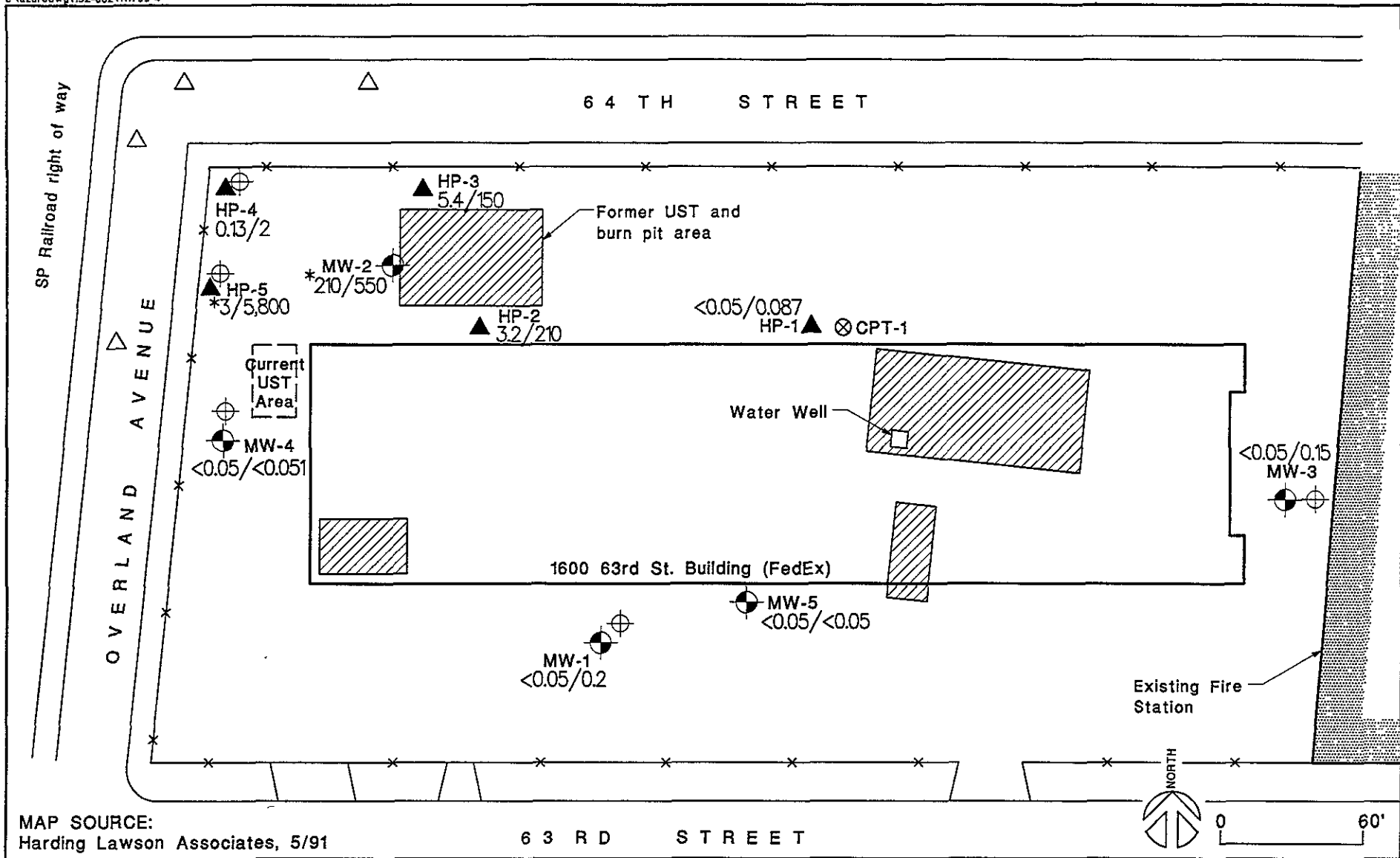
-  Monitoring Well
-  Shallow Groundwater Grab Sample Location
-  Deep Groundwater CPT Sampling Location
-  Soil and Tank Excavation Areas
-  TPHgas (ppm)
-  TPHdiesel (ppm)
- * Product observed in sample

Figure 3: Groundwater Investigation Sampling Results, TPH Gasoline and Diesel

SOMA CORPORATION



EXPLANATION:

















- Monitoring Well
- August 1999 Groundwater Grab Sample Location
- CPT Sampling Location
- Proposed Monitoring Well Location
- Proposed Groundwater Grab Sample Location
- Soil and Tank Excavation Areas
- TPHgas (ppm)
- TPHdiesel (ppm)
- * Product observed in sample





Figure 4: Proposed Additional Groundwater Sampling and Monitoring Well Locations

SOMA CORPORATION

APPENDIX A
BORING LOGS, HP-1 THROUGH HP-5

LITHOLOGY

Depth (feet)	Graphic Log	Description	OVA (ppm)
.....		ASPHALT	.....
.....		FILL - SANDY GRAVEL (GW), gray (10YR 6/1), moist to dry, loose, poorly sorted, angular gravels (up to 1/2" diameter), no odor, brick and glass fragments.	.....
.....		— Grades to clayey gravel.	.....
5			5
.....		SILTY CLAY (CL), dark green-gray (5G 4/1), stiff, moist, lowplasticity, abundant gravel and medium sand, no odor.	30
.....		— Color change to light brown (7.5YR 6/3), trace sand.	.....
10		— Increased amount of fine sand, iron oxide stain.	10
.....			0
.....			0
.....			0
15		GRAVELLY CLAY (CL) to CLAYEY GRAVEL (GC), light brown (7.5YR 6/3), wet, loose, angular gravel, abundant medium grain sand, no odor.	15
.....			0
.....			0
.....			0
20		SANDY CLAY (CL) to CLAYEY SAND (SC), dark green-gray (5G 4/1), soft, wet, low plasticity, very fine sand, massive, no odor. BOTTOM OF HOLE AT 19 FEET.	20
.....		
25			25
.....		
30			30
.....		
35			35

 SAND	 SILT
 CLAY	 GRAVEL

Drilling Method: Direct Push
 Sampling method: Envirocore
 Drilling company: Precision
 Drillers: Sergio/Jesus

Date: 8-5-99
 Permit No.: 99WR479
 Geologist: JH/ BW

BLM/MC/AOL.COM
























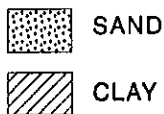
Lithology for Soil Boring HP-1
 1600 63rd Street, Emeryville, California

November 1999

152-002

LITHOLOGY







Depth (feet)	Graphic Log	Description	OVA (ppm)
.....		ASPHALT	.....
.....		FILL - SANDY GRAVEL (GW), gray (10YR 6/1), moist to dry, loose, poorly sorted, angular gravels (up to 1/2" diameter), no odor, brick and glass fragments.	.....
.....		0
5		5
.....	
.....		SILTY CLAY (CL), dark black (10YR 2/1), medium stiff, moist, low plasticity, medium sand, no odor.	0
10		10
.....		80
.....		800
.....	
15		15
.....		GRAVELLY CLAY (CL), dark green-gray (5G 4/1), moist, loose, angular gravel, abundant, medium grain sand, hydrocarbon odor.	450
.....	
.....		400
20		BOTTOM OF HOLE AT 19 FEET.	20
.....	
25		25
.....	
30		30
.....	
35		35







Drilling Method: Direct Push
 Sampling method: Envirocore
 Drilling company: Precision
 Drillers: Sergio/Jesus

Date: 8-5-99
 Permit No.: 99WR479
 Geologist: JH/ BW

LITHOLOGY



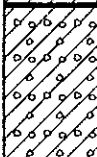

Depth (feet)	Graphic Log	Description	OVA (ppm)
.....		ASPHALT	.....
.....		FILL - SANDY GRAVEL (GW), gray (10YR 6/1), moist to dry, loose, poorly sorted, angular gravels (up to 1/2" diameter), no odor, brick and glass fragments.	.....
.....		SILTY CLAY (CL), black (10YR 2/1), medium stiff, moist, lowplasticity, medium sands, medium hydrocarbon odor.	.....
5		— Color change to black to dark green-gray (5G 1/4)	5
.....			200
.....			200
10			10
.....		GRAVELLY CLAY (CL), dark green-gray (5G 4/1), moist, loose, angular gravel, abundant, medium grain.	.....
.....			200
.....		SILTY CLAY (CL), black (10YR 2/1), medium stiff, moist, lowplasticity, medium sands, medium hydrocarbon odor.	.....
15			15
.....			800
.....		SANDY CLAY (CL), dark green-gray (5G 4/1), soft, moist, low plasticity, well sorted, fine sand, strong hydrocarbon odor.	.....
.....			700
20		BOTTOM OF HOLE AT 19 FEET.	20
.....		
25			25
.....		
30			30
.....		
35			35





- | | |
|--|--|
|  SAND |  SILT |
|  CLAY |  GRAVEL |

Drilling Method: Direct Push
 Sampling method: Envirocore
 Drilling company: Precision
 Drillers: Sergio/Jesus

Date: 8-5-99
 Permit No.: 99WR479
 Geologist: JH/ BW

LITHOLOGY

Depth (feet)	Graphic Log	Description	OVA (ppm)
..... <u>5</u>		ASPHALT FILL - SANDY GRAVEL (GW) , gray (10YR 6/1), moist to dry, loose, poorly sorted, angular gravels (up to 1/2" diameter), no odor, brick and glass fragments.	..... ..... ..... <u>5</u>
..... <u>10</u>		SILTY CLAY (CL) , dark green-gray (5G 4/1), slightly moist, bw plasticity, stiff, minor amount of imbedded gravel, mottled, hydrocarbon odor. — increased amount of fine sand.	..... ..... ..... <u>10</u>
..... <u>15</u>		GRAVELLY CLAY (CL) to CLAYEY SANDY GRAVEL (GC) , dark green-gray (5G 4/1), moist, loose, interbedded CL and GC with abundant medium grain sand, hydrocarbon odor.	..... ..... ..... <u>15</u>
..... <u>20</u>		SILTY CLAY (CL) , light brown (7.5YR 6/3), moist, stiff, massive, no odor.	..... ..... ..... <u>20</u>
<u>20</u>		BOTTOM OF HOLE AT 19 FEET.	<u>20</u>
25			25
30			30
35			35

 SAND	 SILT
 CLAY	 GRAVEL

Drilling Method: Direct Push
 Sampling method: Envirocore
 Drilling company: Precision
 Drillers: Sergio/Jesus

Date: 8-5-99
 Permit No.: 99WR479
 Geologist: JH/ BW



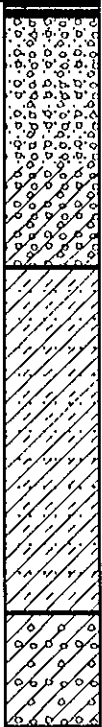
Lithology for Soil Boring HP-4
 1600 63rd Street, Emeryville, California





November 1999

152-002

BMMNC@JOL.COM

LITHOLOGY

Depth (feet)	Graphic Log	Description	OVA (ppm)
5		<p>ASPHALT FILL - SANDY GRAVEL (GW), gray (10YR 6/1), moist to dry, loose, poorly sorted, angular gravels (up to 1/2" diameter), no odor, brick and glass fragments.</p> <p>— Grades to clayey gravel.</p>	0
10		<p>SANDY SILTY CLAY (CL), dark greenish gray (5G 4/1), wet, stiff, medium plasticity, abundant medium sand, minor fine gravel, strong hydrocarbon odor.</p>	240
15		<p>— Grades to SANDY CLAY (CL), medium sand, wet, strong hydrocarbon odor.</p> <p>— Hydrocarbon product stain at 15.5 to 16 feet.</p>	340
20		<p>GRAVELLY CLAY (CL) to CLAYEY SANDY GRAVEL(GC), dark green-gray (5G 4/1), wet, loose, interbedded CL and GC with abundant sand, strong hydrocarbon odor.</p> <p>BOTTOM OF HOLE AT 19 FEET.</p>	100
25			25
30			30
35			35

 SAND	 SILT
 CLAY	 GRAVEL

Drilling Method: Direct Push
 Sampling method: Envirocore
 Drilling company: Precision
 Drillers: Sergio/Jesus

Date: 8-5-99
 Permit No.: 99WR479
 Geologist: JH/ BW

APPENDIX B
LABORATORY CERTIFICATES

Azure Environmental
828 Mission Avenue
San Rafael, CA 94941

Attn.: Mr. Jeff Hennier

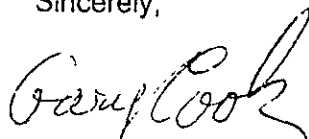
Project: 1600 63rd Street

Dear Jeff,

Attached is our report for your samples received on Friday May 14, 1999.
This report has been reviewed and approved for release. Reproduction of this report is permitted only in its entirety.

Please note that any unused portion of the samples will be discarded after June 13, 1999 unless you have requested otherwise. We appreciate the opportunity to be of service to you. If you have any questions, please call me at (925) 484-1919.

Sincerely,



Gary Cook

MTBE by GC/MS - EPA8260A

Azure Environmental

✉ 828 Mission Avenue
San Rafael, CA 94941

Attn: Jeff Hennier

Phone: (415) 485-9740 Fax: (415) 485-6062

Project #:

Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
MW-1	Water	05/14/1999	1
MW-3	Water	05/14/1999 16:00	3
MW-4	Water	05/14/1999 11:30	4
MW-5	Water	05/14/1999 14:15	5

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Attn.: Jeff Hennier

Test Method: 8260A

Prep Method: 5030

MTBE by GC/MS - EPA8260A

Sample ID: MW-1	Lab Sample ID: 1999-05-1125-001
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999	Extracted: 05/19/1999 17:36
Matrix: Water	QC-Batch: 1999/05/19-01.06

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
MTBE	ND	5.0	ug/L	1.00	05/19/1999 17:36	
<i>Surrogate(s)</i> 1,2-Dichloroethane-d4	106.6	76-114	%	1.00	05/19/1999 17:36	

1220 Quarry Lane * Pleasanton, California 94566-4756
Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

Printed on: 05/26/1999 10:17

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Attn.: Jeff Hennier

Test Method: 8260A

Prep Method: 5030

MTBE by GC/MS - EPA8260A

Sample ID: MW-3	Lab Sample ID: 1999-05-1125-003
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 16:00	Extracted: 05/19/1999 18:07
Matrix: Water	QC-Batch: 1999/05/19-01.06

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
MTBE	ND	5.0	ug/L	1.00	05/19/1999 18:07	
<i>Surrogate(s)</i> 1,2-Dichloroethane-d4	113.8	76-114	%	1.00	05/19/1999 18:07	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Attn.: Jeff Hennier

Test Method: 8260A

Prep Method: 5030

MTBE by GC/MS - EPA8260A

Sample ID: MW-4	Lab Sample ID: 1999-05-1125-004
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 11:30	Extracted: 05/19/1999 18:38
Matrix: Water	QC-Batch: 1999/05/19-01.06

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
MTBE	ND	5.0	ug/L	1.00	05/19/1999 18:38	
<i>Surrogate(s)</i> 1,2-Dichloroethane-d4	111.7	76-114	%	1.00	05/19/1999 18:38	

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

Printed on: 05/26/1999 10:17

Page 4 of 8

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Attn.: Jeff Hennier

Test Method: 8260A

Prep Method: 5030

MTBE by GC/MS - EPA8260A

Sample ID: MW-5	Lab Sample ID: 1999-05-1125-005
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 14:15	Extracted: 05/19/1999 15:08
Matrix: Water	QC-Batch: 1999/05/19-01.06

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
MTBE	ND	5.0	ug/L	1.00	05/19/1999 15:08	
Surrogate(s) 1,2-Dichloroethane-d4	107.4	76-114	%	1.00	05/19/1999 15:08	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Attn.: Jeff Hennier

Test Method: 8260A

Prep Method: 5030

Batch QC Report
MTBE by GC/MS - EPA8260A

Method Blank

Water

QC Batch # 1999/05/19-01.06

MB: 1999/05/19-01.06-001

Date Extracted: 05/19/1999 14:54

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Methyl tert-butyl ether (MTBE)	ND	5.0	ug/L	05/19/1999 14:54	
<i>Surrogate(s)</i> 1,2-Dichloroethane-d4	110.6	76-114	%	05/19/1999 14:54	

1220 Quarry Lane * Pleasanton, California 94566-4756
Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

Printed on: 05/26/1999 10:17

Page 6 of 8

To: Azure Environmental

Attn: Jeff Hennier

Test Method: 8260A

Prep Method: 5030

Batch QC Report

MTBE by GC/MS - EPA8260A

Laboratory Control Spike (LCS/LCSD)		Water	QC Batch # 1999/05/19-01.06
LCS: 1999/05/19-01.06-002	Extracted: 05/19/1999 13:52	Analyzed: 05/19/1999 13:52	
LCSD: 1999/05/19-01.06-003	Extracted: 05/19/1999 14:23	Analyzed: 05/19/1999 14:23	

Compound	Conc. [ug/L]		Added Amount	Recovery %		RPD	Control Limits %		Flags	
	LCS	LCSD		LCS	LCSD		Recovery	RPD	LCS	LCSD
Methyl tert-butyl ether	481.07	459.56	500	96.2	91.9	4.6	65-165	20		
Surrogate(s)										
1,2-Dichloroethane-d4	570.91	524.66	500	114.2	104.9		76-114			

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Attn.: Jeff Hennier

Test Method: 8260A

Prep Method: 5030

Batch QC Report

MTBE by GC/MS - EPA8260A

Matrix Spike (MS / MSD)

Water

QC Batch # 1999/05/19-01.06

Sample ID: MW5

Lab Sample ID: 1999-05-1101-001

MS: 1999/05/19-01.06-004 Extracted: 05/19/1999 16:34 Analyzed: 05/19/1999 16:34 Dilution: 1.0

MSD: 1999/05/19-01.06-005 Extracted: 05/19/1999 16:34 Analyzed: 05/19/1999 16:34 Dilution: 1.0

Compound	Conc. [ug/L]			Added Amount	Recovery %		RPD	Control Limits %		Flags	
	MS	MSD	Sample		MS	MSD		Recovery	RPD	MS	MSD
Methyl tert-butyl ether	429.53	392.84	ND	500	85.9	78.6	2.2	65-165	20		
Surrogate(s) 1,2-Dichloroethane-d4	487.6	491.46		500	97.5	98.3		76-114			

Semi-volatile Organic Compounds

Azure Environmental	☒ 828 Mission Avenue San Rafael, CA 94941
Attn: Jeff Hennier	Phone: (415) 485-9740 Fax: (415) 485-6062
Project #:	Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
MW-1	Water	05/14/1999	1
MW-3	Water	05/14/1999 16:00	3
MW-4	Water	05/14/1999 11:30	4
MW-5	Water	05/14/1999 14:15	5

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Attn.: Jeff Hennier

Test Method: 8270A

Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: MW-1	Lab Sample ID: 1999-05-1125-001
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999	Extracted: 05/19/1999 14:02
Matrix: Water	QC-Batch: 1999/05/19-01.11
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Phenol	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Bis(2-chloroethyl)ether	ND	2.1	ug/L	1.04	05/19/1999 17:25	
2-Chlorophenol	ND	2.1	ug/L	1.04	05/19/1999 17:25	
1,3-Dichlorobenzene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
1,4-Dichlorobenzene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Benzyl alcohol	ND	5.2	ug/L	1.04	05/19/1999 17:25	
1,2-Dichlorobenzene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
2-Methylphenol	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Bis(2-chloroisopropyl) ether	ND	2.1	ug/L	1.04	05/19/1999 17:25	
4-Methylphenol	ND	2.1	ug/L	1.04	05/19/1999 17:25	
N-Nitroso-di-n-propylamine	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Hexachloroethane	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Nitrobenzene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Isophorone	ND	2.1	ug/L	1.04	05/19/1999 17:25	
2-Nitrophenol	ND	2.1	ug/L	1.04	05/19/1999 17:25	
2,4-Dimethylphenol	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Bis(2-chloroethoxy) methane	ND	5.2	ug/L	1.04	05/19/1999 17:25	
2,4-Dichlorophenol	ND	2.1	ug/L	1.04	05/19/1999 17:25	
1,2,4-Trichlorobenzene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Naphthalene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
4-Chloroaniline	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Hexachlorobutadiene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
4-Chloro-3-methylphenol	ND	5.2	ug/L	1.04	05/19/1999 17:25	
2-Methylnaphthalene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Hexachlorocyclopentadiene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
2,4,6-Trichlorophenol	ND	2.1	ug/L	1.04	05/19/1999 17:25	
2,4,5-Trichlorophenol	ND	2.1	ug/L	1.04	05/19/1999 17:25	
2-Chloronaphthalene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
2-Nitroaniline	ND	10	ug/L	1.04	05/19/1999 17:25	
Dimethyl phthalate	ND	5.2	ug/L	1.04	05/19/1999 17:25	
Acenaphthylene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
3-Nitroaniline	ND	10	ug/L	1.04	05/19/1999 17:25	
Acenaphthene	ND	2.1	ug/L	1.04	05/19/1999 17:25	

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

To: **Azure Environmental**

Attn.: Jeff Hennier

Test Method: 8270A

Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: MW-1	Lab Sample ID: 1999-05-1125-001
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999	Extracted: 05/19/1999 14:02
Matrix: Water	QC-Batch: 1999/05/19-01.11
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
2,4-Dinitrophenol	ND	10	ug/L	1.04	05/19/1999 17:25	
4-Nitrophenol	ND	10	ug/L	1.04	05/19/1999 17:25	
Dibenzofuran	ND	2.1	ug/L	1.04	05/19/1999 17:25	
2,4-Dinitrotoluene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
2,6-Dinitrotoluene	ND	5.2	ug/L	1.04	05/19/1999 17:25	
Diethyl phthalate	ND	5.2	ug/L	1.04	05/19/1999 17:25	
4-Chlorophenyl phenyl ether	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Fluorene	ND	5.2	ug/L	1.04	05/19/1999 17:25	
4-Nitroaniline	ND	10	ug/L	1.04	05/19/1999 17:25	
2-Methyl-4,6-dinitrophenol	ND	10	ug/L	1.04	05/19/1999 17:25	
N-Nitrosodiphenylamine	ND	2.1	ug/L	1.04	05/19/1999 17:25	
4-Bromophenyl phenyl ether	ND	5.2	ug/L	1.04	05/19/1999 17:25	
Hexachlorobenzene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Pentachlorophenol	ND	10	ug/L	1.04	05/19/1999 17:25	
Phenanthrene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Anthracene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Di-n-butyl phthalate	ND	5.2	ug/L	1.04	05/19/1999 17:25	
Fluoranthene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Pyrene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Butyl benzyl phthalate	ND	5.2	ug/L	1.04	05/19/1999 17:25	
3,3-Dichlorobenzidine	ND	5.2	ug/L	1.04	05/19/1999 17:25	
Benzo(a)anthracene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
bis(2-Ethylhexyl) phthalate	ND	5.2	ug/L	1.04	05/19/1999 17:25	
Chrysene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Di-n-octyl phthalate	ND	5.2	ug/L	1.04	05/19/1999 17:25	
Benzo(k)fluoranthene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Benzo(a)pyrene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Indeno(1,2,3-c,d)pyrene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Dibenzo(a,h)anthracene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Benzo(g,h,i)perylene	ND	2.1	ug/L	1.04	05/19/1999 17:25	
Benzoic acid	ND	10	ug/L	1.04	05/19/1999 17:25	
Surrogate(s)						
Nitrobenzene-d5	45.6	35-114	%	1.00	05/19/1999 17:25	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Attn.: Jeff Hennier

Test Method: 8270A

Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: MW-1	Lab Sample ID: 1999-05-1125-001
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999	Extracted: 05/19/1999 14:02
Matrix: Water	QC-Batch: 1999/05/19-01.11
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
<i>Surrogate(s)</i>						
2-Fluorobiphenyl	50.7	43-116	%	1.00	05/19/1999 17:25	
p-Terphenyl-d14	81.1	33-141	%	1.00	05/19/1999 17:25	
Phenol-d5	15.5	10-110	%	1.00	05/19/1999 17:25	
2-Fluorophenol	22.2	25-100	%	1.00	05/19/1999 17:25	
2,4,6-Tribromophenol	76.7	10-123	%	1.00	05/19/1999 17:25	sl

To: Azure Environmental

Attn.: Jeff Hennier

Test Method: 8270A

Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: MW-3	Lab Sample ID: 1999-05-1125-003
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 16:00	Extracted: 05/19/1999 14:02
Matrix: Water	QC-Batch: 1999/05/19-01.11
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Phenol	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Bis(2-chloroethyl)ether	ND	2.1	ug/L	1.04	05/19/1999 18:11	
2-Chlorophenol	ND	2.1	ug/L	1.04	05/19/1999 18:11	
1,3-Dichlorobenzene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
1,4-Dichlorobenzene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Benzyl alcohol	ND	5.2	ug/L	1.04	05/19/1999 18:11	
1,2-Dichlorobenzene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
2-Methylphenol	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Bis(2-chloroisopropyl) ether	ND	2.1	ug/L	1.04	05/19/1999 18:11	
4-Methylphenol	ND	2.1	ug/L	1.04	05/19/1999 18:11	
N-Nitroso-di-n-propylamine	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Hexachloroethane	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Nitrobenzene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Isophorone	ND	2.1	ug/L	1.04	05/19/1999 18:11	
2-Nitrophenol	ND	2.1	ug/L	1.04	05/19/1999 18:11	
2,4-Dimethylphenol	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Bis(2-chloroethoxy) methane	ND	5.2	ug/L	1.04	05/19/1999 18:11	
1,2,4-Trichlorobenzene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Naphthalene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
4-Chloroaniline	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Hexachlorobutadiene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
4-Chloro-3-methylphenol	ND	5.2	ug/L	1.04	05/19/1999 18:11	
2-Methylnaphthalene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Hexachlorocyclopentadiene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
2,4,6-Trichlorophenol	ND	2.1	ug/L	1.04	05/19/1999 18:11	
2,4,5-Trichlorophenol	ND	2.1	ug/L	1.04	05/19/1999 18:11	
2-Chloronaphthalene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
2-Nitroaniline	ND	10	ug/L	1.04	05/19/1999 18:11	
Dimethyl phthalate	ND	5.2	ug/L	1.04	05/19/1999 18:11	
Acenaphthylene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
3-Nitroaniline	ND	10	ug/L	1.04	05/19/1999 18:11	
Acenaphthene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
2,4-Dinitrophenol	ND	10	ug/L	1.04	05/19/1999 18:11	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Attn.: Jeff Hennier

Test Method: 8270A

Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: MW-3	Lab Sample ID: 1999-05-1125-003
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 16:00	Extracted: 05/19/1999 14:02
Matrix: Water	QC-Batch: 1999/05/19-01.11
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
4-Nitrophenol	ND	10	ug/L	1.04	05/19/1999 18:11	
Dibenzofuran	ND	2.1	ug/L	1.04	05/19/1999 18:11	
2,4-Dinitrotoluene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
2,6-Dinitrotoluene	ND	5.2	ug/L	1.04	05/19/1999 18:11	
Diethyl phthalate	ND	5.2	ug/L	1.04	05/19/1999 18:11	
4-Chlorophenyl phenyl ether	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Fluorene	ND	5.2	ug/L	1.04	05/19/1999 18:11	
4-Nitroaniline	ND	10	ug/L	1.04	05/19/1999 18:11	
2-Methyl-4,6-dinitrophenol	ND	10	ug/L	1.04	05/19/1999 18:11	
N-Nitrosodiphenylamine	ND	2.1	ug/L	1.04	05/19/1999 18:11	
4-Bromophenyl phenyl ether	ND	5.2	ug/L	1.04	05/19/1999 18:11	
Hexachlorobenzene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Pentachlorophenol	ND	10	ug/L	1.04	05/19/1999 18:11	
Phenanthrene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Anthracene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Di-n-butyl phthalate	ND	5.2	ug/L	1.04	05/19/1999 18:11	
Fluoranthene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Pyrene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Butyl benzyl phthalate	ND	5.2	ug/L	1.04	05/19/1999 18:11	
3,3-Dichlorobenzidine	ND	5.2	ug/L	1.04	05/19/1999 18:11	
Benzo(a)anthracene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
bis(2-Ethylhexyl) phthalate	ND	5.2	ug/L	1.04	05/19/1999 18:11	
Chrysene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Di-n-octyl phthalate	ND	5.2	ug/L	1.04	05/19/1999 18:11	
Benzo(b)fluoranthene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Benzo(k)fluoranthene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Benzo(a)pyrene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Indeno(1,2,3-c,d)pyrene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Dibenzo(a,h)anthracene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Benzo(g,h,i)perylene	ND	2.1	ug/L	1.04	05/19/1999 18:11	
Benzoic acid	ND	10	ug/L	1.04	05/19/1999 18:11	
Surrogate(s)						
Nitrobenzene-d5	43.6	35-114	%	1.00	05/19/1999 18:11	

1220 Quarry Lane * Pleasanton, California 94566-4756
Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: **Azure Environmental**

Attn.: Jeff Hennier

Test Method: 8270A

Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: MW-3	Lab Sample ID: 1999-05-1125-003
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 16:00	Extracted: 05/19/1999 14:02
Matrix: Water	QC-Batch: 1999/05/19-01.11
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Surrogate(s)						
2-Fluorobiphenyl	49.9	43-116	%	1.00	05/19/1999 18:11	
p-Terphenyl-d14	62.3	33-141	%	1.00	05/19/1999 18:11	
Phenol-d5	14.1	10-110	%	1.00	05/19/1999 18:11	
2-Fluorophenol	19.6	25-100	%	1.00	05/19/1999 18:11	
2,4,6-Tribromophenol	70.5	10-123	%	1.00	05/19/1999 18:11	sl

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

To: Azure Environmental

Attn.: Jeff Hennier

Test Method: 8270A

Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: MW-4	Lab Sample ID: 1999-05-1125-004
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 11:30	Extracted: 05/18/1999 14:02
Matrix: Water	QC-Batch: 1999/05/18-02.11
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Phenol	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Bis(2-chloroethyl)ether	ND	2.1	ug/L	1.03	05/18/1999 20:21	
2-Chlorophenol	ND	2.1	ug/L	1.03	05/18/1999 20:21	
1,3-Dichlorobenzene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
1,4-Dichlorobenzene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Benzyl alcohol	ND	5.2	ug/L	1.03	05/18/1999 20:21	
1,2-Dichlorobenzene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
2-Methylphenol	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Bis(2-chloroisopropyl) ether	ND	2.1	ug/L	1.03	05/18/1999 20:21	
4-Methylphenol	ND	2.1	ug/L	1.03	05/18/1999 20:21	
N-Nitroso-di-n-propylamine	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Hexachloroethane	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Nitrobenzene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Isophorone	ND	2.1	ug/L	1.03	05/18/1999 20:21	
2-Nitrophenol	ND	2.1	ug/L	1.03	05/18/1999 20:21	
2,4-Dimethylphenol	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Bis(2-chloroethoxy) methane	ND	5.2	ug/L	1.03	05/18/1999 20:21	
2,4-Dichlorophenol	ND	2.1	ug/L	1.03	05/18/1999 20:21	
1,2,4-Trichlorobenzene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Naphthalene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
4-Chloroaniline	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Hexachlorobutadiene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
4-Chloro-3-methylphenol	ND	5.2	ug/L	1.03	05/18/1999 20:21	
2-Methylnaphthalene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Hexachlorocyclopentadiene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
2,4,6-Trichlorophenol	ND	2.1	ug/L	1.03	05/18/1999 20:21	
2,4,5-Trichlorophenol	ND	2.1	ug/L	1.03	05/18/1999 20:21	
2-Chloronaphthalene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
2-Nitroaniline	ND	10	ug/L	1.03	05/18/1999 20:21	
Dimethyl phthalate	ND	5.2	ug/L	1.03	05/18/1999 20:21	
Acenaphthylene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
3-Nitroaniline	ND	10	ug/L	1.03	05/18/1999 20:21	
Acenaphthene	ND	2.1	ug/L	1.03	05/18/1999 20:21	

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8270A

Attn.: Jeff Hennier

Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: MW-4	Lab Sample ID: 1999-05-1125-004
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 11:30	Extracted: 05/18/1999 14:02
Matrix: Water	QC-Batch: 1999/05/18-02.11
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
2,4-Dinitrophenol	ND	10	ug/L	1.03	05/18/1999 20:21	
4-Nitrophenol	ND	10	ug/L	1.03	05/18/1999 20:21	
Dibenzofuran	ND	2.1	ug/L	1.03	05/18/1999 20:21	
2,4-Dinitrotoluene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
2,6-Dinitrotoluene	ND	5.2	ug/L	1.03	05/18/1999 20:21	
Diethyl phthalate	ND	5.2	ug/L	1.03	05/18/1999 20:21	
4-Chlorophenyl phenyl ether	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Fluorene	ND	5.2	ug/L	1.03	05/18/1999 20:21	
4-Nitroaniline	ND	10	ug/L	1.03	05/18/1999 20:21	
2-Methyl-4,6-dinitrophenol	ND	10	ug/L	1.03	05/18/1999 20:21	
N-Nitrosodiphenylamine	ND	2.1	ug/L	1.03	05/18/1999 20:21	
4-Bromophenyl phenyl ether	ND	5.2	ug/L	1.03	05/18/1999 20:21	
Hexachlorobenzene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Pentachlorophenol	ND	10	ug/L	1.03	05/18/1999 20:21	
Phenanthrene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Anthracene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Di-n-butyl phthalate	ND	5.2	ug/L	1.03	05/18/1999 20:21	
Fluoranthene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Pyrene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Butyl benzyl phthalate	ND	5.2	ug/L	1.03	05/18/1999 20:21	
3,3-Dichlorobenzidine	ND	5.2	ug/L	1.03	05/18/1999 20:21	
Benzo(a)anthracene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
bis(2-Ethylhexyl) phthalate	ND	5.2	ug/L	1.03	05/18/1999 20:21	
Chrysene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Di-n-octyl phthalate	ND	5.2	ug/L	1.03	05/18/1999 20:21	
Benzo(b)fluoranthene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Benzo(k)fluoranthene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Benzo(a)pyrene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Indeno(1,2,3-c,d)pyrene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Dibenzo(a,h)anthracene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Benzo(g,h,i)perylene	ND	2.1	ug/L	1.03	05/18/1999 20:21	
Benzoic acid	ND	10	ug/L	1.03	05/18/1999 20:21	
Surrogate(s)						

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Attn.: Jeff Hennier

Test Method: 8270A

Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: MW-4	Lab Sample ID: 1999-05-1125-004
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 11:30	Extracted: 05/18/1999 14:02
Matrix: Water	QC-Batch: 1999/05/18-02.11
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Nitrobenzene-d5	52.7	35-114	%	1.00	05/18/1999 20:21	
2-Fluorobiphenyl	50.3	43-116	%	1.00	05/18/1999 20:21	
p-Terphenyl-d14	78.2	33-141	%	1.00	05/18/1999 20:21	
Phenol-d5	19.0	10-110	%	1.00	05/18/1999 20:21	
2-Fluorophenol	29.1	25-100	%	1.00	05/18/1999 20:21	
2,4,6-Tribromophenol	67.2	10-123	%	1.00	05/18/1999 20:21	

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

To: Azure Environmental

Test Method: 8270A

Attn.: Jeff Hennier

Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: MW-5	Lab Sample ID: 1999-05-1125-005
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 14:15	Extracted: 05/18/1999 14:02
Matrix: Water	QC-Batch: 1999/05/18-02.11

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Phenol	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Bis(2-chloroethyl)ether	ND	2.0	ug/L	1.00	05/18/1999 21:05	
2-Chlorophenol	ND	2.0	ug/L	1.00	05/18/1999 21:05	
1,3-Dichlorobenzene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
1,4-Dichlorobenzene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Benzyl alcohol	ND	5.0	ug/L	1.00	05/18/1999 21:05	
1,2-Dichlorobenzene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
2-Methylphenol	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Bis(2-chloroisopropyl) ether	ND	2.0	ug/L	1.00	05/18/1999 21:05	
4-Methylphenol	ND	2.0	ug/L	1.00	05/18/1999 21:05	
N-Nitroso-di-n-propylamine	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Hexachloroethane	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Nitrobenzene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Isophorone	ND	2.0	ug/L	1.00	05/18/1999 21:05	
2-Nitrophenol	ND	2.0	ug/L	1.00	05/18/1999 21:05	
2,4-Dimethylphenol	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Bis(2-chloroethoxy) methane	ND	5.0	ug/L	1.00	05/18/1999 21:05	
2,4-Dichlorophenol	ND	2.0	ug/L	1.00	05/18/1999 21:05	
1,2,4-Trichlorobenzene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Naphthalene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
4-Chloroaniline	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Hexachlorobutadiene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
4-Chloro-3-methylphenol	ND	5.0	ug/L	1.00	05/18/1999 21:05	
2-Methylnaphthalene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Hexachlorocyclopentadiene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
2,4,6-Trichlorophenol	ND	2.0	ug/L	1.00	05/18/1999 21:05	
2,4,5-Trichlorophenol	ND	2.0	ug/L	1.00	05/18/1999 21:05	
2-Chloronaphthalene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
2-Nitroaniline	ND	10	ug/L	1.00	05/18/1999 21:05	
Dimethyl phthalate	ND	5.0	ug/L	1.00	05/18/1999 21:05	
Acenaphthylene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
3-Nitroaniline	ND	10	ug/L	1.00	05/18/1999 21:05	
Acenaphthene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
2,4-Dinitrophenol	ND	10	ug/L	1.00	05/18/1999 21:05	
4-Nitrophenol	ND	10	ug/L	1.00	05/18/1999 21:05	

To: Azure Environmental

Test Method: 8270A

Attn.: Jeff Hennier

Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: MW-5	Lab Sample ID: 1999-05-1125-005
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 14:15	Extracted: 05/18/1999 14:02
Matrix: Water	QC-Batch: 1999/05/18-02.11

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
2,4-Dinitrotoluene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
2,6-Dinitrotoluene	ND	5.0	ug/L	1.00	05/18/1999 21:05	
Diethyl phthalate	ND	5.0	ug/L	1.00	05/18/1999 21:05	
4-Chlorophenyl phenyl ether	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Fluorene	ND	5.0	ug/L	1.00	05/18/1999 21:05	
4-Nitroaniline	ND	10	ug/L	1.00	05/18/1999 21:05	
2-Methyl-4,6-dinitrophenol	ND	10	ug/L	1.00	05/18/1999 21:05	
N-Nitrosodiphenylamine	ND	2.0	ug/L	1.00	05/18/1999 21:05	
4-Bromophenyl phenyl ether	ND	5.0	ug/L	1.00	05/18/1999 21:05	
Hexachlorobenzene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Pentachlorophenol	ND	10	ug/L	1.00	05/18/1999 21:05	
Phenanthrene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Anthracene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Di-n-butyl phthalate	ND	5.0	ug/L	1.00	05/18/1999 21:05	
Fluoranthene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Pyrene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Butyl benzyl phthalate	ND	5.0	ug/L	1.00	05/18/1999 21:05	
3,3-Dichlorobenzidine	ND	5.0	ug/L	1.00	05/18/1999 21:05	
Benzo(a)anthracene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
bis(2-Ethylhexyl) phthalate	ND	5.0	ug/L	1.00	05/18/1999 21:05	
Chrysene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Di-n-octyl phthalate	ND	5.0	ug/L	1.00	05/18/1999 21:05	
Benzo(b)fluoranthene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Benzo(k)fluoranthene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Benzo(a)pyrene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Indeno(1,2,3-c,d)pyrene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Dibenzo(a,h)anthracene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Benzo(g,h,i)perylene	ND	2.0	ug/L	1.00	05/18/1999 21:05	
Benzoic acid	ND	10	ug/L	1.00	05/18/1999 21:05	
Surrogate(s)						
Nitrobenzene-d5	62.5	35-114	%	1.00	05/18/1999 21:05	
2-Fluorobiphenyl	60.5	43-116	%	1.00	05/18/1999 21:05	
p-Terphenyl-d14	106.7	33-141	%	1.00	05/18/1999 21:05	
Phenol-d5	21.9	10-110	%	1.00	05/18/1999 21:05	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Attn.: Jeff Hennier

Test Method: 8270A

Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: MW-5	Lab Sample ID: 1999-05-1125-005
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 14:15	Extracted: 05/18/1999 14:02
Matrix: Water	QC-Batch: 1999/05/18-02.11

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Surrogate(s)						
2-Fluorophenol	32.7	25-100	%	1.00	05/18/1999 21:05	
2,4,6-Tribromophenol	69.2	10-123	%	1.00	05/18/1999 21:05	

To: Azure Environmental
Attn.: Jeff Hennier

Test Method: 8270A
Prep Method: 3510/8270A

Batch QC Report
Semi-volatile Organic Compounds

Method Blank	Water	QC Batch # 1999/05/19-01.11
MB: 1999/05/19-01.11-001		Date Extracted: 05/19/1999 09:19

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Phenol	ND	2.0	ug/L	05/19/1999 15:10	
Bis(2-chloroethyl)ether	ND	2.0	ug/L	05/19/1999 15:10	
2-Chlorophenol	ND	2.0	ug/L	05/19/1999 15:10	
1,3-Dichlorobenzene	ND	2.0	ug/L	05/19/1999 15:10	
1,4-Dichlorobenzene	ND	2.0	ug/L	05/19/1999 15:10	
Benzyl alcohol	ND	5.0	ug/L	05/19/1999 15:10	
1,2-Dichlorobenzene	ND	2.0	ug/L	05/19/1999 15:10	
2-Methylphenol	ND	2.0	ug/L	05/19/1999 15:10	
Bis(2-chloroisopropyl) ether	ND	2.0	ug/L	05/19/1999 15:10	
4-Methylphenol	ND	2.0	ug/L	05/19/1999 15:10	
N-Nitroso-di-n-propylamine	ND	2.0	ug/L	05/19/1999 15:10	
Hexachloroethane	ND	2.0	ug/L	05/19/1999 15:10	
Nitrobenzene	ND	2.0	ug/L	05/19/1999 15:10	
Isophorone	ND	2.0	ug/L	05/19/1999 15:10	
2-Nitrophenol	ND	2.0	ug/L	05/19/1999 15:10	
2,4-Dimethylphenol	ND	2.0	ug/L	05/19/1999 15:10	
Bis(2-chloroethoxy) methane	ND	5.0	ug/L	05/19/1999 15:10	
2,4-Dichlorophenol	ND	2.0	ug/L	05/19/1999 15:10	
1,2,4-Trichlorobenzene	ND	2.0	ug/L	05/19/1999 15:10	
Naphthalene	ND	2.0	ug/L	05/19/1999 15:10	
4-Chloroaniline	ND	2.0	ug/L	05/19/1999 15:10	
Hexachlorobutadiene	ND	2.0	ug/L	05/19/1999 15:10	
4-Chloro-3-methylphenol	ND	5.0	ug/L	05/19/1999 15:10	
2-Methylnaphthalene	ND	2.0	ug/L	05/19/1999 15:10	
Hexachlorocyclopentadiene	ND	2.0	ug/L	05/19/1999 15:10	
2,4,6-Trichlorophenol	ND	2.0	ug/L	05/19/1999 15:10	
2,4,5-Trichlorophenol	ND	2.0	ug/L	05/19/1999 15:10	
2-Chloronaphthalene	ND	2.0	ug/L	05/19/1999 15:10	
2-Nitroaniline	ND	10	ug/L	05/19/1999 15:10	
Dimethyl phthalate	ND	5.0	ug/L	05/19/1999 15:10	
Acenaphthylene	ND	2.0	ug/L	05/19/1999 15:10	
3-Nitroaniline	ND	10	ug/L	05/19/1999 15:10	
Acenaphthene	ND	2.0	ug/L	05/19/1999 15:10	
2,4-Dinitrophenol	ND	10	ug/L	05/19/1999 15:10	

To: Azure Environmental
Attn.: Jeff Hennier

Test Method: 8270A
Prep Method: 3510/8270A

Batch QC Report
Semi-volatile Organic Compounds

Method Blank	Water	QC Batch # 1999/05/19-01.11
MB: 1999/05/19-01.11-001		Date Extracted: 05/19/1999 09:19

Compound	Result	Rep.Limit	Units	Analyzed	Flag
4-Nitrophenol	ND	10	ug/L	05/19/1999 15:10	
Dibenzofuran	ND	2.0	ug/L	05/19/1999 15:10	
2,4-Dinitrotoluene	ND	2.0	ug/L	05/19/1999 15:10	
2,6-Dinitrotoluene	ND	5.0	ug/L	05/19/1999 15:10	
Diethyl phthalate	ND	5.0	ug/L	05/19/1999 15:10	
4-Chlorophenyl phenyl ether	ND	2.0	ug/L	05/19/1999 15:10	
Fluorene	ND	5.0	ug/L	05/19/1999 15:10	
4-Nitroaniline	ND	10	ug/L	05/19/1999 15:10	
2-Methyl-4,6-dinitrophenol	ND	10	ug/L	05/19/1999 15:10	
N-Nitrosodiphenylamine	ND	2.0	ug/L	05/19/1999 15:10	
4-Bromophenyl phenyl ether	ND	5.0	ug/L	05/19/1999 15:10	
Hexachlorobenzene	ND	2.0	ug/L	05/19/1999 15:10	
Pentachlorophenol	ND	10	ug/L	05/19/1999 15:10	
Phenanthrene	ND	2.0	ug/L	05/19/1999 15:10	
Anthracene	ND	2.0	ug/L	05/19/1999 15:10	
Di-n-butyl phthalate	ND	5.0	ug/L	05/19/1999 15:10	
Fluoranthene	ND	2.0	ug/L	05/19/1999 15:10	
Pyrene	ND	2.0	ug/L	05/19/1999 15:10	
Butyl benzyl phthalate	ND	5.0	ug/L	05/19/1999 15:10	
3,3-Dichlorobenzidine	ND	5.0	ug/L	05/19/1999 15:10	
Benzo(a)anthracene	ND	2.0	ug/L	05/19/1999 15:10	
bis(2-Ethylhexyl) phthalate	ND	5.0	ug/L	05/19/1999 15:10	
Chrysene	ND	2.0	ug/L	05/19/1999 15:10	
Di-n-octyl phthalate	ND	5.0	ug/L	05/19/1999 15:10	
Benzo(b)fluoranthene	ND	2.0	ug/L	05/19/1999 15:10	
Benzo(k)fluoranthene	ND	2.0	ug/L	05/19/1999 15:10	
Benzo(a)pyrene	ND	2.0	ug/L	05/19/1999 15:10	
Indeno(1,2,3-c,d)pyrene	ND	2.0	ug/L	05/19/1999 15:10	
Dibenzo(a,h)anthracene	ND	2.0	ug/L	05/19/1999 15:10	
Benzo(g,h,i)perylene	ND	2.0	ug/L	05/19/1999 15:10	
Benzoic acid	ND	10	ug/L	05/19/1999 15:10	
Surrogate(s)					
Nitrobenzene-d5	72.5	35-114	%	05/19/1999 15:10	
2-Fluorobiphenyl	68.8	43-116	%	05/19/1999 15:10	

To: Azure Environmental

Test Method: 8270A

Attn.: Jeff Hennier

Prep Method: 3510/8270A

Batch QC Report
Semi-volatile Organic Compounds

Method Blank	Water	QC Batch # 1999/05/19-01.11
MB: 1999/05/19-01.11-001		Date Extracted: 05/19/1999 09:19

Compound	Result	Rep.Limit	Units	Analyzed	Flag
<i>Surrogate(s)</i>					
p-Terphenyl-d14	92.0	33-141	%	05/19/1999 15:10	
Phenol-d5	23.5	10-110	%	05/19/1999 15:10	
2-Fluorophenol	35.4	25-100	%	05/19/1999 15:10	
2,4,6-Tribromophenol	72.1	10-123	%	05/19/1999 15:10	

To: Azure Environmental
Attn.: Jeff Hennier

Test Method: 8270A
Prep Method: 3510/8270A

Batch QC Report
Semi-volatile Organic Compounds

Method Blank	Water	QC Batch # 1999/05/18-02.11
MB: 1999/05/18-02.11-001		Date Extracted: 05/18/1999 13:54

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Phenol	ND	2.0	ug/L	05/18/1999 16:38	
Bis(2-chloroethyl)ether	ND	2.0	ug/L	05/18/1999 16:38	
2-Chlorophenol	ND	2.0	ug/L	05/18/1999 16:38	
1,3-Dichlorobenzene	ND	2.0	ug/L	05/18/1999 16:38	
1,4-Dichlorobenzene	ND	2.0	ug/L	05/18/1999 16:38	
Benzyl alcohol	ND	5.0	ug/L	05/18/1999 16:38	
1,2-Dichlorobenzene	ND	2.0	ug/L	05/18/1999 16:38	
2-Methylphenol	ND	2.0	ug/L	05/18/1999 16:38	
Bis(2-chloroisopropyl) ether	ND	2.0	ug/L	05/18/1999 16:38	
4-Methylphenol	ND	2.0	ug/L	05/18/1999 16:38	
N-Nitroso-di-n-propylamine	ND	2.0	ug/L	05/18/1999 16:38	
Hexachloroethane	ND	2.0	ug/L	05/18/1999 16:38	
Nitrobenzene	ND	2.0	ug/L	05/18/1999 16:38	
Isophorone	ND	2.0	ug/L	05/18/1999 16:38	
2-Nitrophenol	ND	2.0	ug/L	05/18/1999 16:38	
2,4-Dimethylphenol	ND	2.0	ug/L	05/18/1999 16:38	
Bis(2-chloroethoxy) methane	ND	5.0	ug/L	05/18/1999 16:38	
2,4-Dichlorophenol	ND	2.0	ug/L	05/18/1999 16:38	
1,2,4-Trichlorobenzene	ND	2.0	ug/L	05/18/1999 16:38	
Naphthalene	ND	2.0	ug/L	05/18/1999 16:38	
4-Chloroaniline	ND	2.0	ug/L	05/18/1999 16:38	
Hexachlorobutadiene	ND	2.0	ug/L	05/18/1999 16:38	
4-Chloro-3-methylphenol	ND	5.0	ug/L	05/18/1999 16:38	
2-Methylnaphthalene	ND	2.0	ug/L	05/18/1999 16:38	
Hexachlorocyclopentadiene	ND	2.0	ug/L	05/18/1999 16:38	
2,4,6-Trichlorophenol	ND	2.0	ug/L	05/18/1999 16:38	
2,4,5-Trichlorophenol	ND	2.0	ug/L	05/18/1999 16:38	
2-Chloronaphthalene	ND	2.0	ug/L	05/18/1999 16:38	
2-Nitroaniline	ND	10	ug/L	05/18/1999 16:38	
Dimethyl phthalate	ND	5.0	ug/L	05/18/1999 16:38	
Acenaphthylene	ND	2.0	ug/L	05/18/1999 16:38	
3-Nitroaniline	ND	10	ug/L	05/18/1999 16:38	
Acenaphthene	ND	2.0	ug/L	05/18/1999 16:38	
2,4-Dinitrophenol	ND	10	ug/L	05/18/1999 16:38	

To: Azure Environmental
Attn.: Jeff Hennier

Test Method: 8270A
Prep Method: 3510/8270A

Batch QC Report
Semi-volatile Organic Compounds

Method Blank	Water	QC Batch # 1999/05/18-02.11
MB: 1999/05/18-02.11-001		Date Extracted: 05/18/1999 13:54

Compound	Result	Rep.Limit	Units	Analyzed	Flag
4-Nitrophenol	ND	10	ug/L	05/18/1999 16:38	
Dibenzofuran	ND	2.0	ug/L	05/18/1999 16:38	
2,4-Dinitrotoluene	ND	2.0	ug/L	05/18/1999 16:38	
2,6-Dinitrotoluene	ND	5.0	ug/L	05/18/1999 16:38	
Diethyl phthalate	ND	5.0	ug/L	05/18/1999 16:38	
4-Chlorophenyl phenyl ether	ND	2.0	ug/L	05/18/1999 16:38	
Fluorene	ND	5.0	ug/L	05/18/1999 16:38	
4-Nitroaniline	ND	10	ug/L	05/18/1999 16:38	
2-Methyl-4,6-dinitrophenol	ND	10	ug/L	05/18/1999 16:38	
N-Nitrosodiphenylamine	ND	2.0	ug/L	05/18/1999 16:38	
4-Bromophenyl phenyl ether	ND	5.0	ug/L	05/18/1999 16:38	
Hexachlorobenzene	ND	2.0	ug/L	05/18/1999 16:38	
Pentachlorophenol	ND	10	ug/L	05/18/1999 16:38	
Phenanthrene	ND	2.0	ug/L	05/18/1999 16:38	
Anthracene	ND	2.0	ug/L	05/18/1999 16:38	
Di-n-butyl phthalate	ND	5.0	ug/L	05/18/1999 16:38	
Fluoranthene	ND	2.0	ug/L	05/18/1999 16:38	
Pyrene	ND	2.0	ug/L	05/18/1999 16:38	
Butyl benzyl phthalate	ND	5.0	ug/L	05/18/1999 16:38	
3,3-Dichlorobenzidine	ND	5.0	ug/L	05/18/1999 16:38	
Benzo(a)anthracene	ND	2.0	ug/L	05/18/1999 16:38	
bis(2-Ethylhexyl) phthalate	ND	5.0	ug/L	05/18/1999 16:38	
Chrysene	ND	2.0	ug/L	05/18/1999 16:38	
Di-n-octyl phthalate	ND	5.0	ug/L	05/18/1999 16:38	
Benzo(b)fluoranthene	ND	2.0	ug/L	05/18/1999 16:38	
Benzo(k)fluoranthene	ND	2.0	ug/L	05/18/1999 16:38	
Benzo(a)pyrene	ND	2.0	ug/L	05/18/1999 16:38	
Indeno(1,2,3-c,d)pyrene	ND	2.0	ug/L	05/18/1999 16:38	
Dibenzo(a,h)anthracene	ND	2.0	ug/L	05/18/1999 16:38	
Benzo(g,h,i)perylene	ND	2.0	ug/L	05/18/1999 16:38	
Benzoic acid	ND	10	ug/L	05/18/1999 16:38	
Surrogate(s)					
Nitrobenzene-d5	63.7	35-114	%	05/18/1999 16:38	
2-Fluorobiphenyl	60.0	43-116	%	05/18/1999 16:38	

To: **Azure Environmental**
Attn.: Jeff Hennier

Test Method: 8270A
Prep Method: 3510/8270A

Batch QC Report
Semi-volatile Organic Compounds

Method Blank	Water	QC Batch # 1999/05/18-02.11
MB: 1999/05/18-02.11-001		Date Extracted: 05/18/1999 13:54

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Surrogate(s)					
p-Terphenyl-d14	82.3	33-141	%	05/18/1999 16:38	
Phenol-d5	21.8	10-110	%	05/18/1999 16:38	
2-Fluorophenol	32.8	25-100	%	05/18/1999 16:38	
2,4,6-Tribromophenol	61.8	10-123	%	05/18/1999 16:38	

To: Azure Environmental

Test Method: 8270A

Attn: Jeff Hennier

Prep Method: 3510/8270A

Batch QC Report

Semi-volatile Organic Compounds

Laboratory Control Spike (LCS/LCSD)	Water	QC Batch # 1999/05/19-01.11
LCS: 1999/05/19-01.11-002	Extracted: 05/19/1999 09:19	Analyzed: 05/19/1999 15:55
LCSD: 1999/05/19-01.11-003	Extracted: 05/19/1999 09:19	Analyzed: 05/19/1999 16:40

Compound	Conc. [ug/L]		Added Amount	Recovery %		RPD	Control Limits %		Flags	
	LCS	LCSD		LCS	LCSD		Recovery	RPD	LCS	LCSD
Phenol	18.13	14.62	60	30.2	24.4	21.2	12-89	35		
2-Chlorophenol	46.99	38.23	60	78.3	63.7	20.6	23-134	25		
1,4-Dichlorobenzene	20.52	17.39	30	68.4	58.0	16.5	36-97	30		
N-Nitroso-di-n-propylamin	23.99	20.38	30	80.0	67.9	16.4	10-130	34		
1,2,4-Trichlorobenzene	20.48	17.49	30	68.3	58.3	15.8	44-142	35		
4-Chloro-3-methylphenol	55.46	49.71	60	92.4	82.9	10.8	22-147	31		
Acenaphthene	23.76	20.59	30	79.2	68.6	14.3	56-118	30		
4-Nitrophenol	14.76	14.82	60	24.6	24.7	0.4	1-51	35		
2,4-Dinitrotoluene	25.12	22.84	30	83.7	76.1	9.5	39-139	35		
Pentachlorophenol	45.75	42.03	60	76.3	70.1	8.5	45-125	35		
Pyrene	27.45	26.80	30	91.5	89.3	2.4	52-115	35		
Surrogate(s)										
Nitrobenzene-d5	18.40	15.36	25	73.6	61.4		35-114			
2-Fluorobiphenyl	18.30	15.83	25	73.2	63.3		43-116			
p-Terphenyl-d14	22.37	22.68	25	89.5	90.7		33-141			
Phenol-d5	12.78	10.41	50	25.6	20.8		10-110			
2-Fluorophenol	19.46	15.58	50	38.9	31.2		25-100			
2,4,6-Tribromophenol	36.41	34.54	50	72.8	69.1		10-123			

To: Azure Environmental

Test Method: 8270A

Attn: Jeff Hennier

Prep Method: 3510/8270A

Batch QC Report

Semi-volatile Organic Compounds

Laboratory Control Spike (LCS/LCSD)	Water	QC Batch # 1999/05/18-02.11
LCS: 1999/05/18-02.11-002	Extracted: 05/18/1999 13:54	Analyzed: 05/18/1999 17:24
LCSD: 1999/05/18-02.11-003	Extracted: 05/18/1999 13:54	Analyzed: 05/18/1999 18:08

Compound	Conc. [ug/L]		Added Amount	Recovery %		RPD	Control Limits %		Flags	
	LCS	LCSD		LCS	LCSD		Recovery	RPD	LCS	LCSD
Phenol	12.09	13.07	60	20.2	21.8	7.6	12-89	35		
2-Chlorophenol	28.96	31.24	60	48.3	52.1	7.6	23-134	25		
1,4-Dichlorobenzene	13.15	14.63	30	43.8	48.8	10.8	36-97	30		
N-Nitroso-di-n-propylamin	17.73	19.66	30	59.1	65.5	10.3	10-130	34		
1,2,4-Trichlorobenzene	13.75	15.16	30	45.8	50.5	9.8	44-142	35		
4-Chloro-3-methylphenol	42.78	47.47	60	71.3	79.1	10.4	22-147	31		
Acenaphthene	16.88	18.82	30	56.3	62.7	10.8	56-118	30		
4-Nitrophenol	13.73	12.81	60	22.9	21.4	6.8	1-51	35		
2,4-Dinitrotoluene	19.56	21.15	30	65.2	70.5	7.8	39-139	35		
Pentachlorophenol	36.50	35.97	60	60.8	60.0	1.3	45-125	35		
Pyrene	22.48	23.27	30	74.9	77.6	3.5	52-115	35		
Surrogate(s)										
Nitrobenzene-d5	13.65	14.73	25	54.6	58.9		35-114			
2-Fluorobiphenyl	12.46	13.73	25	49.8	54.9		43-116			
p-Terphenyl-d14	19.74	20.48	25	79.0	81.9		33-141			
Phenol-d5	9.33	9.90	50	18.7	19.8		10-110			
2-Fluorophenol	13.75	14.99	50	27.5	30.0		25-100			
2,4,6-Tribromophenol	29.09	31.09	50	58.2	62.2		10-123			

To: Azure Environmental

Attn: Jeff Hennier

Test Method: 8270A

Prep Method: 3510/8270A

Legend & Notes

Semi-volatile Organic Compounds

Analysis Flags

rl

Reporting limits raised due to insufficient sample volume.

Analyte Flags

sl

Surrogate recoveries were lower than QC limit due to matrix interference, confirmed by reanalysis.

Halogenated Volatile Organic Compounds

Azure Environmental

✉ 828 Mission Avenue
San Rafael, CA 94941

Attn: Jeff Hennier

Phone: (415) 485-9740 Fax: (415) 485-6062

Project #:

Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
MW-1	Water	05/14/1999	1
MW-3	Water	05/14/1999 16:00	3
MW-4	Water	05/14/1999 11:30	4
MW-5	Water	05/14/1999 14:15	5

Environmental Services (SDB)

To: Azure Environmental

Test Method: 8010

Attn.: Jeff Hennier

Prep Method: 5030

Halogenated Volatile Organic Compounds

Sample ID: MW-1	Lab Sample ID: 1999-05-1125-001
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999	Extracted: 05/20/1999 23:59
Matrix: Water	QC-Batch: 1999/05/20-01.26

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Dichlorodifluoromethane	ND	1.0	ug/L	1.00	05/20/1999 23:59	
Vinyl chloride	ND	0.50	ug/L	1.00	05/20/1999 23:59	
Chloroethane	ND	0.50	ug/L	1.00	05/20/1999 23:59	
Trichlorofluoromethane	ND	0.50	ug/L	1.00	05/20/1999 23:59	
1,1-Dichloroethene	ND	0.50	ug/L	1.00	05/20/1999 23:59	
Methylene chloride	ND	5.0	ug/L	1.00	05/20/1999 23:59	
trans-1,2-Dichloroethene	ND	0.50	ug/L	1.00	05/20/1999 23:59	
cis-1,2-Dichloroethene	ND	0.50	ug/L	1.00	05/20/1999 23:59	
1,1-Dichloroethane	ND	0.50	ug/L	1.00	05/20/1999 23:59	
Chloroform	ND	3.0	ug/L	1.00	05/20/1999 23:59	
1,1,1-Trichloroethane	ND	0.50	ug/L	1.00	05/20/1999 23:59	
Carbon tetrachloride	ND	0.50	ug/L	1.00	05/20/1999 23:59	
1,2-Dichloroethane	ND	0.50	ug/L	1.00	05/20/1999 23:59	
Trichloroethene	ND	0.50	ug/L	1.00	05/20/1999 23:59	
1,2-Dichloropropane	ND	0.50	ug/L	1.00	05/20/1999 23:59	
Bromodichloromethane	ND	0.50	ug/L	1.00	05/20/1999 23:59	
2-Chloroethylvinyl ether	ND	0.50	ug/L	1.00	05/20/1999 23:59	
trans-1,3-Dichloropropene	ND	0.50	ug/L	1.00	05/20/1999 23:59	
cis-1,3-Dichloropropene	ND	0.50	ug/L	1.00	05/20/1999 23:59	
1,1,2-Trichloroethane	ND	0.50	ug/L	1.00	05/20/1999 23:59	
Tetrachloroethene	ND	0.50	ug/L	1.00	05/20/1999 23:59	
Dibromochloromethane	ND	0.50	ug/L	1.00	05/20/1999 23:59	
Chlorobenzene	ND	0.50	ug/L	1.00	05/20/1999 23:59	
Bromoform	ND	2.0	ug/L	1.00	05/20/1999 23:59	
1,1,2,2-Tetrachloroethane	ND	0.50	ug/L	1.00	05/20/1999 23:59	
1,3-Dichlorobenzene	ND	0.50	ug/L	1.00	05/20/1999 23:59	
1,4-Dichlorobenzene	ND	0.50	ug/L	1.00	05/20/1999 23:59	
1,2-Dichlorobenzene	ND	0.50	ug/L	1.00	05/20/1999 23:59	
Trichlorotrifluoroethane	ND	2.0	ug/L	1.00	05/20/1999 23:59	
Chloromethane	ND	1.0	ug/L	1.00	05/20/1999 23:59	
Bromomethane	ND	1.0	ug/L	1.00	05/20/1999 23:59	
Surrogate(s)						
1-Chloro-2-fluorobenzene	82.7	50-138	%	1.00	05/20/1999 23:59	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental
Attn.: Jeff Hennier

Test Method: 8010
Prep Method: 5030

Halogenated Volatile Organic Compounds

Sample ID: MW-3	Lab Sample ID: 1999-05-1125-003
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 16:00	Extracted: 05/21/1999 00:45
Matrix: Water	QC-Batch: 1999/05/20-01.26

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Dichlorodifluoromethane	ND	1.0	ug/L	1.00	05/21/1999 00:45	
Vinyl chloride	ND	0.50	ug/L	1.00	05/21/1999 00:45	
Chloroethane	ND	0.50	ug/L	1.00	05/21/1999 00:45	
Trichlorofluoromethane	ND	0.50	ug/L	1.00	05/21/1999 00:45	
1,1-Dichloroethene	ND	0.50	ug/L	1.00	05/21/1999 00:45	
Methylene chloride	ND	5.0	ug/L	1.00	05/21/1999 00:45	
trans-1,2-Dichloroethene	ND	0.50	ug/L	1.00	05/21/1999 00:45	
cis-1,2-Dichloroethene	ND	0.50	ug/L	1.00	05/21/1999 00:45	
1,1-Dichloroethane	ND	0.50	ug/L	1.00	05/21/1999 00:45	
Chloroform	ND	3.0	ug/L	1.00	05/21/1999 00:45	
1,1,1-Trichloroethane	ND	0.50	ug/L	1.00	05/21/1999 00:45	
Carbon tetrachloride	ND	0.50	ug/L	1.00	05/21/1999 00:45	
1,2-Dichloroethane	ND	0.50	ug/L	1.00	05/21/1999 00:45	
Trichloroethene	ND	0.50	ug/L	1.00	05/21/1999 00:45	
1,2-Dichloropropane	ND	0.50	ug/L	1.00	05/21/1999 00:45	
Bromodichloromethane	ND	0.50	ug/L	1.00	05/21/1999 00:45	
2-Chloroethylvinyl ether	ND	0.50	ug/L	1.00	05/21/1999 00:45	
trans-1,3-Dichloropropene	ND	0.50	ug/L	1.00	05/21/1999 00:45	
cis-1,3-Dichloropropene	ND	0.50	ug/L	1.00	05/21/1999 00:45	
1,1,2-Trichloroethane	ND	0.50	ug/L	1.00	05/21/1999 00:45	
Tetrachloroethene	ND	0.50	ug/L	1.00	05/21/1999 00:45	
Dibromochloromethane	ND	0.50	ug/L	1.00	05/21/1999 00:45	
Chlorobenzene	ND	0.50	ug/L	1.00	05/21/1999 00:45	
Bromoform	ND	2.0	ug/L	1.00	05/21/1999 00:45	
1,1,2,2-Tetrachloroethane	ND	0.50	ug/L	1.00	05/21/1999 00:45	
1,3-Dichlorobenzene	ND	0.50	ug/L	1.00	05/21/1999 00:45	
1,4-Dichlorobenzene	ND	0.50	ug/L	1.00	05/21/1999 00:45	
1,2-Dichlorobenzene	ND	0.50	ug/L	1.00	05/21/1999 00:45	
Trichlorotrifluoroethane	ND	2.0	ug/L	1.00	05/21/1999 00:45	
Chloromethane	ND	1.0	ug/L	1.00	05/21/1999 00:45	
Bromomethane	ND	1.0	ug/L	1.00	05/21/1999 00:45	
Surrogate(s)						
1-Chloro-2-fluorobenzene	95.4	50-138	%	1.00	05/21/1999 00:45	

To: Azure Environmental
Attn.: Jeff Hennier

Test Method: 8010
Prep Method: 5030

Halogenated Volatile Organic Compounds

Sample ID: MW-4	Lab Sample ID: 1999-05-1125-004
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 11:30	Extracted: 05/21/1999 01:31
Matrix: Water	QC-Batch: 1999/05/20-01.26

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Dichlorodifluoromethane	ND	1.0	ug/L	1.00	05/21/1999 01:31	
Vinyl chloride	ND	0.50	ug/L	1.00	05/21/1999 01:31	
Chloroethane	ND	0.50	ug/L	1.00	05/21/1999 01:31	
Trichlorofluoromethane	ND	0.50	ug/L	1.00	05/21/1999 01:31	
1,1-Dichloroethene	ND	0.50	ug/L	1.00	05/21/1999 01:31	
Methylene chloride	ND	5.0	ug/L	1.00	05/21/1999 01:31	
trans-1,2-Dichloroethene	ND	0.50	ug/L	1.00	05/21/1999 01:31	
cis-1,2-Dichloroethene	ND	0.50	ug/L	1.00	05/21/1999 01:31	
1,1-Dichloroethane	ND	0.50	ug/L	1.00	05/21/1999 01:31	
Chloroform	ND	3.0	ug/L	1.00	05/21/1999 01:31	
Carbon tetrachloride	ND	0.50	ug/L	1.00	05/21/1999 01:31	
1,2-Dichloroethane	ND	0.50	ug/L	1.00	05/21/1999 01:31	
Trichloroethene	ND	0.50	ug/L	1.00	05/21/1999 01:31	
1,2-Dichloropropane	ND	0.50	ug/L	1.00	05/21/1999 01:31	
Bromodichloromethane	ND	0.50	ug/L	1.00	05/21/1999 01:31	
2-Chloroethylvinyl ether	ND	0.50	ug/L	1.00	05/21/1999 01:31	
trans-1,3-Dichloropropene	ND	0.50	ug/L	1.00	05/21/1999 01:31	
cis-1,3-Dichloropropene	ND	0.50	ug/L	1.00	05/21/1999 01:31	
1,1,2-Trichloroethane	ND	0.50	ug/L	1.00	05/21/1999 01:31	
Tetrachloroethene	ND	0.50	ug/L	1.00	05/21/1999 01:31	
Dibromochloromethane	ND	0.50	ug/L	1.00	05/21/1999 01:31	
Chlorobenzene	ND	0.50	ug/L	1.00	05/21/1999 01:31	
Bromoform	ND	2.0	ug/L	1.00	05/21/1999 01:31	
1,1,2,2-Tetrachloroethane	ND	0.50	ug/L	1.00	05/21/1999 01:31	
1,3-Dichlorobenzene	ND	0.50	ug/L	1.00	05/21/1999 01:31	
1,4-Dichlorobenzene	ND	0.50	ug/L	1.00	05/21/1999 01:31	
1,2-Dichlorobenzene	ND	0.50	ug/L	1.00	05/21/1999 01:31	
Trichlorotrifluoroethane	ND	2.0	ug/L	1.00	05/21/1999 01:31	
Chloromethane	ND	1.0	ug/L	1.00	05/21/1999 01:31	
Bromomethane	ND	1.0	ug/L	1.00	05/21/1999 01:31	
Surrogate(s)						
1-Chloro-2-fluorobenzene	85.4	50-138	%	1.00	05/21/1999 01:31	

To: Azure Environmental

Test Method: 8010

Attn.: Jeff Hennier

Prep Method: 5030

Halogenated Volatile Organic Compounds

Sample ID: MW-5	Lab Sample ID: 1999-05-1125-005
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 14:15	Extracted: 05/20/1999 23:13
Matrix: Water	QC-Batch: 1999/05/20-01.26

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Dichlorodifluoromethane	ND	1.0	ug/L	1.00	05/20/1999 23:13	
Vinyl chloride	ND	0.50	ug/L	1.00	05/20/1999 23:13	
Chloroethane	ND	0.50	ug/L	1.00	05/20/1999 23:13	
Trichlorofluoromethane	ND	0.50	ug/L	1.00	05/20/1999 23:13	
1,1-Dichloroethene	ND	0.50	ug/L	1.00	05/20/1999 23:13	
Methylene chloride	ND	5.0	ug/L	1.00	05/20/1999 23:13	
trans-1,2-Dichloroethene	ND	0.50	ug/L	1.00	05/20/1999 23:13	
cis-1,2-Dichloroethene	ND	0.50	ug/L	1.00	05/20/1999 23:13	
1,1-Dichloroethane	ND	0.50	ug/L	1.00	05/20/1999 23:13	
Chloroform	ND	3.0	ug/L	1.00	05/20/1999 23:13	
1,1,1-Trichloroethane	ND	0.50	ug/L	1.00	05/20/1999 23:13	
Carbon tetrachloride	ND	0.50	ug/L	1.00	05/20/1999 23:13	
1,2-Dichloroethane	ND	0.50	ug/L	1.00	05/20/1999 23:13	
Trichloroethene	ND	0.50	ug/L	1.00	05/20/1999 23:13	
1,2-Dichloropropane	ND	0.50	ug/L	1.00	05/20/1999 23:13	
Bromodichloromethane	ND	0.50	ug/L	1.00	05/20/1999 23:13	
2-Chloroethylvinyl ether	ND	0.50	ug/L	1.00	05/20/1999 23:13	
trans-1,3-Dichloropropene	ND	0.50	ug/L	1.00	05/20/1999 23:13	
cis-1,3-Dichloropropene	ND	0.50	ug/L	1.00	05/20/1999 23:13	
1,1,2-Trichloroethane	ND	0.50	ug/L	1.00	05/20/1999 23:13	
Tetrachloroethene	ND	0.50	ug/L	1.00	05/20/1999 23:13	
Dibromochloromethane	ND	0.50	ug/L	1.00	05/20/1999 23:13	
Chlorobenzene	ND	0.50	ug/L	1.00	05/20/1999 23:13	
Bromoform	ND	2.0	ug/L	1.00	05/20/1999 23:13	
1,1,2,2-Tetrachloroethane	ND	0.50	ug/L	1.00	05/20/1999 23:13	
1,3-Dichlorobenzene	ND	0.50	ug/L	1.00	05/20/1999 23:13	
1,4-Dichlorobenzene	ND	0.50	ug/L	1.00	05/20/1999 23:13	
1,2-Dichlorobenzene	ND	0.50	ug/L	1.00	05/20/1999 23:13	
Trichlorotrifluoroethane	ND	2.0	ug/L	1.00	05/20/1999 23:13	
Chloromethane	ND	1.0	ug/L	1.00	05/20/1999 23:13	
Bromomethane	ND	1.0	ug/L	1.00	05/20/1999 23:13	
Surrogate(s)						
1-Chloro-2-fluorobenzene	83.5	50-138	%	1.00	05/20/1999 23:13	

To: Azure Environmental
Attn.: Jeff Hennier

Test Method: 8010
Prep Method: 5030

Batch QC Report
Halogenated Volatile Organic Compounds

Method Blank	Water	QC Batch # 1999/05/20-01.26
MB: 1999/05/20-01.26-001		Date Extracted: 05/20/1999 06:57

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Dichlorodifluoromethane	ND	1.0	ug/L	05/20/1999 06:57	
Vinyl chloride	ND	0.5	ug/L	05/20/1999 06:57	
Chloroethane	ND	0.5	ug/L	05/20/1999 06:57	
Trichlorofluoromethane	ND	0.5	ug/L	05/20/1999 06:57	
1,1-Dichloroethene	ND	0.5	ug/L	05/20/1999 06:57	
Methylene chloride	ND	5.0	ug/L	05/20/1999 06:57	
trans-1,2-Dichloroethene	ND	0.5	ug/L	05/20/1999 06:57	
cis-1,2-Dichloroethene	ND	0.5	ug/L	05/20/1999 06:57	
1,1-Dichloroethane	ND	0.5	ug/L	05/20/1999 06:57	
Chloroform	ND	3.0	ug/L	05/20/1999 06:57	
1,1,1-Trichloroethane	ND	0.5	ug/L	05/20/1999 06:57	
Carbon tetrachloride	ND	0.5	ug/L	05/20/1999 06:57	
1,2-Dichloroethane	ND	0.5	ug/L	05/20/1999 06:57	
Trichloroethene	ND	0.5	ug/L	05/20/1999 06:57	
1,2-Dichloropropane	ND	0.5	ug/L	05/20/1999 06:57	
Bromodichloromethane	ND	0.5	ug/L	05/20/1999 06:57	
2-Chloroethylvinyl ether	ND	0.5	ug/L	05/20/1999 06:57	
trans-1,3-Dichloropropene	ND	0.5	ug/L	05/20/1999 06:57	
cis-1,3-Dichloropropene	ND	0.5	ug/L	05/20/1999 06:57	
1,1,2-Trichloroethane	ND	0.5	ug/L	05/20/1999 06:57	
Tetrachloroethene	ND	0.5	ug/L	05/20/1999 06:57	
Dibromochloromethane	ND	0.5	ug/L	05/20/1999 06:57	
Chlorobenzene	ND	0.5	ug/L	05/20/1999 06:57	
Bromoform	ND	2.0	ug/L	05/20/1999 06:57	
1,1,2,2-Tetrachloroethane	ND	0.5	ug/L	05/20/1999 06:57	
1,3-Dichlorobenzene	ND	0.5	ug/L	05/20/1999 06:57	
1,4-Dichlorobenzene	ND	0.5	ug/L	05/20/1999 06:57	
1,2-Dichlorobenzene	ND	0.5	ug/L	05/20/1999 06:57	
Trichlorotrifluoroethane	ND	2.0	ug/L	05/20/1999 06:57	
Chloromethane	ND	1.0	ug/L	05/20/1999 06:57	
Bromomethane	ND	1.0	ug/L	05/20/1999 06:57	
Surrogate(s)					
1-Chloro-2-fluorobenzene	115.1	50-138	%	05/20/1999 06:57	

To: **Azure Environmental**

Test Method: 8010

Attn: Jeff Hennier

Prep Method: 5030

Batch QC Report

Halogenated Volatile Organic Compounds

Laboratory Control Spike (LCS/LCSD)		Water	QC Batch # 1999/05/20-01.26	
LCS:	1999/05/20-01.26-002	Extracted: 05/20/1999 07:43	Analyzed:	05/20/1999 07:43
LCSD:	1999/05/20-01.26-003	Extracted: 05/20/1999 08:29	Analyzed:	05/20/1999 08:29

Compound	Conc. [ug/L]		Added Amount	Recovery %		RPD	Control Limits %		Flags	
	LCS	LCSD		LCS	LCSD		Recovery	RPD	LCS	LCSD
1,1-Dichloroethene	47.9758	42.2908	50	96.0	84.6	12.6	50-140	20		
Trichloroethene	54.8530	48.9275	50	109.7	97.9	11.4	50-150	20		
Chlorobenzene	49.0894	43.3610	50	98.2	86.7	12.4	50-150	20		
Surrogate(s)										
1-Chloro-2-fluorobenzene	66.0685	57.1544	50	132.1	114.3		50-138			

Total Extractable Petroleum Hydrocarbons (TEPH)

Azure Environmental	✉ 828 Mission Avenue San Rafael, CA 94941
Attn: Jeff Hennier	Phone: (415) 485-9740 Fax: (415) 485-6062
Project #:	Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
MW-1	Water	05/14/1999	1
MW-2	Product	05/14/1999 10:30	2
MW-3	Water	05/14/1999 16:00	3
MW-4	Water	05/14/1999 11:30	4
MW-5	Water	05/14/1999 14:15	5

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8015m

Attn.: Jeff Hennier

Prep Method: 3510/8015M

Total Extractable Petroleum Hydrocarbons (TEPH)

Sample ID: MW-1	Lab Sample ID: 1999-05-1125-001
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999	Extracted: 05/19/1999 20:41
Matrix: Water	QC-Batch: 1999/05/19-07.10
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Diesel	200	50	ug/L	1.01	05/20/1999 15:11	ndp
Motor Oil	ND	500	ug/L	1.01	05/20/1999 15:11	
Surrogate(s) o-Terphenyl	88.5	60-130	%	1.00	05/20/1999 15:11	

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8015m

Attn.: Jeff Hennier

Prep Method: 3510/8015M

Total Extractable Petroleum Hydrocarbons (TEPH)

Sample ID: MW-2	Lab Sample ID: 1999-05-1125-002
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 10:30	Extracted: 05/20/1999 12:51
Matrix: Product	QC-Batch: 1999/05/20-04.10
Sample/Analysis Flag: o (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Diesel	550000	350000	ug/L	6909.26	05/20/1999 17:34	ndp
Motor Oil	ND	3500000	ug/L	6909.26	05/20/1999 17:34	
Surrogate(s) o-Terphenyl	0.0	60-130	%	1.00	05/20/1999 17:34	do

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: **Azure Environmental**

Test Method: 8015m

Attn.: Jeff Hennier

Prep Method: 3510/8015M

Total Extractable Petroleum Hydrocarbons (TEPH)

Sample ID: MW-3	Lab Sample ID: 1999-05-1125-003
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 16:00	Extracted: 05/20/1999 11:34
Matrix: Water	QC-Batch: 1999/05/20-03.10

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Diesel	150	50	ug/L	1.00	05/21/1999 06:06	ndp
Motor Oil	ND	500	ug/L	1.00	05/21/1999 06:06	
Surrogate(s) o-Terphenyl	105.3	60-130	%	1.00	05/21/1999 06:06	

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8015m

Attn.: Jeff Hennier

Prep Method: 3510/8015M

Total Extractable Petroleum Hydrocarbons (TEPH)

Sample ID: MW-4	Lab Sample ID: 1999-05-1125-004
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 11:30	Extracted: 05/19/1999 20:41
Matrix: Water	QC-Batch: 1999/05/19-07.10
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Diesel	ND	51	ug/L	1.02	05/20/1999 15:47	
Motor Oil	ND	510	ug/L	1.02	05/20/1999 15:47	
Surrogate(s) o-Terphenyl	85.1	60-130	%	1.00	05/20/1999 15:47	

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8015m

Attn.: Jeff Hennier

Prep Method: 3510/8015M

Total Extractable Petroleum Hydrocarbons (TEPH)

Sample ID: MW-5	Lab Sample ID: 1999-05-1125-005
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 14:15	Extracted: 05/19/1999 20:41
Matrix: Water	QC-Batch: 1999/05/19-07.10
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Diesel	ND	50	ug/L	1.01	05/20/1999 16:23	
Motor Oil	ND	500	ug/L	1.01	05/20/1999 16:23	
Surrogate(s) o-Terphenyl	87.3	60-130	%	1.00	05/20/1999 16:23	

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

To: Azure Environmental
Attn.: Jeff Hennier

Test Method: 8015m
Prep Method: 3510/8015M

Batch QC Report
Total Extractable Petroleum Hydrocarbons (TEPH)

Method Blank	Water	QC Batch # 1999/05/20-03.10
MB: 1999/05/20-03.10-001		Date Extracted: 05/20/1999 11:34

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Diesel	ND	50	ug/L	05/20/1999 13:34	
Motor Oil	ND	500	ug/L	05/20/1999 13:34	
Surrogate(s) o-Terphenyl	90.6	60-130	%	05/20/1999 13:34	

To: Azure Environmental

Test Method: 8015m

Attn.: Jeff Hennier

Prep Method: 3510/8015M

Batch QC Report

Total Extractable Petroleum Hydrocarbons (TEPH)

Method Blank	Oil	QC Batch # 1999/05/20-04.10
MB: 1999/05/20-04.10-001		Date Extracted: 05/20/1999 12:51

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Diesel	ND	10	mg/Kg	05/20/1999 15:44	
Motor Oil	ND	500	mg/Kg	05/20/1999 15:44	
Surrogate(s) o-Terphenyl	103.3	60-130	%	05/20/1999 15:44	

To: Azure Environmental

Test Method: 8015m

Attn.: Jeff Hennier

Prep Method: 3510/8015M

Batch QC Report

Total Extractable Petroleum Hydrocarbons (TEPH)

Method Blank	Water	QC Batch # 1999/05/19-07.10
MB: 1999/05/19-07.10-001		Date Extracted: 05/19/1999 20:41

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Diesel	ND	50	ug/L	05/20/1999 14:44	
Motor Oil	ND	500	ug/L	05/20/1999 14:44	
Surrogate(s)					
o-Terphenyl	71.9	60-130	%	05/20/1999 14:44	

To: Azure Environmental

Test Method: 8015m

Attn: Jeff Hennier

Prep Method: 3510/8015M

Batch QC Report

Total Extractable Petroleum Hydrocarbons (TEPH)

Laboratory Control Spike (LCS/LCSD)	Water	QC Batch # 1999/05/20-03.10
LCS: 1999/05/20-03.10-002	Extracted: 05/20/1999 11:34	Analyzed: 05/20/1999 12:12
LCSD: 1999/05/20-03.10-003	Extracted: 05/20/1999 11:34	Analyzed: 05/20/1999 12:48

Compound	Conc. [ug/L]		Added Amount	Recovery %		RPD	Control Limits %		Flags	
	LCS	LCSD		LCS	LCSD		Recovery	RPD	LCS	LCSD
Diesel	389.4122	386.1302	500	77.9	77.2	0.9	60-130	25		
Surrogate(s) o-Terphenyl	24.9592	24.8606	20	124.8	124.3		60-130			

To: Azure Environmental

Test Method: 8015m

Attn: Jeff Hennier

Prep Method: 3510/8015M

Batch QC Report

Total Extractable Petroleum Hydrocarbons (TEPH)

Laboratory Control Spike (LCS/LCSD)	Oil	QC Batch # 1999/05/20-04.10
LCS: 1999/05/20-04.10-002	Extracted: 05/20/1999 12:51	Analyzed: 05/20/1999 21:09
LCSD: 1999/05/20-04.10-003	Extracted: 05/20/1999 12:51	Analyzed: 05/20/1999 21:45

Compound	Conc. [mg/Kg]		Added Amount	Recovery %		RPD	Control Limits %		Flags	
	LCS	LCSD		LCS	LCSD		Recovery	RPD	LCS	LCSD
Diesel	411.4118	406.5596	500	82.3	81.3	1.2	60-130	25		
Surrogate(s)										
o-Terphenyl	19.6313	19.3748	20	98.2	96.9		60-130			

To: **Azure Environmental**

Test Method: 8015m

Attn: Jeff Hennier

Prep Method: 3510/8015M

Batch QC Report

Total Extractable Petroleum Hydrocarbons (TEPH)

Laboratory Control Spike (LCS/LCSD)		Water		QC Batch # 1999/05/19-07.10	
LCS:	1999/05/19-07.10-002	Extracted:	05/19/1999 20:41	Analyzed:	05/20/1999 23:33
LCSD:	1999/05/19-07.10-003	Extracted:	05/19/1999 20:41	Analyzed:	05/21/1999 00:09

Compound	Conc. [ug/L]		Added Amount	Recovery %		RPD	Control Limits %		Flags	
	LCS	LCSD		LCS	LCSD		Recovery	RPD	LCS	LCSD
Diesel	417.3135	396.9397	500	83.5	79.4	5.0	60-130	25		
Surrogate(s) o-Terphenyl	23.6208	25.5494	20	118.1	127.7		60-130			

To: Azure Environmental

Test Method: 8015m

Attn.: Jeff Hennier

Prep Method: 3510/8015M

Batch QC Report

Total Extractable Petroleum Hydrocarbons (TEPH)

Duplicate Sample	Product	QC Batch # 1999/05/20-04.10
Sample ID: MW-2		Lab Sample ID: 1999-05-1125-002
DUP: 1999/05/20-04.10-004	Extracted: 05/20/1999 12:51	Analyze 05/20/1999 18:10 Dilution: 50.0

Compound	DUP Result	Sample Result	RL	Unit	RPD	RPD Limit	Flags
Diesel	518798.65	550000	50	ug/L	5.8	20	ndp
Motor Oil	ND	ND	500	ug/L	0.0	20	
Surrogate(s) o-Terphenyl	0.0		60-130	%			do

To: Azure Environmental

Attn: Jeff Hennier

Test Method: 8015m

Prep Method: 3510/8015M

Legend & Notes

Total Extractable Petroleum Hydrocarbons (TEPH)

Analysis Flags

o

Reporting limits were raised due to high level of analyte present in the sample.

ri

Reporting limits raised due to insufficient sample volume.

Analyte Flags

ndp

Hydrocarbon reported does not match the pattern of our Diesel standard

Organochlorine Pesticides and PCBs

Azure Environmental	✉ 828 Mission Avenue San Rafael, CA 94941
Attn: Jeff Hennier	Phone: (415) 485-9740 Fax: (415) 485-6062
Project #:	Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
MW-1	Water	05/14/1999	1
MW-3	Water	05/14/1999 16:00	3
MW-4	Water	05/14/1999 11:30	4
MW-5	Water	05/14/1999 14:15	5

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental
Attn.: Jeff Hennier

Test Method: 8080A
Prep Method: 3510/8080

Organochlorine Pesticides and PCBs

Sample ID: MW-1	Lab Sample ID: 1999-05-1125-001
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999	Extracted: 05/19/1999 16:41
Matrix: Water	QC-Batch: 1999/05/19-02.13

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Aldrin	ND	0.080	ug/L	1.00	05/20/1999 14:41	
Dieldrin	ND	0.060	ug/L	1.00	05/20/1999 14:41	
Endrin aldehyde	ND	0.20	ug/L	1.00	05/20/1999 14:41	
Endrin	ND	0.40	ug/L	1.00	05/20/1999 14:41	
Heptachlor	ND	0.060	ug/L	1.00	05/20/1999 14:41	
Heptachlor epoxide	ND	0.10	ug/L	1.00	05/20/1999 14:41	
4,4'-DDT	ND	0.20	ug/L	1.00	05/20/1999 14:41	
4,4'-DDE	ND	0.080	ug/L	1.00	05/20/1999 14:41	
4,4'-DDD	ND	0.10	ug/L	1.00	05/20/1999 14:41	
Endosulfan I	ND	0.10	ug/L	1.00	05/20/1999 14:41	
Endosulfan II	ND	0.10	ug/L	1.00	05/20/1999 14:41	
alpha-BHC	ND	0.060	ug/L	1.00	05/20/1999 14:41	
beta-BHC	ND	0.060	ug/L	1.00	05/20/1999 14:41	
gamma-BHC (Lindane)	ND	0.060	ug/L	1.00	05/20/1999 14:41	
delta-BHC	ND	0.060	ug/L	1.00	05/20/1999 14:41	
Endosulfan sulfate	ND	0.20	ug/L	1.00	05/20/1999 14:41	
4,4'-Methoxychlor	ND	0.20	ug/L	1.00	05/20/1999 14:41	
Toxaphene	ND	1.0	ug/L	1.00	05/20/1999 14:41	
Chlordane	ND	1.0	ug/L	1.00	05/20/1999 14:41	
Aroclor 1016	ND	0.50	ug/L	1.00	05/20/1999 14:41	
Aroclor 1221	ND	0.50	ug/L	1.00	05/20/1999 14:41	
Aroclor 1232	ND	0.50	ug/L	1.00	05/20/1999 14:41	
Aroclor 1242	ND	0.50	ug/L	1.00	05/20/1999 14:41	
Aroclor 1248	ND	0.50	ug/L	1.00	05/20/1999 14:41	
Aroclor 1254	ND	0.50	ug/L	1.00	05/20/1999 14:41	
Aroclor 1260	ND	0.50	ug/L	1.00	05/20/1999 14:41	
Surrogate(s)						
2,4,5,6-Tetrachloro-m-xylene	95.1	65-135	%	1.00	05/20/1999 14:41	
Decachlorobiphenyl	89.7	65-135	%	1.00	05/20/1999 14:41	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8080A

Attn.: Jeff Hennier

Prep Method: 3510/8080

Organochlorine Pesticides and PCBs

Sample ID: MW-3	Lab Sample ID: 1999-05-1125-003
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 16:00	Extracted: 05/19/1999 16:41
Matrix: Water	QC-Batch: 1999/05/19-02.13
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Aldrin	ND	0.082	ug/L	1.03	05/20/1999 15:04	
Dieldrin	ND	0.062	ug/L	1.03	05/20/1999 15:04	
Endrin aldehyde	ND	0.21	ug/L	1.03	05/20/1999 15:04	
Endrin	ND	0.41	ug/L	1.03	05/20/1999 15:04	
Heptachlor	ND	0.062	ug/L	1.03	05/20/1999 15:04	
Heptachlor epoxide	ND	0.10	ug/L	1.03	05/20/1999 15:04	
4,4'-DDT	ND	0.21	ug/L	1.03	05/20/1999 15:04	
4,4'-DDE	ND	0.082	ug/L	1.03	05/20/1999 15:04	
4,4'-DDD	ND	0.10	ug/L	1.03	05/20/1999 15:04	
Endosulfan I	ND	0.10	ug/L	1.03	05/20/1999 15:04	
Endosulfan II	ND	0.10	ug/L	1.03	05/20/1999 15:04	
alpha-BHC	ND	0.062	ug/L	1.03	05/20/1999 15:04	
beta-BHC	ND	0.062	ug/L	1.03	05/20/1999 15:04	
gamma-BHC (Lindane)	ND	0.062	ug/L	1.03	05/20/1999 15:04	
delta-BHC	ND	0.062	ug/L	1.03	05/20/1999 15:04	
Endosulfan sulfate	ND	0.21	ug/L	1.03	05/20/1999 15:04	
4,4'-Methoxychlor	ND	0.21	ug/L	1.03	05/20/1999 15:04	
Toxaphene	ND	1.0	ug/L	1.03	05/20/1999 15:04	
Chlordane	ND	1.0	ug/L	1.03	05/20/1999 15:04	
Aroclor 1016	ND	0.52	ug/L	1.03	05/20/1999 15:04	
Aroclor 1221	ND	0.52	ug/L	1.03	05/20/1999 15:04	
Aroclor 1232	ND	0.52	ug/L	1.03	05/20/1999 15:04	
Aroclor 1242	ND	0.52	ug/L	1.03	05/20/1999 15:04	
Aroclor 1248	ND	0.52	ug/L	1.03	05/20/1999 15:04	
Aroclor 1254	ND	0.52	ug/L	1.03	05/20/1999 15:04	
Aroclor 1260	ND	0.52	ug/L	1.03	05/20/1999 15:04	
Surrogate(s)						
2,4,5,6-Tetrachloro-m-xylene	98.5	65-135	%	1.00	05/20/1999 15:04	
Decachlorobiphenyl	92.7	65-135	%	1.00	05/20/1999 15:04	

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8080A

Attn.: Jeff Hennier

Prep Method: 3510/8080

Organochlorine Pesticides and PCBs

Sample ID: MW-4	Lab Sample ID: 1999-05-1125-004
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 11:30	Extracted: 05/19/1999 16:41
Matrix: Water	QC-Batch: 1999/05/19-02.13
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Aldrin	ND	0.081	ug/L	1.01	05/20/1999 15:28	
Dieldrin	ND	0.061	ug/L	1.01	05/20/1999 15:28	
Endrin aldehyde	ND	0.20	ug/L	1.01	05/20/1999 15:28	
Endrin	ND	0.40	ug/L	1.01	05/20/1999 15:28	
Heptachlor epoxide	ND	0.10	ug/L	1.01	05/20/1999 15:28	
4,4'-DDT	ND	0.20	ug/L	1.01	05/20/1999 15:28	
4,4'-DDE	ND	0.081	ug/L	1.01	05/20/1999 15:28	
4,4'-DDD	ND	0.10	ug/L	1.01	05/20/1999 15:28	
Endosulfan I	ND	0.10	ug/L	1.01	05/20/1999 15:28	
Endosulfan II	ND	0.10	ug/L	1.01	05/20/1999 15:28	
alpha-BHC	ND	0.061	ug/L	1.01	05/20/1999 15:28	
beta-BHC	ND	0.061	ug/L	1.01	05/20/1999 15:28	
gamma-BHC (Lindane)	ND	0.061	ug/L	1.01	05/20/1999 15:28	
delta-BHC	ND	0.061	ug/L	1.01	05/20/1999 15:28	
Endosulfan sulfate	ND	0.20	ug/L	1.01	05/20/1999 15:28	
4,4'-Methoxychlor	ND	0.20	ug/L	1.01	05/20/1999 15:28	
Toxaphene	ND	1.0	ug/L	1.01	05/20/1999 15:28	
Chlordane	ND	1.0	ug/L	1.01	05/20/1999 15:28	
Aroclor 1016	ND	0.50	ug/L	1.01	05/20/1999 15:28	
Aroclor 1221	ND	0.50	ug/L	1.01	05/20/1999 15:28	
Aroclor 1232	ND	0.50	ug/L	1.01	05/20/1999 15:28	
Aroclor 1242	ND	0.50	ug/L	1.01	05/20/1999 15:28	
Aroclor 1248	ND	0.50	ug/L	1.01	05/20/1999 15:28	
Aroclor 1254	ND	0.50	ug/L	1.01	05/20/1999 15:28	
Aroclor 1260	ND	0.50	ug/L	1.01	05/20/1999 15:28	
Surrogate(s)						
2,4,5,6-Tetrachloro-m-xylene	90.6	65-135	%	1.00	05/20/1999 15:28	
Decachlorobiphenyl	91.2	65-135	%	1.00	05/20/1999 15:28	

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8080A

Attn.: Jeff Hennier

Prep Method: 3510/8080

Organochlorine Pesticides and PCBs

Sample ID: MW-5	Lab Sample ID: 1999-05-1125-005
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 14:15	Extracted: 05/19/1999 16:41
Matrix: Water	QC-Batch: 1999/05/19-02.13
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Aldrin	ND	0.083	ug/L	1.04	05/20/1999 22:50	
Dieldrin	ND	0.062	ug/L	1.04	05/20/1999 22:50	
Endrin aldehyde	ND	0.21	ug/L	1.04	05/20/1999 22:50	
Endrin	ND	0.42	ug/L	1.04	05/20/1999 22:50	
Heptachlor	ND	0.062	ug/L	1.04	05/20/1999 22:50	
Heptachlor epoxide	ND	0.10	ug/L	1.04	05/20/1999 22:50	
4,4'-DDT	ND	0.21	ug/L	1.04	05/20/1999 22:50	
4,4'-DDE	ND	0.083	ug/L	1.04	05/20/1999 22:50	
4,4'-DDD	ND	0.10	ug/L	1.04	05/20/1999 22:50	
Endosulfan I	ND	0.10	ug/L	1.04	05/20/1999 22:50	
Endosulfan II	ND	0.10	ug/L	1.04	05/20/1999 22:50	
alpha-BHC	ND	0.062	ug/L	1.04	05/20/1999 22:50	
beta-BHC	ND	0.062	ug/L	1.04	05/20/1999 22:50	
gamma-BHC (Lindane)	ND	0.062	ug/L	1.04	05/20/1999 22:50	
delta-BHC	ND	0.062	ug/L	1.04	05/20/1999 22:50	
Endosulfan sulfate	ND	0.21	ug/L	1.04	05/20/1999 22:50	
4,4'-Methoxychlor	ND	0.21	ug/L	1.04	05/20/1999 22:50	
Toxaphene	ND	1.0	ug/L	1.04	05/20/1999 22:50	
Chlordane	ND	1.0	ug/L	1.04	05/20/1999 22:50	
Aroclor 1016	ND	0.52	ug/L	1.04	05/20/1999 22:50	
Aroclor 1221	ND	0.52	ug/L	1.04	05/20/1999 22:50	
Aroclor 1232	ND	0.52	ug/L	1.04	05/20/1999 22:50	
Aroclor 1242	ND	0.52	ug/L	1.04	05/20/1999 22:50	
Aroclor 1248	ND	0.52	ug/L	1.04	05/20/1999 22:50	
Aroclor 1254	ND	0.52	ug/L	1.04	05/20/1999 22:50	
Aroclor 1260	ND	0.52	ug/L	1.04	05/20/1999 22:50	
Surrogate(s)						
2,4,5,6-Tetrachloro-m-xylene	80.3	65-135	%	1.00	05/20/1999 22:50	
Decachlorobiphenyl	77.7	65-135	%	1.00	05/20/1999 22:50	

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

To: **Azure Environmental**
 Attn.: Jeff Hennier

Test Method: 8080A
 Prep Method: 3510/8080

Batch QC Report
 Organochlorine Pesticides and PCBs

Method Blank	Water	QC Batch # 1999/05/19-02.13
MB: 1999/05/19-02.13-001		Date Extracted: 05/19/1999 16:51

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Aldrin	ND	0.080	ug/L	05/20/1999 12:19	
Dieldrin	ND	0.060	ug/L	05/20/1999 12:19	
Endrin aldehyde	ND	0.20	ug/L	05/20/1999 12:19	
Endrin	ND	0.40	ug/L	05/20/1999 12:19	
Heptachlor	ND	0.060	ug/L	05/20/1999 12:19	
Heptachlor epoxide	ND	0.10	ug/L	05/20/1999 12:19	
4,4'-DDT	ND	0.20	ug/L	05/20/1999 12:19	
4,4'-DDE	ND	0.080	ug/L	05/20/1999 12:19	
4,4'-DDD	ND	0.10	ug/L	05/20/1999 12:19	
Endosulfan I	ND	0.10	ug/L	05/20/1999 12:19	
Endosulfan II	ND	0.10	ug/L	05/20/1999 12:19	
alpha-BHC	ND	0.060	ug/L	05/20/1999 12:19	
beta-BHC	ND	0.060	ug/L	05/20/1999 12:19	
gamma-BHC (Lindane)	ND	0.060	ug/L	05/20/1999 12:19	
delta-BHC	ND	0.060	ug/L	05/20/1999 12:19	
Endosulfan sulfate	ND	0.20	ug/L	05/20/1999 12:19	
4,4'-Methoxychlor	ND	0.20	ug/L	05/20/1999 12:19	
Toxaphene	ND	1.0	ug/L	05/20/1999 12:19	
Chlordane	ND	1.0	ug/L	05/20/1999 12:19	
Aroclor 1016	ND	0.50	ug/L	05/20/1999 12:19	
Aroclor 1221	ND	0.50	ug/L	05/20/1999 12:19	
Aroclor 1232	ND	0.50	ug/L	05/20/1999 12:19	
Aroclor 1242	ND	0.50	ug/L	05/20/1999 12:19	
Aroclor 1248	ND	0.50	ug/L	05/20/1999 12:19	
Aroclor 1254	ND	0.50	ug/L	05/20/1999 12:19	
Aroclor 1260	ND	0.50	ug/L	05/20/1999 12:19	
Surrogate(s)					
2,4,5,6-Tetrachloro-m-xylene	89.1	65-135	%	05/20/1999 12:19	
Decachlorobiphenyl	80.4	65-135	%	05/20/1999 12:19	

To: Azure Environmental

Test Method: 8080A

Attn: Jeff Hennier

Prep Method: 3510/8080

Batch QC Report

Organochlorine Pesticides and PCBs

Laboratory Control Spike (LCS/LCSD)		Water		QC Batch # 1999/05/19-02.13	
LCS:	1999/05/19-02.13-002	Extracted:	05/19/1999 16:51	Analyzed:	05/20/1999 12:43
LCSD:	1999/05/19-02.13-003	Extracted:	05/19/1999 16:51	Analyzed:	05/20/1999 13:07

Compound	Conc. [ug/L]		Added Amount	Recovery %		RPD	Control Limits %		Flags	
	LCS	LCSD		LCS	LCSD		Recovery	RPD	LCS	LCSD
Aldrin	43.8601	43.2746	50	87.7	86.5	1.4	65-135	25		
Dieldrin	49.3659	46.5964	50	98.7	93.2	5.7	65-135	20		
Endrin	56.2619	51.2268	50	112.5	102.5	9.3	65-135	20		
Heptachlor	48.4787	46.2025	50	97.0	92.4	4.9	65-135	20		
4,4'-DDT	47.3408	47.0820	50	94.7	94.2	0.5	65-135	20		
gamma-BHC (Lindane)	44.1676	42.8596	50	88.3	85.7	3.0	65-135	20		
Surrogate(s)										
2,4,5,6-Tetrachloro-m-xyI	42.4790	43.9016	50	85.0	87.8		65-135			
Decachlorobiphenyl	39.3400	40.9356	50	78.7	81.9		65-135			

To: Azure Environmental
Attn: Jeff Hennier

Test Method: 8080A
Prep Method: 3510/8080

Legend & Notes

Organochlorine Pesticides and PCBs

Analysis Flags

rl

Reporting limits raised due to insufficient sample volume.

PCBs

Azure Environmental	☐	828 Mission Avenue San Rafael, CA 94941
Attn: Jeff Hennier		Phone: (415) 485-9740 Fax: (415) 485-6062
Project #:		Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
MW-2	Product	05/14/1999 10:30	2

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8080A

Attn.: Jeff Hennier

Prep Method: 3510/8080

PCBs

Sample ID: MW-2	Lab Sample ID: 1999-05-1125-002
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 10:30	Extracted: 05/19/1999 09:00
Matrix: Product	QC-Batch: 1999/05/19-02.14

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Aroclor 1016	ND	0.50	mg/kg	1.00	05/21/1999 04:07	
Aroclor 1221	ND	0.50	mg/kg	1.00	05/21/1999 04:07	
Aroclor 1232	ND	0.50	mg/kg	1.00	05/21/1999 04:07	
Aroclor 1242	ND	0.50	mg/kg	1.00	05/21/1999 04:07	
Aroclor 1248	ND	0.50	mg/kg	1.00	05/21/1999 04:07	
Aroclor 1254	ND	0.50	mg/kg	1.00	05/21/1999 04:07	
Aroclor 1260	ND	0.50	mg/kg	1.00	05/21/1999 04:07	
Surrogate(s)						
2,4,5,6-Tetrachloro-m-xylene	116.2	65-135	%	1.00	05/21/1999 04:07	
Decachlorobiphenyl	157.1	65-135	%	1.00	05/21/1999 04:07	s

1220 Quarry Lane * Pleasanton, California 94566-4756
Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

To: Azure Environmental
Attn.: Jeff Hennier

Test Method: 8080A
Prep Method: 3510/8080

Batch QC Report
PCBs

Method Blank	Oil	QC Batch # 1999/05/19-02.14
MB: 1999/05/19-02.14-001		Date Extracted: 05/19/1999 09:00

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Aroclor 1016	ND	0.5	mg/Kg	05/21/1999 12:52	
Aroclor 1221	ND	0.5	mg/Kg	05/21/1999 12:52	
Aroclor 1232	ND	0.5	mg/Kg	05/21/1999 12:52	
Aroclor 1242	ND	0.5	mg/Kg	05/21/1999 12:52	
Aroclor 1248	ND	0.5	mg/Kg	05/21/1999 12:52	
Aroclor 1254	ND	0.5	mg/Kg	05/21/1999 12:52	
Aroclor 1260	ND	0.5	mg/Kg	05/21/1999 12:52	
Surrogate(s)					
2,4,5,6-Tetrachloro-m-xylene	85.0	65-135	%	05/21/1999 12:52	
Decachlorobiphenyl	109.6	65-135	%	05/21/1999 12:52	

To: **Azure Environmental**
Attn: Jeff Hennier

Test Method: 8080A
Prep Method: 3510/8080

Batch QC Report
PCBs

Laboratory Control Spike (LCS/LCSD)	Oil	QC Batch # 1999/05/19-02.14
LCS: 1999/05/19-02.14-002	Extracted: 05/19/1999 09:00	Analyzed: 05/21/1999 13:27
LCSD: 1999/05/19-02.14-003	Extracted: 05/19/1999 09:00	Analyzed: 05/21/1999 14:03

Compound	Conc. [mg/Kg]		Added Amount	Recovery %		RPD	Control Limits %		Flags	
	LCS	LCSD		LCS	LCSD		Recovery	RPD	LCS	LCSD
Aroclor 1016	63.3683	58.5666	50	126.7	117.1	7.9	65-135	30		
Aroclor 1260	54.3304	55.9121	50	108.7	111.8	2.8	65-135	30		
Surrogate(s)										
2,4,5,6-Tetrachloro-m-xyI	31.3028	30.8625	25	125.2	123.5		65-135			
Decachlorobiphenyl	32.6123	30.7875	25	130.4	123.2		65-135			

To: Azure Environmental

Attn: Jeff Hennier

Test Method: 8080A

Prep Method: 3510/8080

Legend & Notes

PCBs

Analyte Flags

S

One surrogate recovery out of control, but second surrogate within QC limits confirms test performance.

Gas/BTEX

Azure Environmental	✉ 828 Mission Avenue San Rafael, CA 94941
Attn: Jeff Hennier	Phone: (415) 485-9740 Fax: (415) 485-6062
Project #:	Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
MW-1	Water	05/14/1999	1
MW-3	Water	05/14/1999 16:00	3
MW-4	Water	05/14/1999 11:30	4
MW-5	Water	05/14/1999 14:15	5

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8015M
8020

Attn.: Jeff Hennier

Prep Method: 5030

Gas/BTEX

Sample ID: MW-1	Lab Sample ID: 1999-05-1125-001
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999	Extracted: 05/19/1999 19:30
Matrix: Water	QC-Batch: 1999/05/19-01.02

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Gasoline	ND	50	ug/L	1.00	05/19/1999 19:30	
Benzene	ND	0.50	ug/L	1.00	05/19/1999 19:30	
Toluene	ND	0.50	ug/L	1.00	05/19/1999 19:30	
Ethyl benzene	ND	0.50	ug/L	1.00	05/19/1999 19:30	
Xylene(s)	ND	0.50	ug/L	1.00	05/19/1999 19:30	
Surrogate(s)						
Trifluorotoluene	115.2	58-124	%	1.00	05/19/1999 19:30	
4-Bromofluorobenzene-FID	101.7	50-150	%	1.00	05/19/1999 19:30	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8015M
8020

Attn.: Jeff Hennier

Prep Method: 5030

Gas/BTEX

Sample ID: MW-3	Lab Sample ID: 1999-05-1125-003
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 16:00	Extracted: 05/21/1999 14:57
Matrix: Water	QC-Batch: 1999/05/21-01.01

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Gasoline	ND	50	ug/L	1.00	05/21/1999 14:57	
Benzene	ND	0.50	ug/L	1.00	05/21/1999 14:57	
Toluene	ND	0.50	ug/L	1.00	05/21/1999 14:57	
Ethyl benzene	ND	0.50	ug/L	1.00	05/21/1999 14:57	
Xylene(s)	ND	0.50	ug/L	1.00	05/21/1999 14:57	
Surrogate(s)						
Trifluorotoluene	64.8	58-124	%	1.00	05/21/1999 14:57	
4-Bromofluorobenzene-FID	62.4	50-150	%	1.00	05/21/1999 14:57	

1220 Quarry Lane * Pleasanton, California 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: **Azure Environmental**

Test Method: 8015M
8020

Attn.: Jeff Hennier

Prep Method: 5030

Gas/BTEX

Sample ID: MW-4	Lab Sample ID: 1999-05-1125-004
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 11:30	Extracted: 05/19/1999 20:51
Matrix: Water	QC-Batch: 1999/05/19-01.02

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Gasoline	ND	50	ug/L	1.00	05/19/1999 20:51	
Benzene	ND	0.50	ug/L	1.00	05/19/1999 20:51	
Toluene	ND	0.50	ug/L	1.00	05/19/1999 20:51	
Ethyl benzene	ND	0.50	ug/L	1.00	05/19/1999 20:51	
Xylene(s)	ND	0.50	ug/L	1.00	05/19/1999 20:51	
Surrogate(s)						
Trifluorotoluene	103.8	58-124	%	1.00	05/19/1999 20:51	
4-Bromofluorobenzene-FID	96.5	50-150	%	1.00	05/19/1999 20:51	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8015M
8020

Attn.: Jeff Hennier

Prep Method: 5030

Gas/BTEX

Sample ID: MW-5	Lab Sample ID: 1999-05-1125-005
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 14:15	Extracted: 05/19/1999 20:51
Matrix: Water	QC-Batch: 1999/05/19-01.02

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Gasoline	ND	50	ug/L	1.00	05/19/1999 20:51	
Benzene	ND	0.50	ug/L	1.00	05/19/1999 20:51	
Toluene	ND	0.50	ug/L	1.00	05/19/1999 20:51	
Ethyl benzene	ND	0.50	ug/L	1.00	05/19/1999 20:51	
Xylene(s)	ND	0.50	ug/L	1.00	05/19/1999 20:51	
Surrogate(s)						
Trifluorotoluene	106.1	58-124	%	1.00	05/19/1999 20:51	
4-Bromofluorobenzene-FID	99.8	50-150	%	1.00	05/19/1999 20:51	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8020
8015M

Attn.: Jeff Hennier

Prep Method: 5030

Batch QC Report Gas/BTEX

Method Blank	Water	QC Batch # 1999/05/19-01.02
MB: 1999/05/19-01.02-001		Date Extracted: 05/19/1999 06:45

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Gasoline	ND	50	ug/L	05/19/1999 06:45	
Benzene	ND	0.5	ug/L	05/19/1999 06:45	
Toluene	ND	0.5	ug/L	05/19/1999 06:45	
Ethyl benzene	ND	0.5	ug/L	05/19/1999 06:45	
Xylene(s)	ND	0.5	ug/L	05/19/1999 06:45	
Surrogate(s)					
Trifluorotoluene	110.2	58-124	%	05/19/1999 06:45	
4-Bromofluorobenzene-FID	91.1	50-150	%	05/19/1999 06:45	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8020
8015M

Attn.: Jeff Hennier

Prep Method: 5030

Batch QC Report Gas/BTEX

Method Blank

Water

QC Batch # 1999/05/21-01.01

MB: 1999/05/21-01.01-001

Date Extracted: 05/21/1999 09:15

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Gasoline	ND	50	ug/L	05/21/1999 09:15	
Benzene	ND	0.5	ug/L	05/21/1999 09:15	
Toluene	ND	0.5	ug/L	05/21/1999 09:15	
Ethyl benzene	ND	0.5	ug/L	05/21/1999 09:15	
Xylene(s)	ND	0.5	ug/L	05/21/1999 09:15	
Surrogate(s)					
Trifluorotoluene	78.7	58-124	%	05/21/1999 09:15	
4-Bromofluorobenzene-FID	77.3	50-150	%	05/21/1999 09:15	

To: Azure Environmental

Test Method: 8020
8015M

Attn: Jeff Hennier

Prep Method: 5030

Batch QC Report

Gas/BTEX

Laboratory Control Spike (LCS/LCSD)	Water	QC Batch # 1999/05/19-01.02
LCS: 1999/05/19-01.02-002	Extracted: 05/19/1999 13:48	Analyzed: 05/19/1999 13:48
LCSD: 1999/05/19-01.02-003	Extracted: 05/19/1999 08:07	Analyzed: 05/19/1999 08:07

Compound	Conc. [ug/L]		Added Amount	Recovery %		RPD	Control Limits %		Flags	
	LCS	LCSD		LCS	LCSD		Recovery	RPD	LCS	LCSD
Gasoline	2569.9	2461.6	2500	102.8	98.5	4.3	75-125	20		
Benzene	539.1010	509.5136	500	107.8	101.9	5.6	77-123	20		
Toluene	528.2584	499.0477	500	105.7	99.8	5.7	78-122	20		
Ethyl benzene	502.5680	473.0621	500	100.5	94.6	6.0	70-130	20		
Xylene(s)	1510.7556	1431.6123	1500	100.7	95.4	5.4	75-125	20		
Surrogate(s)										
Trifluorotoluene	489.7518	446.4091	500	98.0	89.3		58-124			
4-Bromofluorobenzene-FI	552.6790	542.4359	500	110.5	108.5		50-150			

To: Azure Environmental

Test Method: 8020
8015M

Attn: Jeff Hennier

Prep Method: 5030

Batch QC Report

Gas/BTEX

Laboratory Control Spike (LCS/LCSD)

Water

QC Batch # 1999/05/21-01.01

LCS: 1999/05/21-01.01-002

Extracted: 05/21/1999 09:42

Analyzed: 05/21/1999 09:42

LCSD: 1999/05/21-01.01-003

Extracted: 05/21/1999 10:36

Analyzed: 05/21/1999 10:36

Compound	Conc. [ug/L]		Added Amount	Recovery %		RPD	Control Limits %		Flags	
	LCS	LCSD		LCS	LCSD		Recovery	RPD	LCS	LCSD
Gasoline	2216.5	2221.8	2500	88.7	88.9	0.2	75-125	20		
Benzene	472.0134	455.7685	500	94.4	91.2	3.4	77-123	20		
Toluene	469.8070	469.2028	500	94.0	93.8	0.2	78-122	20		
Ethyl benzene	466.7132	451.5915	500	93.3	90.3	3.3	70-130	20		
Xylene(s)	1362.9752	1328.1005	1500	90.9	88.5	2.7	75-125	20		
Surrogate(s)										
Trifluorotoluene	480.5177	457.3205	500	96.1	91.5		58-124			
4-Bromofluorobenzene-FI	474.6856	501.2730	500	94.9	100.3		50-150			

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-05-1125

To: Azure Environmental

Test Method: 8020
8015M

Attn.: Jeff Hennier

Prep Method: 5030

Batch QC Report

Gas/BTEX

Matrix Spike (MS / MSD)

Water

QC Batch # 1999/05/19-01.02

Sample ID: MW1

Lab Sample ID: 1999-05-1102-001

MS: 1999/05/19-01.02-004 Extracted: 05/19/1999 10:58 Analyzed: 05/19/1999 10:58 Dilution: 1.0

MSD: 1999/05/19-01.02-005 Extracted: 05/19/1999 11:52 Analyzed: 05/19/1999 11:52 Dilution: 1.0

Compound	Conc. [ug/L]			Added Amount	Recovery %		RPD	Control Limits %		Flags	
	MS	MSD	Sample		MS	MSD		Recovery	RPD	MS	MSD
Gasoline	2822.1	2754.6	490	2500	93.3	90.6	15.5	65-135	20		
Benzene	536.69	526	6.2	500	106.1	104.0	1.9	65-135	20		
Toluene	493	494	2.0	500	98.2	98.4	0.5	65-135	20		
Ethyl benzene	477	493	0.62	500	95.3	98.5	0.6	65-135	20		
Xylene(s)	1396.0153	1451.1014	4.3	1500	92.8	96.5	0.6	65-135	20		
Surrogate(s)											
Trifluorotoluene	510.5589	480.3565		500	102.1	96.1		58-124			
4-Bromofluorobenzene-F	565.3360	550.8349		500	113.1	110.2		50-150			

1220 Quarry Lane * Pleasanton, California 94566-4756
Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

To: Azure Environmental

Test Method: 8020
8015M

Attn.: Jeff Hennier

Prep Method: 5030

Batch QC Report

Gas/BTEX

Matrix Spike (MS / MSD)

Water

QC Batch # 1999/05/21-01.01

Sample ID: MW-3

Lab Sample ID: 1999-05-1125-003

MS: 1999/05/21-01.01-004 Extracted: 05/21/1999 17:14 Analyzed: 05/21/1999 17:14 Dilution: 1.0

MSD: 1999/05/21-01.01-005 Extracted: 05/21/1999 18:08 Analyzed: 05/21/1999 18:08 Dilution: 1.0

Compound	Conc. [ug/L]			Added Amount	Recovery %		RPD	Control Limits %		Flags	
	MS	MSD	Sample		MS	MSD		Recovery	RPD	MS	MSD
Gasoline	2389.8	2272	ND	2500	95.6	90.9	1.3	65-135	20		
Benzene	506.5056	468.2187	ND	500	101.3	93.6	2.0	65-135	20		
Toluene	516.6707	475.1831	ND	500	103.3	95.0	2.1	65-135	20		
Ethyl benzene	498.8030	458.2904	ND	500	99.8	91.7	2.1	65-135	20		
Xylene(s)	1459.5873	1336.4773	0.62	1500	97.3	89.1	2.2	65-135	20		
Surrogate(s)											
Trifluorotoluene	533.0809	488.1573		500	106.6	97.6		58-124			
4-Bromofluorobenzene-F	518.0394	502.3201		500	103.6	100.5		50-150			

Gas/BTEX (Methanol Extraction)

Azure Environmental	✉ 828 Mission Avenue San Rafael, CA 94941
Attn: Jeff Hennier	Phone: (415) 485-9740 Fax: (415) 485-6062
Project #:	Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
MW-2	Product	05/14/1999 10:30	2

To: Azure Environmental

Test Method: 8015M
8020

Attn.: Jeff Hennier

Prep Method: 5030

Gas/BTEX (Methanol Extraction)

Sample ID: MW-2	Lab Sample ID: 1999-05-1125-002
Project: 1600 63rd Street	Received: 05/14/1999 17:15
Sampled: 05/14/1999 10:30	Extracted: 05/20/1999 12:14
Matrix: Product	QC-Batch: 1999/05/20-02.02

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Gasoline	210	40	mg/Kg	4.00	05/24/1999 12:14	g
Benzene	ND	2.5	mg/Kg	4.00	05/24/1999 12:14	
Toluene	ND	2.5	mg/Kg	4.00	05/24/1999 12:14	
Ethyl benzene	ND	2.5	mg/Kg	4.00	05/24/1999 12:14	
Xylene(s)	4.9	2.5	mg/Kg	4.00	05/24/1999 12:14	
Surrogate(s)						
Trifluorotoluene	52.0	53-125	%	1.00	05/24/1999 12:14	sl
4-Bromofluorobenzene-FID	795.0	58-124	%	1.00	05/24/1999 12:14	sh

To: **Azure Environmental**

Test Method: 8015M
8020

Attn.: Jeff Hennier

Prep Method: 5030

Batch QC Report
Gas/BTEX (Methanol Extraction)

Method Blank	Soil	QC Batch # 1999/05/20-02.02
MB: 1999/05/20-02.02-001		Date Extracted: 05/20/1999 12:46

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Gasoline	ND	50	ug/L	05/20/1999 12:46	
Benzene	ND	0.5	ug/L	05/20/1999 12:46	
Toluene	ND	0.5	ug/L	05/20/1999 12:46	
Ethyl benzene	ND	0.5	ug/L	05/20/1999 12:46	
Xylene(s)	ND	0.5	ug/L	05/20/1999 12:46	
Surrogate(s)					
4-Bromofluorobenzene	150.0	50-150	%	05/20/1999 12:46	
Trifluorotoluene-FID	113.0	58-124	%	05/20/1999 12:46	

To: **Azure Environmental**

Test Method: 8020
8015M

Attn: Jeff Hennier

Prep Method: 5030

Batch QC Report

Gas/BTEX (Methanol Extraction)

Laboratory Control Spike (LCS/LCSD)	Soil	QC Batch # 1999/05/20-02.02
LCS: 1999/05/20-02.02-002	Extracted: 05/20/1999 13:14	Analyzed: 05/20/1999 13:14
LCSD: 1999/05/20-02.02-003	Extracted: 05/20/1999 14:08	Analyzed: 05/20/1999 14:08

Compound	Conc. [ug/L]		Added Amount	Recovery %		RPD	Control Limits %		Flags	
	LCS	LCSD		LCS	LCSD		Recovery	RPD	LCS	LCSD
Gasoline	2174.00	2201	2500	87.0	88.0	1.1	75-125	20		
Benzene	575	545	500	115.0	109.0	5.4	77-123	20		
Toluene	580	550	500	116.0	110.0	5.3	78-122	20		
Ethyl benzene	575	550	500	115.0	110.0	4.4	70-130	20		
Xylene(s)	1630	1582	1500	108.7	105.5	3.0	75-125	20		
Surrogate(s)										
4-Bromofluorobenzene	575	590	500	115.0	118.0		50-150			
Trifluorotoluene-FID	610	620	500	122.0	124.0		58-124			

To: Azure Environmental

Test Method: 8015M
8020

Attn: Jeff Hennier

Prep Method: 5030

Legend & Notes

Gas/BTEX (Methanol Extraction)

Analyte Flags

g

Hydrocarbon reported in the gasoline range does not match our gasoline standard.

sh

Surrogate recoveries were higher than QC limits due to matrix interference.

sl

Surrogate recoveries were lower than QC limit due to matrix interference, confirmed by reanalysis.

CHROMALAB, INC.

Environmental Services (SDB)

FAX COVER SHEET

To: Jeff Hennier
Company: Azeve

Fax Number: _____

From: Gary

Phone Number: 925-484-1919 Fax Number: 925-484-1096

Date: _____ Time: _____

Number of Pages: Cover + 1 SUB# 99051125

Message: COC -

Change authorization
Field blank on hold

CHROMALAB, INC.

1220 Quarry Lane • Pleasanton, California 94566-4756
510/484-1919 • Facsimile 510/484-1098

Environmental Services (SOB) (OOHS 1094)

49-05-1125

Reference #: 46078

Chain of Custody

DATE 5/14/99 PAGE 1 OF 1

PROJ MGR: Charm Leung
 COMPANY: SEMA Corp
 ADDRESS: 1200 B 45th St
Emeryville, CA 94608

SAMPLERS (SIGNATURE): Ben Wells 510-54-3900
 Fax 510-54-1960

ANALYSIS REPORT

TPH (EPA 8015, 8020) <input type="checkbox"/> Gas <input type="checkbox"/> BTEX LIMITS	PURGEABLE AROMATICS BTEX (EPA 8020)	TPH-Diesel (EPA 8015M)	TEPH (EPA 8015M) Dioxene, B-Dioxin, X.M.O.	PURGEABLE HALOCARBONS (HYDRO) (EPA 810 by 8260)	VOLATILE ORGANICS VOCs (EPA 8260)	SEMI-VOLATILES (EPA 8270)	TOTAL OIL AND GREASE (SM 5520 B+F, E+F)	TOTAL RECOVERABLE HYDROCARBONS (EPA 413.1)	PESTICIDES (EPA 8080) PCBs (EPA 8080)	PNA's by <input type="checkbox"/> 8270 <input type="checkbox"/> 8370	<input type="checkbox"/> pH <input type="checkbox"/> Spec. Cond. <input type="checkbox"/> TSS <input type="checkbox"/> TDS	LUFT METALS: Cd, Cr, Pb, Ni, Zn	CAM 17 METALS (EPA 8010/7670/7471)	TOTAL LEAD	<input type="checkbox"/> W.E.T. <input type="checkbox"/> TGP	EPA 8015	MTST W/ 8260	HOLD	NUMBER OF CONTAINERS
---	--	------------------------	---	--	--------------------------------------	------------------------------	--	---	--	---	---	------------------------------------	---------------------------------------	------------	---	----------	--------------	------	----------------------

SAMPLE ID	DATE	TIME	MATRIX	PRESERV.	TPH (EPA 8015, 8020)	PURGEABLE AROMATICS	TPH-Diesel (EPA 8015M)	TEPH (EPA 8015M)	PURGEABLE HALOCARBONS	VOLATILE ORGANICS	SEMI-VOLATILES	TOTAL OIL AND GREASE	TOTAL RECOVERABLE	PESTICIDES	PNA's	LUFT METALS	CAM 17 METALS	TOTAL LEAD	W.E.T./TGP	EPA 8015	MTST W/ 8260	HOLD	NUMBER OF CONTAINERS	
MW-1	5/14/99	1215	H ₂ O		X			X		X			X								X	X		13
MW-2		1030							TEPH															3
MW-3		1600																						13
MW-4		1130																						13
MW-5		1415																						13
MW-3 Field Blank mw-3 B		1515	✓	✓	✓			✓			✓		✓								✓	✓	X	✓

PROJECT INFORMATION		SAMPLE RECEIPT		RELINQUISHED BY 1		RELINQUISHED BY 2		RELINQUISHED BY 3	
PROJECT NAME <u>1600 63rd Street</u>	TOTAL NO OF CONTAINERS <u>75</u>	HEAD SPACE		SIGNATURE <u>Ben Wells</u>	NAME <u>Ben Wells</u>	SIGNATURE <u>Sal Monte</u>	NAME <u>Sal Monte</u>	SIGNATURE	NAME
PROJECT NUMBER	TEMPERATURE	CONFORMS TO RECORD		PRINTED NAME <u>Ben Wells</u>	DATE <u>5.14.99</u>	PRINTED NAME <u>SAL MONTE</u>	DATE <u>5/14/99</u>	PRINTED NAME	DATE
P.O.# <u>151-002</u>	STANDARD <u>5-DAY</u>	<input type="checkbox"/> 24	<input type="checkbox"/> 48	<input type="checkbox"/> 72	<input type="checkbox"/> OTHER	COMPANY <u>Azure</u>	COMPANY <u>World Courier</u>	COMPANY	
Report: <input checked="" type="checkbox"/> Routine <input type="checkbox"/> Level 2 <input type="checkbox"/> Level 3 <input type="checkbox"/> Level 4				RECEIVED BY 1		RECEIVED BY 2		RECEIVED BY (LABORATORY) 3	
SPECIAL INSTRUCTIONS/COMMENTS: <u>CC. results to Jeff Henner</u> <u>for 415/485-6002</u> <u>1-2 ✓ with Azure</u>				SIGNATURE <u>Sal Monte</u>	NAME <u>Sal Monte</u>	SIGNATURE <u>Sal Monte</u>	NAME <u>Sal Monte</u>	SIGNATURE <u>Denise Harrington</u>	NAME <u>Denise Harrington</u>
				PRINTED NAME <u>World Courier</u>	DATE	PRINTED NAME	DATE	PRINTED NAME <u>D. Harrington</u>	DATE <u>5/14/99</u>
				COMPANY <u>World Courier</u>		COMPANY		COMPANY <u>Chromalab</u>	

TEL: 510 484 1096
 P. 002
 CHROMALAB, INC.

CHROMALAB, INC.

1220 Quarry Lane • Pleasanton, California 94566-4756
510/484-1919 • Facsimile 510/484-1096

99-05-1125

Reference #: 46078

Chain of Custody

Environmental Services (SDB) (DOHS 1094)

DATE 5/14/99 PAGE 1 OF 1

PROJ MGR Glenn Leong
COMPANY SOMA Corp
ADDRESS 1260 B 45th St.
Emeryville, CA 94608

SAMPLERS (SIGNATURE) Ben Wells
510/654-3900
510/654-1960 fax

SAMPLE ID	DATE	TIME	MATRIX	PRESERV.	ANALYSIS REPORT														NUMBER OF CONTAINERS																		
					TPH-IEPA 8015, 8020 by Gen w/ BTEX limits	PURGEABLE AROMATICS BTEX IEPA 8020	TPH-Diesel IEPA 8015M	TEPH IEPA 8015M Chloroform, Dichloro, DM.C.	PURGEABLE HALOCARBONS (IVOCs) IEPA 8010 by 8250	VOLATILE ORGANICS (VOCs) IEPA 8280	SEMI-VOLATILES IEPA 8270	TOTAL OIL AND GREASE (SM 5520 B+F, B+F)	TOTAL RECOVERABLE HYDROCARBONS IEPA 418.1	PESTICIDES IEPA 9090 PCBs IEPA 9080	PMA's by □ 8270 □ 8310	□ pH □ Spec. Cond. □ TSS □ TDS	LUFT METALS: Cd, Cr, Pb, Ni, Zn	CAM 17 METALS IEPA 6010/7670/7471		TOTAL LEAD	□ W.E.T. □ TCLP	EPA 8010	MTGE by 8260	HOLD													
MW-1	5/14/99	1215	H ₂ O		X		X		X			X							X	X																	13
MW-2		1030																																		13	
MW-3		1600																																		13	
MW-4		1130																																			
MW-5		1415																																			
MW-3-B mw-3-B		1515	✓		✓		✓		✓			✓																									

PROJECT INFORMATION

PROJECT NAME: 1600 63rd Street
PROJECT NUMBER: 151-002
P.O.#: 151-002
TAT: STANDARD 3-DAY

SAMPLE RECEIPT

TOTAL NO OF CONTAINERS: 78
HEAD SPACE: _____
TEMPERATURE: _____
CONFORMS TO RECORD: _____

Report: Routine Level 2 Level 3 Level 4
SPECIAL INSTRUCTIONS/COMMENTS:
CC. results to Jeff Hennier for 415/425-6002
*mw-2 ✓ with Azure

RELINQUISHED BY 1
Signature: Ben Wells
Printed Name: Ben Wells
Date: 5.14.99
Company: Azure

RELINQUISHED BY 2
Signature: Sal Montez
Printed Name: Sal Montez
Date: 5/14/99
Company: World Courier

RELINQUISHED BY 3
Signature: _____
Printed Name: _____
Date: _____
Company: _____

RECEIVED BY 1
Signature: Sal Montez
Printed Name: Sal Montez
Date: _____
Company: World Courier

RECEIVED BY 2
Signature: _____
Printed Name: _____
Date: _____
Company: _____

RECEIVED BY (LABORATORY) 3
Signature: Denise Harrington
Printed Name: D. Harrington
Date: 5/14/99
Company: Chromalab

TEL: 510 484 1096
P. 002

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

James E. Bruya, Ph.D.
Charlene Jensen, M.S.
Bradley T. Benson, B.S.
Kurt Johnson, B.S.

3012 16th Avenue West
Seattle, WA 98119-2029
TEL: (206) 285-8282
FAX: (206) 283-5044
e-mail: fbi@isomedia.com

June 24, 1999

Gary Cook, Project Manager
Chromalab, Inc.
1220 Quarry Lane
Pleasanton, CA 94566-4756

Dear Mr. Cook:

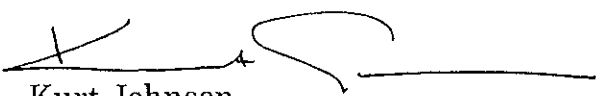
Below are the results from the analytical testing of material submitted on June 17, 1999 from your Characterization project. The product sample submitted for forensic evaluation arrived in good condition. Upon its arrival, sample MW-2 was assigned our laboratory project number 906073 and was placed in a refrigerator where it was maintained at 4°C until removed for sample processing.

The purpose of our investigation was to determine the material present in the sample. In order to make this determination the sample was extracted and analyzed using a gas chromatograph with a flame ionization detector (GC/FID) and an electron capture detector (ECD). The data generated yielded information on the boiling range and general chemical composition of the material present. Based on this information, the material was identified. The GC/FID and GC/ECD traces are enclosed. A GC/FID trace of a standard consisting of normal alkanes is also provided for reference purposes.

Please contact us if additional consultation is needed by our firm in the interpretation of the analytical results provided. We appreciate this opportunity to be of service to you and hope you will call if you should have any questions. We will hold your samples for 30 days before disposal unless directed otherwise.

Sincerely,

FRIEDMAN & BRUYA, INC.


Kurt Johnson
Chemist

Enclosures
NAA0624R.DOC

Date of Report: 06/24/99
Date Received: 06/17/99
Project: Characterization
Date Extracted: 06/21/99
Date Analyzed: 06/21/99

**RESULTS FROM THE ANALYSIS OF THE PRODUCT SAMPLE
FOR FORENSIC EVALUATION
BY CAPILLARY GAS CHROMATOGRAPHY
USING A FLAME IONIZATION DETECTOR (FID)
AND ELECTRON CAPTURE DETECTOR (ECD)**

Sample ID

GC Characterization

MW-2

The GC trace using the flame ionization detector (FID) showed the presence of low, medium and high boiling compounds. The patterns displayed by these peaks are indicative of degraded Bunker C or Crude Oil.

The material appeared on the GC/FID trace as a ragged pattern of peaks on top of a broad hump. This material elutes from approximately *n*-C₇ to beyond *n*-C₃₂ showing a maximum near *n*-C₂₁. The prominent peaks present on the GC/FID trace are characteristic of isoprenoids including norpristane, pristane, and phytane. The GC/FID trace did not show discernible peaks characteristic of the normal alkanes. The low level or absence of normal alkanes in conjunction with abundant isoprenoids indicates that the product present has undergone extensive biological degradation. The GC/ECD trace showed an absence of peaks which are characteristic of halogenated compounds, alkyl lead species, and PCB's.

The large peak seen near 25 minutes on the GC/FID trace is pentacosane, added as a quality assurance check for this GC analysis. There is a second surrogate present that is seen on the GC/ECD trace at about 26 minutes which is dibutyl chlorendate.

CHROMALAB, INC.

1220 Quarry Lane • Pleasanton, California 94566-4756
510/484-1919 • Facsimile 510/484-1096

Chain of Custody

Environmental Services (SDB) (DOIS 1094)

DATE 05/14/99 PAGE 1 of 1

PROJ MGR GARY COOK	ANALYSIS REPORT										ChromaLab Reference or Submission Number(s)	NUMBER OF CONTAINERS		
	COMPANY	ADDRESS	SAMPLERS (SIGNATURE)	(PHONE NO.)	(FAX NO.)	SAMPLE ID.	DATE	TIME	MATRIX	PRESERV.			Hydrocarbon fingerprint	
						01 MW-2	05-14	10:30			X			

PROJECT INFORMATION

PROJECT NAME: _____

PROJECT NUMBER: 99060226

P.O. # _____

TAT: STANDARD
5 DAY

TOTAL NO OF CONTAINERS: _____

HEAD SPACE: _____

REC'D GOOD CONDITION/COLD

CONFORMS TO RECORD

24 48 72 OTHER

RELINQUISHED BY Acaparas (SIGNATURE) CRISTINA (PRINTED NAME) (DATE) (DATE) (COMPANY)	RELINQUISHED BY (DATE) (SIGNATURE) (PRINTED NAME) (DATE) (COMPANY)	RELINQUISHED BY (DATE) (SIGNATURE) (PRINTED NAME) (DATE) (COMPANY)
---	---	---

SPECIAL INSTRUCTIONS/COMMENTS
 fingerprint analysis (HFS) using GC/FID.

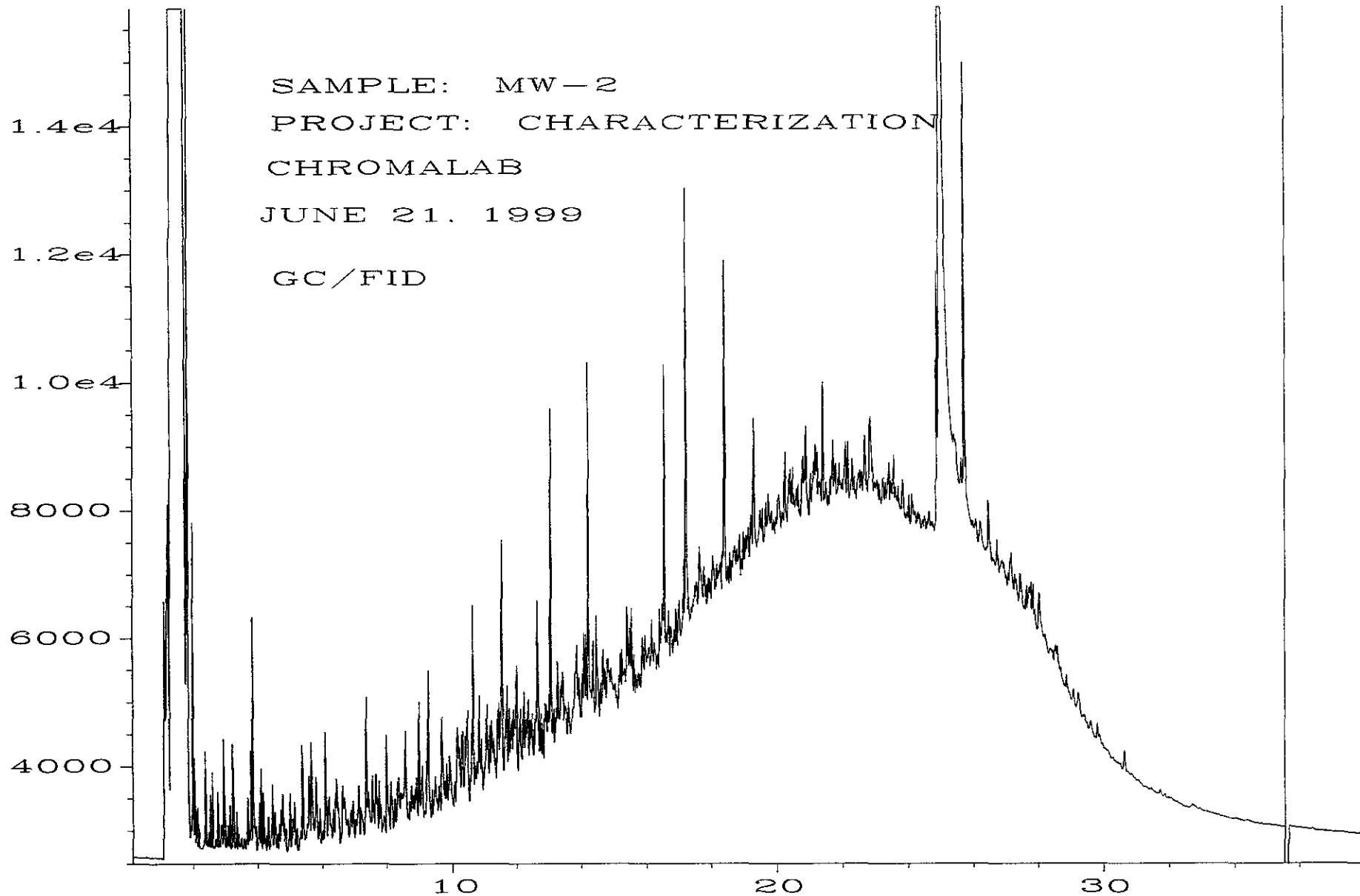


Fig. 1 in C:\HPCHEM\1\DATA\06-21-99\009F0601.D



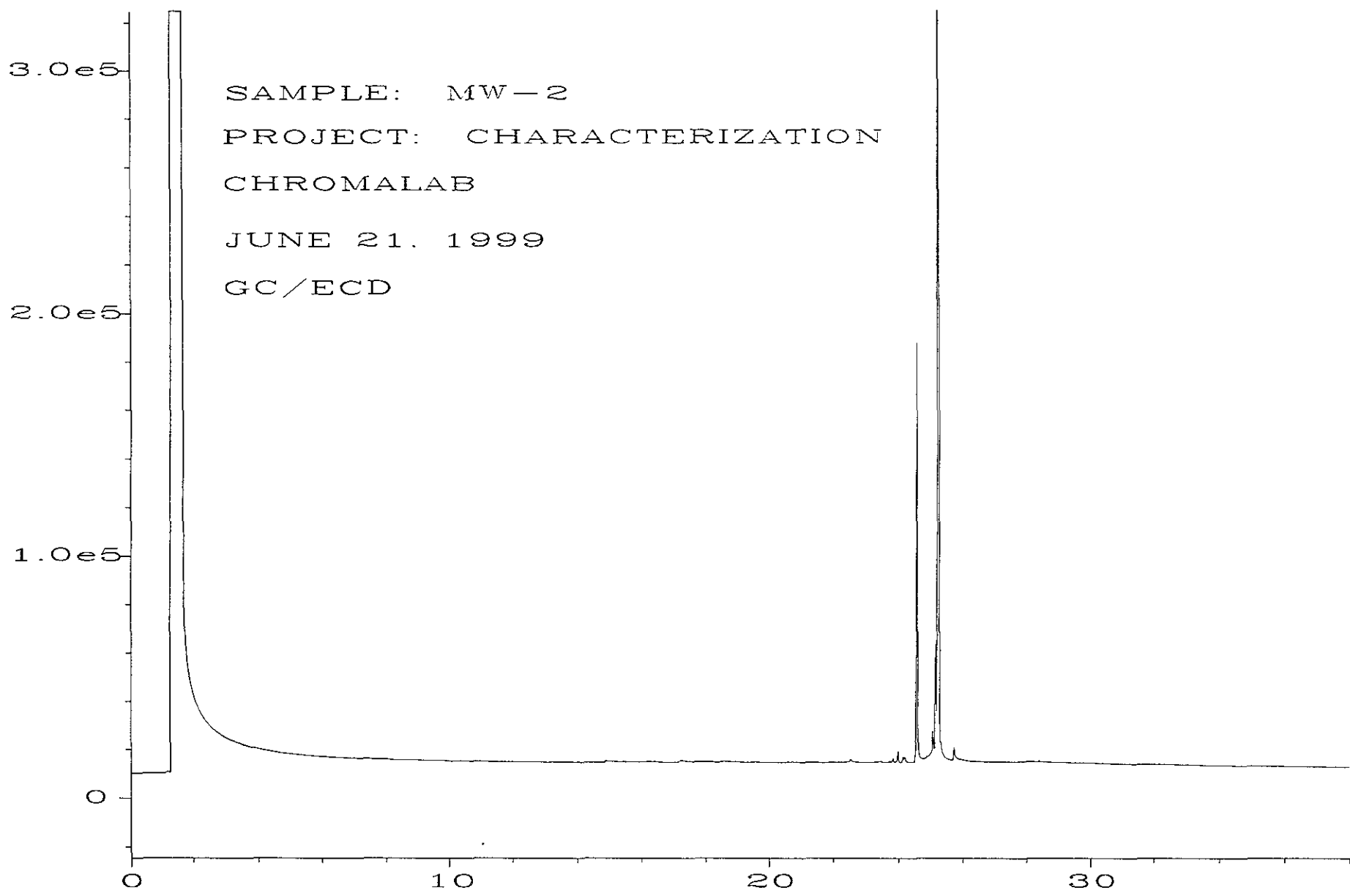


Fig. 2 in C:\HPCHEM\1\DATA\06-21-99\009R0601.D

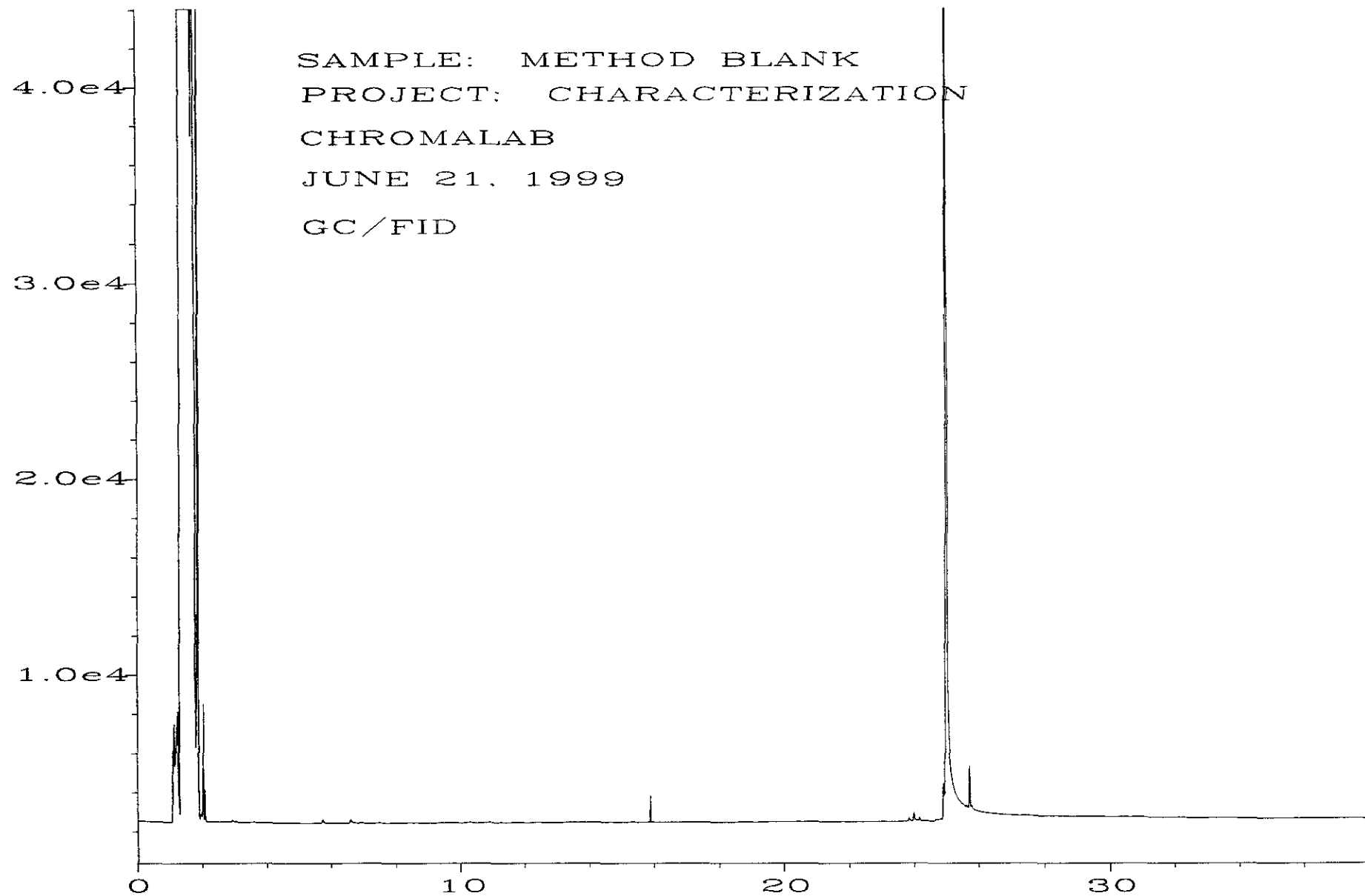


Fig. 1 in C:\HPCHEM\1\DATA\06-21-99\010F0801.D

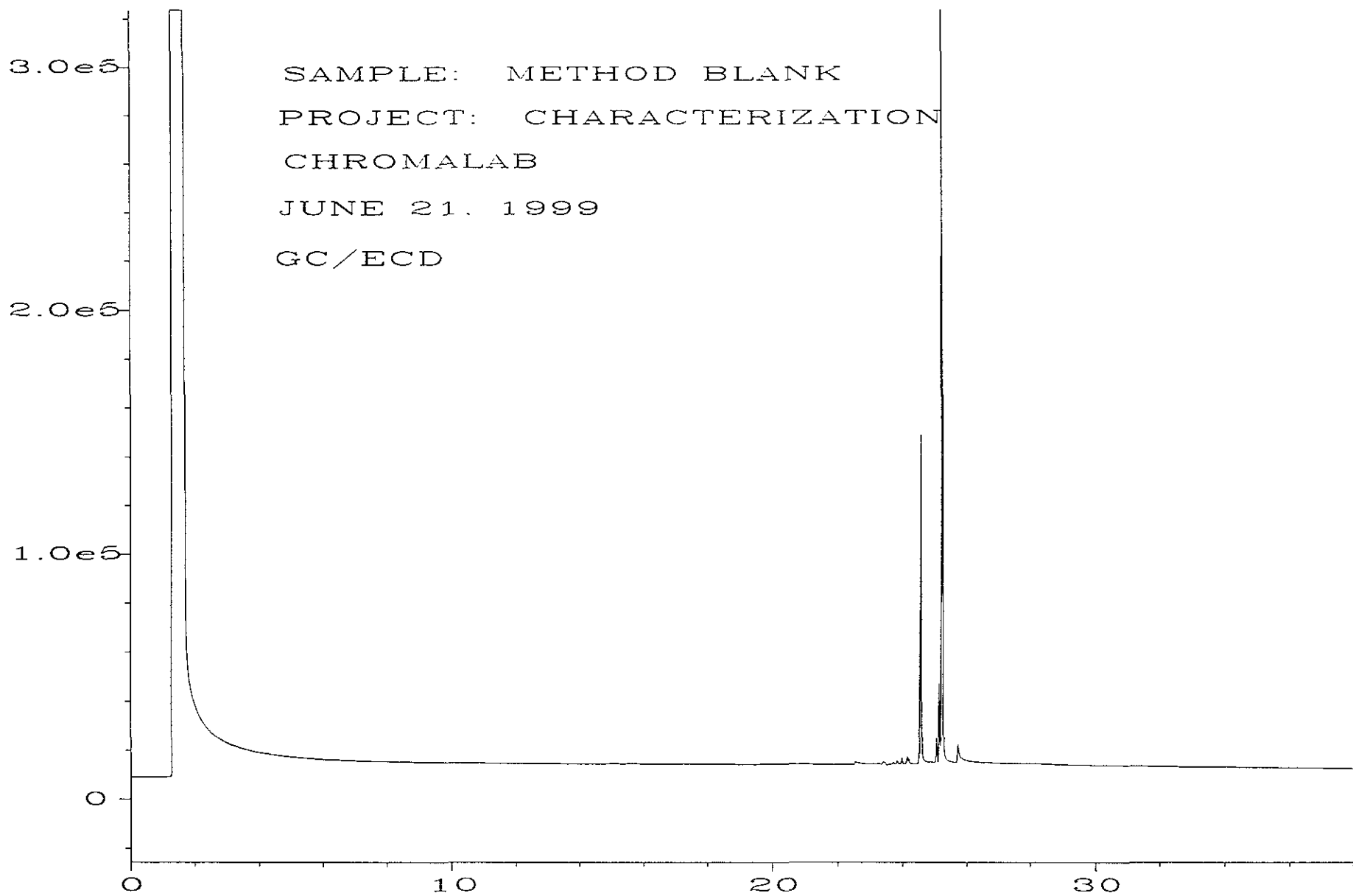


Fig. 2 in C:\HPCHEM\1\DATA\06-21-99\010R0801.D

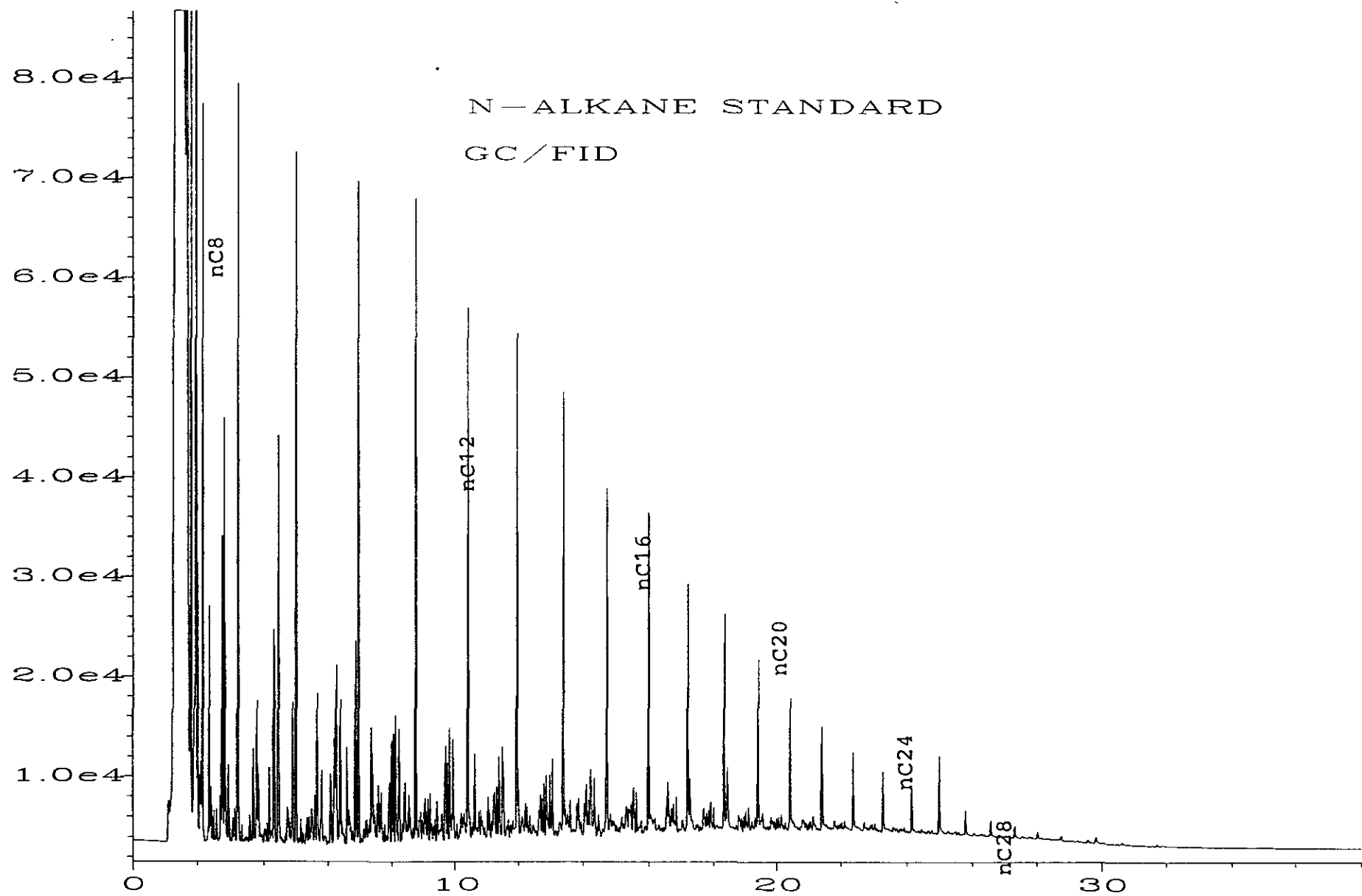


Fig. 1 in C:\HPCHEM\1\DATA\06-21-99\100F0401.D

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-08-0100

Date: August 16, 1999

*SOMA
99.7081*

SOMA

1260 B 45th St.
Emeryville, CA 94608

Attn.: Mr. Glenn Leong

Project: 1600 63rd Street

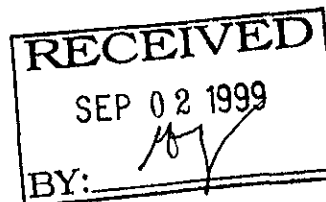
Dear Glenn,

Attached is our report for your samples received on Friday August 6, 1999.
This report has been reviewed and approved for release. Reproduction of this report
is permitted only in its entirety.

Please note that any unused portion of the samples will be discarded after September 5, 1999
unless you have requested otherwise. We appreciate the opportunity to be of service to you.
If you have any questions, please call me at (925) 484-1919.

Sincerely,

Sumner Sathur
Gary Cook



Gas/BTEX and MTBE

SOMA

☒ 1260 B 45th St.
Emeryville
CA 94608

Attn: Glenn Leong

Phone: (510) 654-3900 Fax: () -

Project #:

Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
HP-1-W	Water	08/05/1999 13:00	1
HP-2-W	Water	08/05/1999 12:00	2
HP-3-W	Water	08/06/1999 14:00	3
HP-4-W	Water	08/05/1999 12:45	4
HP-5-W	Water	08/05/1999 09:30	5

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-08-0100

To: SOMA
Attn.: Glenn Leong

Test Method: 8020
8015M
Prep Method: 5030

Gas/BTEX and MTBE

Sample ID: HP-1-W	Lab Sample ID: 1999-08-0100-001
Project: 1600 63rd Street	Received: 08/06/1999 17:00
Sampled: 08/05/1999 13:00	Extracted: 08/11/1999 16:07
Matrix: Water	QC-Batch: 1999/08/11-01.03

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Gasoline	ND	50	ug/L	1.00	08/11/1999 16:07	
Benzene	ND	0.50	ug/L	1.00	08/11/1999 16:07	
Toluene	ND	0.50	ug/L	1.00	08/11/1999 16:07	
Ethyl benzene	ND	0.50	ug/L	1.00	08/11/1999 16:07	
Xylene(s)	ND	0.50	ug/L	1.00	08/11/1999 16:07	
MTBE	ND	5.0	ug/L	1.00	08/11/1999 16:07	
Surrogate(s)						
Trifluorotoluene	118.8	58-124	%	1.00	08/11/1999 16:07	
4-Bromofluorobenzene-FID	112.6	50-150	%	1.00	08/11/1999 16:07	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-08-0100

To: SOMA

Test Method: 8020
8015M

Attn.: Glenn Leong

Prep Method: 5030

Gas/BTEX and MTBE

Sample ID: HP-2-W	Lab Sample ID: 1999-08-0100-002
Project: 1600 63rd Street	Received: 08/06/1999 17:00
Sampled: 08/05/1999 12:00	Extracted: 08/12/1999 12:39
Matrix: Water	QC-Batch: 1999/08/12-01.03

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Gasoline	3200	100	ug/L	2.00	08/12/1999 12:39	g
Benzene	ND	1.0	ug/L	2.00	08/12/1999 12:39	
Toluene	ND	1.0	ug/L	2.00	08/12/1999 12:39	
Ethyl benzene	ND	1.0	ug/L	2.00	08/12/1999 12:39	
Xylene(s)	ND	1.0	ug/L	2.00	08/12/1999 12:39	
MTBE	ND	10	ug/L	2.00	08/12/1999 12:39	
Surrogate(s)						
4-Bromofluorobenzene	110.8	50-150	%	1.00	08/12/1999 12:39	
4-Bromofluorobenzene-FID	214.9	50-150	%	1.00	08/12/1999 12:39	sh

To: SOMA

Test Method: 8020
8015M

Attn.: Glenn Leong

Prep Method: 5030

Gas/BTEX and MTBE

Sample ID: HP-3-W	Lab Sample ID: 1999-08-0100-003
Project: 1600 63rd Street	Received: 08/06/1999 17:00
Sampled: 08/06/1999 14:00	Extracted: 08/12/1999 13:06
Matrix: Water	QC-Batch: 1999/08/12-01.03

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Gasoline	5400	500	ug/L	10.00	08/12/1999 13:06	g
Benzene	ND	5.0	ug/L	10.00	08/12/1999 13:06	
Toluene	ND	5.0	ug/L	10.00	08/12/1999 13:06	
Ethyl benzene	ND	5.0	ug/L	10.00	08/12/1999 13:06	
Xylene(s)	ND	5.0	ug/L	10.00	08/12/1999 13:06	
MTBE	ND	50	ug/L	10.00	08/12/1999 13:06	
Surrogate(s)						
Trifluorotoluene	100.1	58-124	%	1.00	08/12/1999 13:06	
4-Bromofluorobenzene-FID	141.1	50-150	%	1.00	08/12/1999 13:06	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-08-0100

To: SOMA

Test Method: 8020
8015M

Attn.: Glenn Leong

Prep Method: 5030

Gas/BTEX and MTBE

Sample ID: HP-4-W	Lab Sample ID: 1999-08-0100-004
Project: 1600 63rd Street	Received: 08/06/1999 17:00
Sampled: 08/05/1999 12:45	Extracted: 08/09/1999 19:32
Matrix: Water	QC-Batch: 1999/08/09-01.03

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Gasoline	130	50	ug/L	1.00	08/09/1999 19:32	
Benzene	ND	0.50	ug/L	1.00	08/09/1999 19:32	
Toluene	1.0	0.50	ug/L	1.00	08/09/1999 19:32	
Ethyl benzene	0.82	0.50	ug/L	1.00	08/09/1999 19:32	
Xylene(s)	2.0	0.50	ug/L	1.00	08/09/1999 19:32	
MTBE	ND	5.0	ug/L	1.00	08/09/1999 19:32	
Surrogate(s)						
Trifluorotoluene	122.6	58-124	%	1.00	08/09/1999 19:32	
4-Bromofluorobenzene-FID	115.4	50-150	%	1.00	08/09/1999 19:32	

1220 Quarry Lane * Pleasanton, CA 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-08-0100

To: SOMA

Test Method: 8020
8015M

Attn.: Glenn Leong

Prep Method: 5030

Gas/BTEX and MTBE

Sample ID: HP-5-W	Lab Sample ID: 1999-08-0100-005
Project: 1600 63rd Street	Received: 08/06/1999 17:00
Sampled: 08/05/1999 09:30	Extracted: 08/12/1999 13:33
Matrix: Water	QC-Batch: 1999/08/11-01.03

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Gasoline	3000	500	ug/L	10.00	08/12/1999 13:33	g
Benzene	ND	5.0	ug/L	10.00	08/12/1999 13:33	
Toluene	ND	5.0	ug/L	10.00	08/12/1999 13:33	
Ethyl benzene	ND	5.0	ug/L	10.00	08/12/1999 13:33	
Xylene(s)	ND	5.0	ug/L	10.00	08/12/1999 13:33	
MTBE	ND	50	ug/L	10.00	08/12/1999 13:33	
Surrogate(s)						
Trifluorotoluene	86.5	58-124	%	1.00	08/12/1999 13:33	
4-Bromofluorobenzene-FID	134.8	50-150	%	1.00	08/12/1999 13:33	

1220 Quarry Lane * Pleasanton, CA 94566-4756
Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

To: SOMA

Test Method: 8015M
8020

Attn: Glenn Leong

Prep Method: 5030

Legend & Notes

Gas/BTEX and MTBE

Analyte Flags

g

Hydrocarbon reported in the gasoline range does not match our gasoline standard.

sh

Surrogate recoveries were higher than QC limits due to matrix interference.

Diesel

SOMA

✉ 1260 B 45th St.
Emeryville
CA 94608

Attn: Glenn Leong

Phone: (510) 654-3900 Fax: () -

Project #:

Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
HP-1-W	Water	08/05/1999 13:00	1
HP-2-W	Water	08/05/1999 12:00	2
HP-3-W	Water	08/06/1999 14:00	3
HP-4-W	Water	08/05/1999 12:45	4
HP-5-W	Water	08/05/1999 09:30	5

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-08-0100

To: SOMA
Attn.: Glenn Leong

Test Method: 8015m
Prep Method: 3510/8015M

Diesel

Sample ID: HP-1-W	Lab Sample ID: 1999-08-0100-001
Project: 1600 63rd Street	Received: 08/06/1999 17:00
Sampled: 08/05/1999 13:00	Extracted: 08/10/1999 10:09
Matrix: Water	QC-Batch: 1999/08/10-01.10

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Diesel	87	50	ug/L	1.00	05/10/1999 19:19	ndp
<i>Surrogate(s)</i> o-Terphenyl	65.6	60-130	%	1.00	05/10/1999 19:19	

1220 Quarry Lane * Pleasanton, CA 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-08-0100

To: **SOMA**
Attn.: Glenn Leong

Test Method: 8015m
Prep Method: 3510/8015M

Diesel

Sample ID: HP-2-W	Lab Sample ID: 1999-08-0100-002
Project: 1600 63rd Street	Received: 08/06/1999 17:00
Sampled: 08/05/1999 12:00	Extracted: 08/10/1999 10:09
Matrix: Water	QC-Batch: 1999/08/10-01.10
Sample/Analysis Flag: sdo (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Diesel	210000	2600	ug/L	51.00	05/12/1999 12:57	ndp
Surrogate(s) o-Terphenyl	ND	60-130	ug/L	50.00	05/12/1999 12:57	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-08-0100

To: SOMA
Attn.: Glenn Leong

Test Method: 8015m
Prep Method: 3510/8015M

Diesel

Sample ID: HP-3-W	Lab Sample ID: 1999-08-0100-003
Project: 1600 63rd Street	Received: 08/06/1999 17:00
Sampled: 08/06/1999 14 00	Extracted: 08/10/1999 10:09
Matrix: Water	QC-Batch: 1999/08/10-01.10
Sample/Analysis Flag: sdo (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Diesel	150000	5000	ug/L	100.00	05/12/1999 13:29	ndp
<i>Surrogate(s)</i> o-Terphenyl	ND	60-130	ug/L	100.00	05/12/1999 13:29	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-08-0100

To: **SOMA**
Attn.: Glenn Leong

Test Method: 8015m
Prep Method: 3510/8015M

Diesel

Sample ID: HP-4-W	Lab Sample ID: 1999-08-0100-004
Project: 1600 63rd Street	Received: 08/06/1999 17:00
Sampled: 08/05/1999 12:45	Extracted: 08/10/1999 10:09
Matrix: Water	QC-Batch: 1999/08/10-01.10
Sample/Analysis Flag: shc (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Diesel	2000	53	ug/L	1.10	08/10/1999 20:07	ndp
Surrogate(s) o-Terphenyl	155.8	60-130	%	1.00	08/10/1999 20:07	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-08-0100

To: SOMA
Attn: Glenn Leong

Test Method: 8015m
Prep Method: 3510/8015M

Diesel

Sample ID: HP-5-W	Lab Sample ID: 1999-08-0100-005
Project: 1600 63rd Street	Received: 08/06/1999 17:00
Sampled: 08/05/1999 09:30	Extracted: 08/10/1999 10:09
Matrix: Water	QC-Batch: 1999/08/10-01.10
Sample/Analysis Flag: sdo (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Diesel	5800000	50000	ug/L	1000.00	08/12/1999 14:01	ndp
<i>Surrogate(s)</i> o-Terphenyl	ND	60-130	ug/L	1000.00	08/12/1999 14:01	

To: **SOMA**
Attn: Glenn Leong

Test Method: 8015m
Prep Method: 3510/8015M

Legend & Notes

Diesel

Analysis Flags

sdo

Surrogate(s) diluted out

shc

Surrogate recoveries biased high due to hydrocarbon co-elution

Analyte Flags

ndp

Hydrocarbon reported does not match the pattern of our Diesel standard

CHROMALAB, INC.

99-08-0100
 1220 Quarry Lane • Pleasanton, California 94566-4756
 510/464-1919 • Facsimile 510/464-1096

Reference #: 47336
Chain of Custody

Environmental Services (SEP) (DOHS 1094)

DATE 8/6/99 PAGE 1 OF 1

PROJECT INFORMATION				SAMPLE RECEIPT				ANALYSIS REPORT																								
PROJECT NAME <u>1600 63rd Street</u>		PROJECT NUMBER		TOTAL NO OF CONTAINERS		LEAD SPACE		TEMPERATURE		CONFORMS TO RECORD		RELINQUISHED BY 1		RELINQUISHED BY 2		RELINQUISHED BY 3		RECEIVED BY 1		RECEIVED BY 2		RECEIVED BY (LABORATORY) 3										
P.O.#		TAX		STANDARD 3-DAY		24		48		72		OTHER		SIGNATURE (NAME)		SIGNATURE (NAME)		SIGNATURE (NAME)		SIGNATURE (NAME)		SIGNATURE (NAME)		SIGNATURE (NAME)								
Report: <input checked="" type="checkbox"/> Routine <input type="checkbox"/> Level 2 <input type="checkbox"/> Level 3 <input type="checkbox"/> Level 4				SPECIAL INSTRUCTIONS/COMMENTS				SIGNATURE (NAME)		PRINTED NAME (DATE)		COMPANY		SIGNATURE (NAME)		PRINTED NAME (DATE)		COMPANY		SIGNATURE (NAME)		PRINTED NAME (DATE)		COMPANY								
- Address reports to SOMA Corp.; cc: Azure Env.				- fax results to SOMA & Azure				SIGNATURE (NAME)		PRINTED NAME (DATE)		COMPANY		SIGNATURE (NAME)		PRINTED NAME (DATE)		COMPANY		SIGNATURE (NAME)		PRINTED NAME (DATE)		COMPANY								
- sample HP-5 contains product				- send VOA of HP-5 to Friedman & Brays for Hydrocarbon Precipitant				SIGNATURE (NAME)		PRINTED NAME (DATE)		COMPANY		SIGNATURE (NAME)		PRINTED NAME (DATE)		COMPANY		SIGNATURE (NAME)		PRINTED NAME (DATE)		COMPANY								
<table border="1"> <thead> <tr> <th>SAMPLE ID.</th> <th>DATE</th> <th>TIME</th> <th>MATRIX</th> <th>PRESERV.</th> <th>TPH IEPA 8015, 80201 (Cat #) <input checked="" type="checkbox"/> BTEX QUOTE PURGEABLE AROMATICS BTX (IEPA 8020)</th> <th>TPH Diesel (IEPA 8015M)</th> <th>TEPH (IEPA 8015M) Oxides, Diesel, D.M.G.</th> <th>PURGEABLE HALOCARBONS (VOCs) (EPA 8160 by 8260)</th> <th>VOLATILE ORGANICS (VOCs) (IEPA 8260)</th> <th>SEMI-VOLATILES (IEPA 8270)</th> <th>TOTAL OIL AND GREASE (SM 5520 B + F, E + F)</th> <th>TOTAL RECOVERABLE HYDROCARBONS (EPA 418.1)</th> <th><input type="checkbox"/> PCBs (IEPA 8060) <input type="checkbox"/> PCP's (IEPA 8060)</th> <th>PNA's by <input type="checkbox"/> 8270 <input type="checkbox"/> 8310</th> <th><input type="checkbox"/> Hg <input type="checkbox"/> Spec. Cond. <input type="checkbox"/> TSS <input type="checkbox"/> TDS</th> <th>LUFT METALS: Cd, Cr, Pb, Ni, Zn</th> <th>CAM 17 METALS (EPA 8210/8270/8271)</th> <th>TOTAL LEAD <input type="checkbox"/> W.B.T. <input type="checkbox"/> T.C.P.</th> <th>Hold</th> <th>NUMBER OF CONTAINERS</th> </tr> </thead> </table>				SAMPLE ID.	DATE	TIME	MATRIX	PRESERV.	TPH IEPA 8015, 80201 (Cat #) <input checked="" type="checkbox"/> BTEX QUOTE PURGEABLE AROMATICS BTX (IEPA 8020)	TPH Diesel (IEPA 8015M)	TEPH (IEPA 8015M) Oxides, Diesel, D.M.G.	PURGEABLE HALOCARBONS (VOCs) (EPA 8160 by 8260)	VOLATILE ORGANICS (VOCs) (IEPA 8260)	SEMI-VOLATILES (IEPA 8270)	TOTAL OIL AND GREASE (SM 5520 B + F, E + F)	TOTAL RECOVERABLE HYDROCARBONS (EPA 418.1)	<input type="checkbox"/> PCBs (IEPA 8060) <input type="checkbox"/> PCP's (IEPA 8060)	PNA's by <input type="checkbox"/> 8270 <input type="checkbox"/> 8310	<input type="checkbox"/> Hg <input type="checkbox"/> Spec. Cond. <input type="checkbox"/> TSS <input type="checkbox"/> TDS	LUFT METALS: Cd, Cr, Pb, Ni, Zn	CAM 17 METALS (EPA 8210/8270/8271)	TOTAL LEAD <input type="checkbox"/> W.B.T. <input type="checkbox"/> T.C.P.	Hold	NUMBER OF CONTAINERS	<table border="1"> <thead> <tr> <th>SAMPLERS (SIGNATURE)</th> <th>(PHONE NO.)</th> </tr> </thead> <tbody> <tr> <td><u>Bennell</u></td> <td></td> </tr> <tr> <td></td> <td>(FAX NO.)</td> </tr> </tbody> </table>		SAMPLERS (SIGNATURE)	(PHONE NO.)	<u>Bennell</u>			(FAX NO.)
SAMPLE ID.	DATE	TIME	MATRIX	PRESERV.	TPH IEPA 8015, 80201 (Cat #) <input checked="" type="checkbox"/> BTEX QUOTE PURGEABLE AROMATICS BTX (IEPA 8020)	TPH Diesel (IEPA 8015M)	TEPH (IEPA 8015M) Oxides, Diesel, D.M.G.	PURGEABLE HALOCARBONS (VOCs) (EPA 8160 by 8260)	VOLATILE ORGANICS (VOCs) (IEPA 8260)	SEMI-VOLATILES (IEPA 8270)	TOTAL OIL AND GREASE (SM 5520 B + F, E + F)	TOTAL RECOVERABLE HYDROCARBONS (EPA 418.1)	<input type="checkbox"/> PCBs (IEPA 8060) <input type="checkbox"/> PCP's (IEPA 8060)	PNA's by <input type="checkbox"/> 8270 <input type="checkbox"/> 8310	<input type="checkbox"/> Hg <input type="checkbox"/> Spec. Cond. <input type="checkbox"/> TSS <input type="checkbox"/> TDS	LUFT METALS: Cd, Cr, Pb, Ni, Zn	CAM 17 METALS (EPA 8210/8270/8271)	TOTAL LEAD <input type="checkbox"/> W.B.T. <input type="checkbox"/> T.C.P.	Hold	NUMBER OF CONTAINERS												
SAMPLERS (SIGNATURE)	(PHONE NO.)																															
<u>Bennell</u>																																
	(FAX NO.)																															
HP-1-W	8/5/99	1300	H ₂ O	HCl	X	X																4										
HP-2-W	"	1200																				4										
HP-3-W	8/6/99	1400																														
HP-4-W	8/5/99	1245																														
HP-5-W	"	930																														
HP-5-16'	"	910	soil	-																X		1										

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

James E. Bruya, Ph.D.
Charlene Jensen, M.S.
Bradley T. Benson, B.S.
Kurt Johnson, B.S.

3012 16th Avenue West
Seattle, WA 98119-2029
TEL: (206) 285-8282
FAX: (206) 283-5044
e-mail: fbi@isomedia.com

August 24, 1999

Gary Cook, Project Manager
Chromalab, Inc.
1220 Quarry Lane
Pleasanton, CA 94566-4756

Dear Mr. Cook:


Included are the results from the analytical testing of material submitted on August 10, 1999 from your 1999-08-0100 project. The sample submitted for forensic evaluation arrived in good condition. Upon its arrival, sample HP-5-W was assigned our laboratory project number 908048 and was placed in a refrigerator where it was maintained at 4°C until removed for sample processing.

The purpose of our investigation was to identify the material present in the sample. In order to make this determination the sample was extracted and analyzed using a gas chromatograph with a flame ionization detector (GC/FID) and an electron capture detector (ECD). The data generated yielded information on the boiling range and general chemical composition of the material present. Based on this information, the material was identified. The GC/FID and GC/ECD traces are enclosed. A GC/FID trace of a standard consisting of normal alkanes is also provided for reference purposes.

Please contact us if additional consultation is needed by our firm in the interpretation of the analytical results provided. We appreciate this opportunity to be of service to you and hope you will call if you should have any questions. We will hold your samples for 30 days before disposal unless directed otherwise.

Sincerely,

FRIEDMAN & BRUYA, INC.


Kurt Johnson
Chemist

Enclosures
NAA0824R.DOC

Date of Report: 08/24/99
Date Received: 08/10/99
Project: 1999-08-0100
Date Extracted: 08/11/99
Date Analyzed: 08/11/99

**RESULTS FROM THE ANALYSIS OF THE WATER/SHEEN SAMPLE
FOR FORENSIC EVALUATION
BY CAPILLARY GAS CHROMATOGRAPHY
USING A FLAME IONIZATION DETECTOR (FID)
AND ELECTRON CAPTURE DETECTOR (ECD)**

Sample ID

GC Characterization

HP-5-W

The GC trace using the flame ionization detector (FID) showed the presence of low, medium and high boiling compounds. The patterns displayed by these peaks are indicative of degraded Bunker C or Crude Oil.

The material appeared on the GC/FID trace as a ragged pattern of peaks on top of a broad hump. This material elutes from approximately *n*-C₇ to beyond *n*-C₃₂ showing a maximum near *n*-C₁₆. The prominent peaks present on the GC /FID trace are characteristic of isoprenoids including norpristane, pristane, and phytane. The GC/FID trace did not show discernible peaks characteristic of the normal alkanes. The low level or absence of normal alkanes in conjunction with abundant isoprenoids indicates that the product present has undergone extensive biological degradation. The GC/ECD trace showed an absence of peaks which are characteristic of halogenated compounds, alkyl lead species, and PCB's.

The large peak seen near 25 minutes on the GC/FID trace is pentacosane, added as a quality assurance check for this GC analysis. There is a second surrogate present that is seen on the GC/ECD trace at about 26 minutes which is dibutyl chlorendate.

908048

CHROMALAB, INC.

Environmental Services (SDB) (DOIIS 1094)

Lab: Friedman & Bruya

1220 Quarry Lane • Pleasanton, California 94566-4756
510/484-1919 • Facsimile 510/484-1096

925-484-1919

1078 8-10-99 B02

Sub-Contract

Chain of Custody

DATE 8/6/99 PAGE 1 OF 1

ANALYSIS REPORT

PROJECT NAME Gary Cook
 COMPANY Chromalab
 ADDRESS _____
 SAMPLE ID(S) (SIGNATURE) _____ (PHONE NO.) _____
 (FAX NO.) _____

Hydrocarbon
Fingerprint
by GC/FID

SAMPLE ID.	DATE	TIME	MATRIX	PRESERV.	Hydrocarbon Fingerprint by GC/FID	Chromalab Reference or Submission Number(s)	NUMBER OF CONTAINERS
01 HP-5-W	8/5/99	0930	H2O		X		1

PROJECT INFORMATION		SAMPLE RECEIPT				
PROJECT NAME		TOTAL NO OF CONTAINERS				
PROJECT NUMBER		HEAD SPACE				
1999-08-0100		RECD GOOD CONDITION/COLD				
P.O. #		CONFORMS TO RECORD				
TAT	STANDARD 5-DAY	24	48	72	OTHER	
SPECIAL INSTRUCTIONS/COMMENTS						
Standard TAT						

RELIQUISHED BY	1	RELIQUISHED BY	2	RELIQUISHED BY	3
<u>Denise Harrington</u>					
(SIGNATURE)	(DATE)	(SIGNATURE)	(DATE)	(SIGNATURE)	(DATE)
<u>D. Harrington</u>	<u>1200</u>				
(PRINTED NAME)	(DATE)	(PRINTED NAME)	(DATE)	(PRINTED NAME)	(DATE)
<u>Chromalab</u>	<u>8/9/99</u>				
(COMPANY)		(COMPANY)		(COMPANY)	
RECEIVED BY	1	RECEIVED BY	2	RECEIVED BY (LABORATORY)	3
<u>S. Osborn</u>					
(SIGNATURE)	(DATE)	(SIGNATURE)	(DATE)	(SIGNATURE)	(DATE)
<u>S. Osborn</u>	<u>9:30A</u>				
(PRINTED NAME)	(DATE)	(PRINTED NAME)	(DATE)	(PRINTED NAME)	(DATE)
<u>F&B, Inc.</u>	<u>8/19/99</u>				
(COMPANY)		(COMPANY)		(COMPANY)	

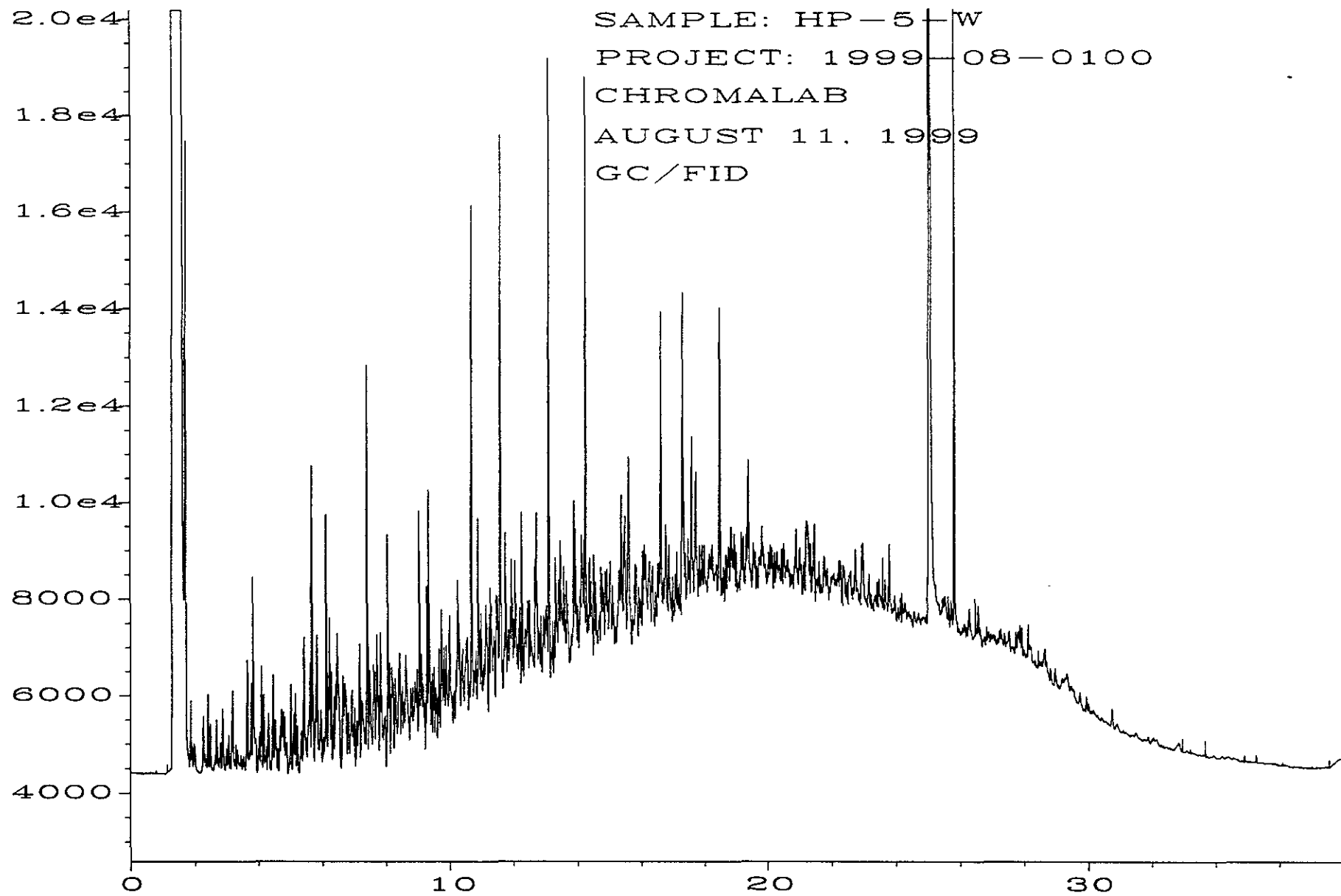


Fig. 1 in C:\HPCHEM\1\DATA\08-11-99\005F0601.D

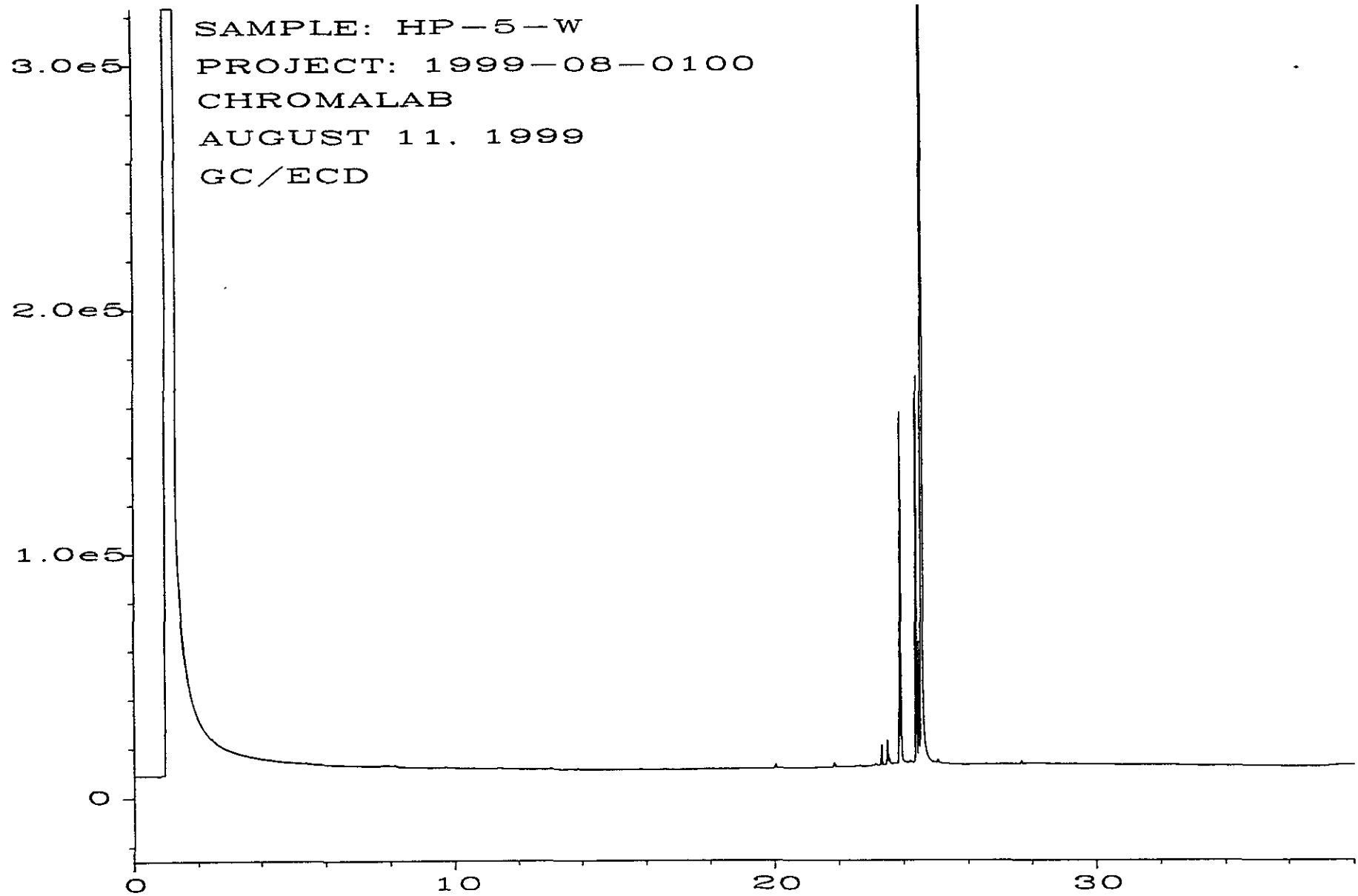


Fig. 2 in C:\HPCHEM\1\DATA\08-11-99\005R0601.D

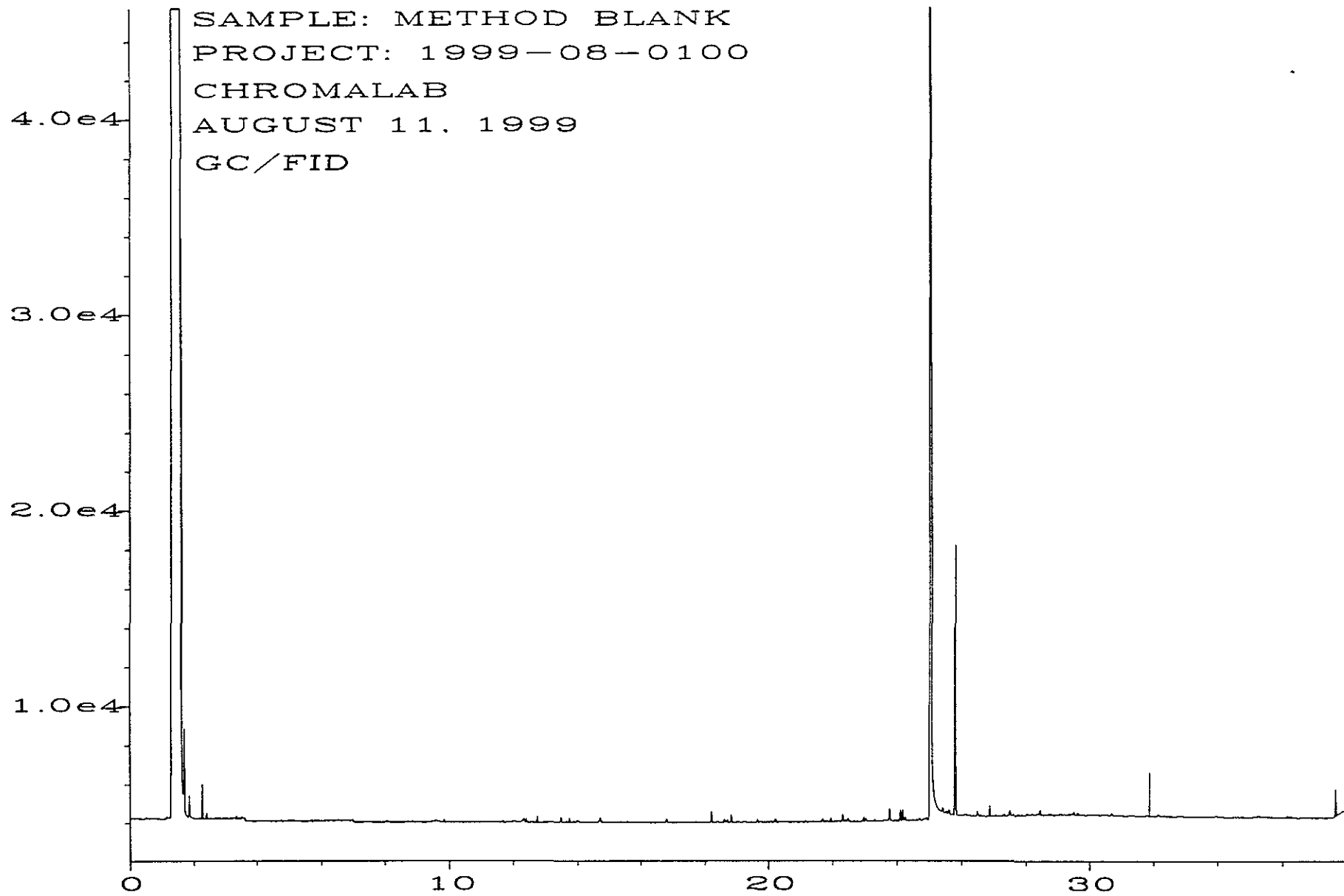


Fig. 1 in C:\HPCHEM\1\DATA\08-11-99\002F0401.D

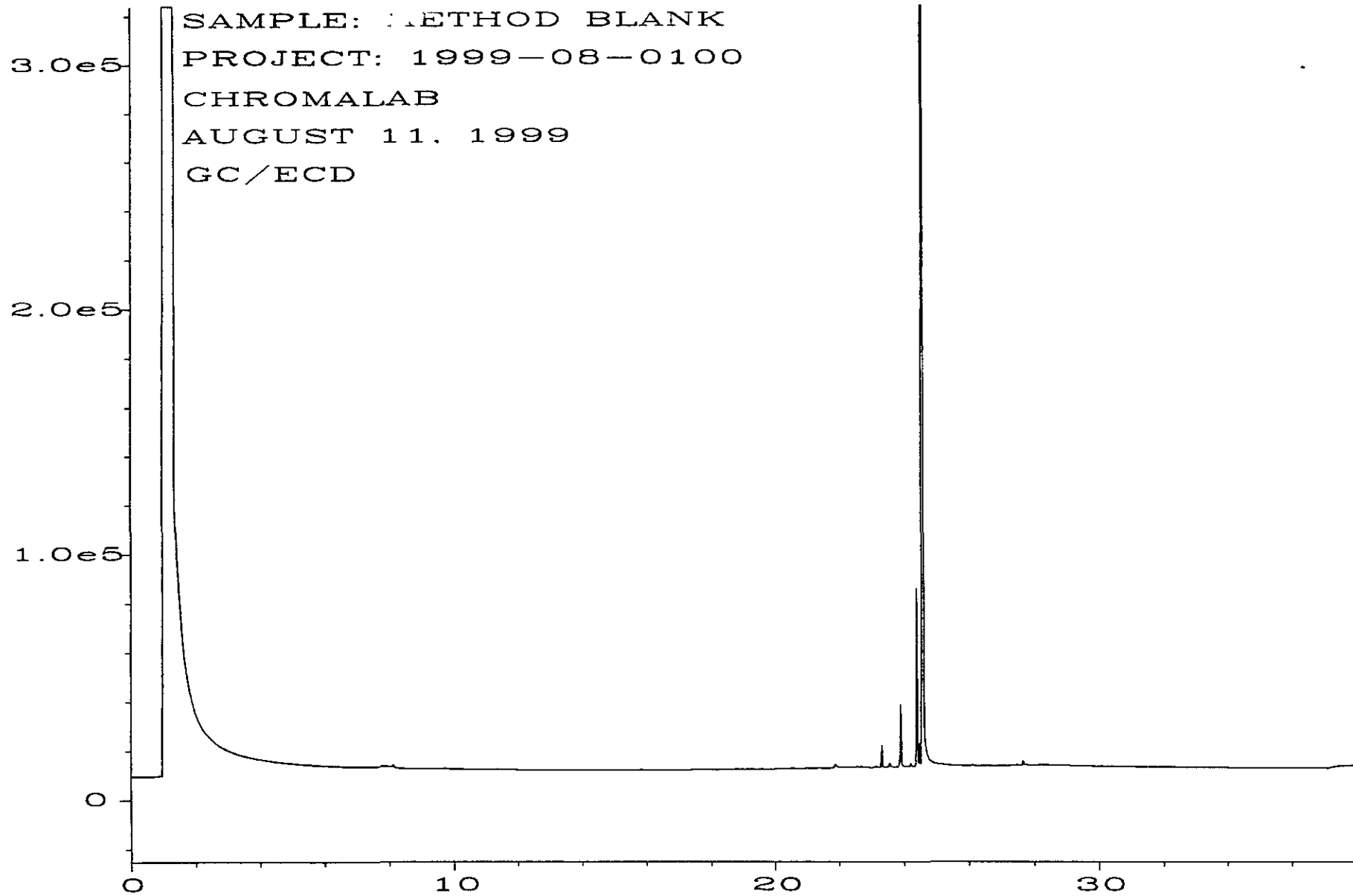


Fig. 2 in C:\HPCHEM\1\DATA\08-11-99\002R0401.D

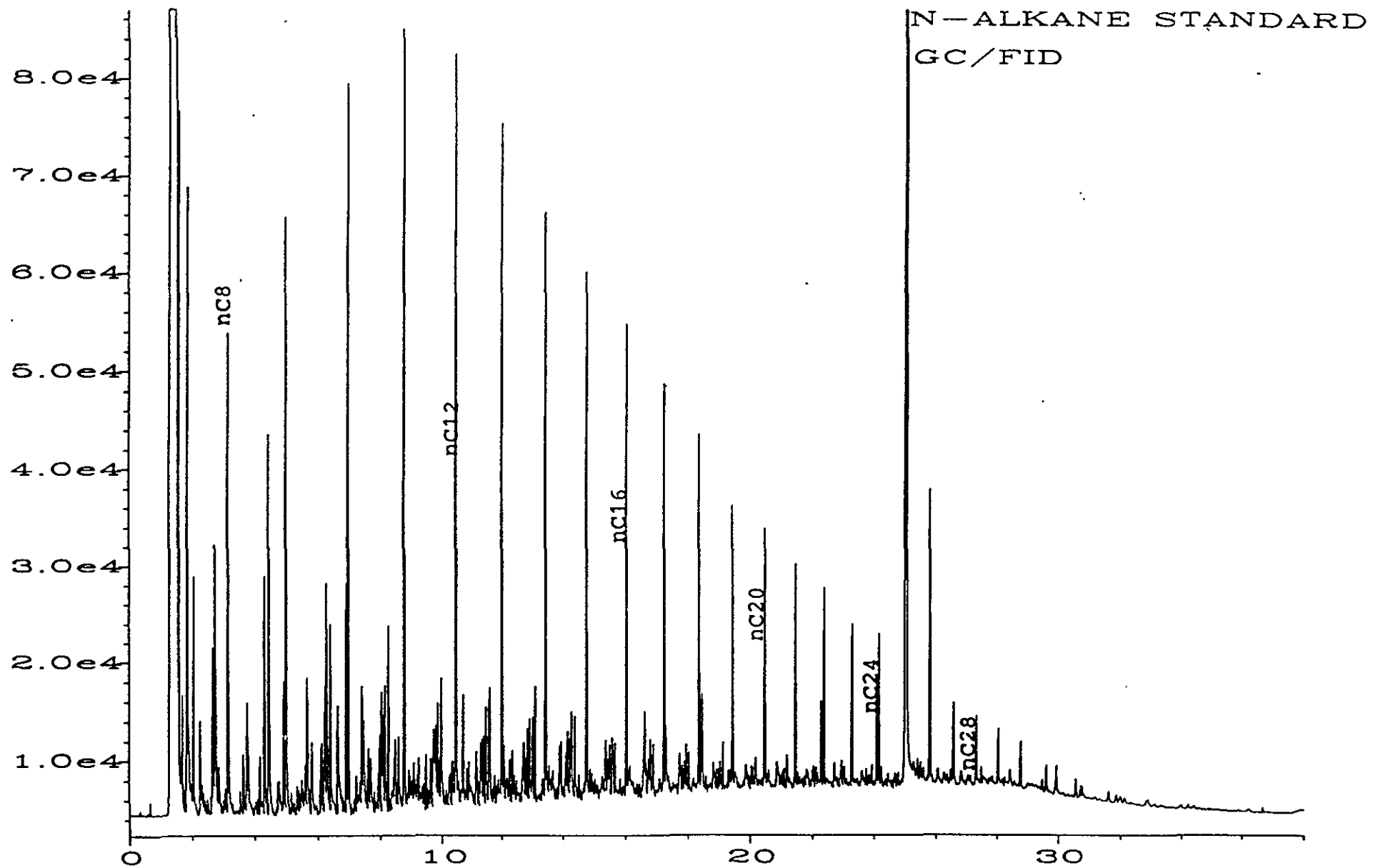


Fig. 1 in C:\HPCHEM\1\DATA\08-11-99\100F0301.D

SOMA

1260 B 45th St.
Emeryville, CA 94608

Attn.: Mr. Glenn Leong

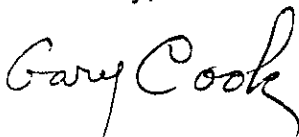
Project: 151-002
1600 63rd Street

Dear Glenn,

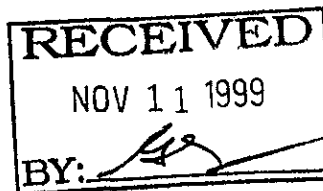
Attached is our report for your samples received on Friday October 22, 1999. This report has been reviewed and approved for release. Reproduction of this report is permitted only in its entirety.

Please note that any unused portion of the samples will be discarded after November 21, 1999 unless you have requested otherwise. We appreciate the opportunity to be of service to you. If you have any questions, please call me at (925) 484-1919.

Sincerely,



Gary Cook



Halogenated Volatile Organic Compounds

SOMA	☒ 1260 B 45th St. Emeryville, CA 94608
Attn: Glenn Leong	Phone: (510) 654-3900 Fax: () -
Project #: 151-002	Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
CPT-1-1W	Water	10/21/1999 15:00	1
CPT-1-2W	Water	10/21/1999 18:00	2

To: **SOMA**
 Attn.: Glenn Leong

Test Method: 8010
 Prep Method: 5030

Halogenated Volatile Organic Compounds

Sample ID: CPT-1-1W	Lab Sample ID: 1999-10-0408-001
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 15:00	Extracted: 10/26/1999 19:03
Matrix: Water	QC-Batch: 1999/10/26-01.25

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Dichlorodifluoromethane	ND	1.0	ug/L	1.00	10/26/1999 19:03	
Vinyl chloride	ND	0.50	ug/L	1.00	10/26/1999 19:03	
Chloroethane	ND	0.50	ug/L	1.00	10/26/1999 19:03	
Trichlorofluoromethane	ND	0.50	ug/L	1.00	10/26/1999 19:03	
1,1-Dichloroethene	ND	0.50	ug/L	1.00	10/26/1999 19:03	
Methylene chloride	ND	5.0	ug/L	1.00	10/26/1999 19:03	
trans-1,2-Dichloroethene	ND	0.50	ug/L	1.00	10/26/1999 19:03	
cis-1,2-Dichloroethene	ND	0.50	ug/L	1.00	10/26/1999 19:03	
1,1-Dichloroethane	ND	0.50	ug/L	1.00	10/26/1999 19:03	
Chloroform	ND	3.0	ug/L	1.00	10/26/1999 19:03	
1,1,1-Trichloroethane	ND	0.50	ug/L	1.00	10/26/1999 19:03	
Carbon tetrachloride	ND	0.50	ug/L	1.00	10/26/1999 19:03	
1,2-Dichloroethane	ND	0.50	ug/L	1.00	10/26/1999 19:03	
Trichloroethene	ND	0.50	ug/L	1.00	10/26/1999 19:03	
1,2-Dichloropropane	ND	0.50	ug/L	1.00	10/26/1999 19:03	
Bromodichloromethane	ND	0.50	ug/L	1.00	10/26/1999 19:03	
2-Chloroethylvinyl ether	ND	0.50	ug/L	1.00	10/26/1999 19:03	
trans-1,3-Dichloropropene	ND	0.50	ug/L	1.00	10/26/1999 19:03	
cis-1,3-Dichloropropene	ND	0.50	ug/L	1.00	10/26/1999 19:03	
1,1,2-Trichloroethane	ND	0.50	ug/L	1.00	10/26/1999 19:03	
Tetrachloroethene	ND	0.50	ug/L	1.00	10/26/1999 19:03	
Dibromochloromethane	ND	0.50	ug/L	1.00	10/26/1999 19:03	
Chlorobenzene	1.1	0.50	ug/L	1.00	10/26/1999 19:03	
Bromoform	ND	2.0	ug/L	1.00	10/26/1999 19:03	
1,1,2,2-Tetrachloroethane	ND	0.50	ug/L	1.00	10/26/1999 19:03	
1,3-Dichlorobenzene	ND	0.50	ug/L	1.00	10/26/1999 19:03	
1,4-Dichlorobenzene	ND	0.50	ug/L	1.00	10/26/1999 19:03	
1,2-Dichlorobenzene	ND	0.50	ug/L	1.00	10/26/1999 19:03	
Trichlorotrifluoroethane	ND	2.0	ug/L	1.00	10/26/1999 19:03	
Chloromethane	ND	1.0	ug/L	1.00	10/26/1999 19:03	
Bromomethane	ND	1.0	ug/L	1.00	10/26/1999 19:03	
Surrogate(s)						
1-Chloro-2-fluorobenzene	76.9	50-150	%	1.00	10/26/1999 19:03	

To: **SOMA**
Attn.: Glenn Leong

Test Method: 8010
Prep Method: 5030

Halogenated Volatile Organic Compounds

Sample ID: CPT-1-2W	Lab Sample ID: 1999-10-0408-002
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 18:00	Extracted: 10/26/1999 19:55
Matrix: Water	QC-Batch: 1999/10/26-01.25

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Dichlorodifluoromethane	ND	1.0	ug/L	1.00	10/26/1999 19:55	
Vinyl chloride	ND	0.50	ug/L	1.00	10/26/1999 19:55	
Chloroethane	ND	0.50	ug/L	1.00	10/26/1999 19:55	
Trichlorofluoromethane	ND	0.50	ug/L	1.00	10/26/1999 19:55	
1,1-Dichloroethene	ND	0.50	ug/L	1.00	10/26/1999 19:55	
Methylene chloride	ND	5.0	ug/L	1.00	10/26/1999 19:55	
trans-1,2-Dichloroethene	ND	0.50	ug/L	1.00	10/26/1999 19:55	
cis-1,2-Dichloroethene	ND	0.50	ug/L	1.00	10/26/1999 19:55	
1,1-Dichloroethane	ND	0.50	ug/L	1.00	10/26/1999 19:55	
Chloroform	ND	3.0	ug/L	1.00	10/26/1999 19:55	
1,1,1-Trichloroethane	ND	0.50	ug/L	1.00	10/26/1999 19:55	
Carbon tetrachloride	ND	0.50	ug/L	1.00	10/26/1999 19:55	
1,2-Dichloroethane	ND	0.50	ug/L	1.00	10/26/1999 19:55	
Trichloroethene	ND	0.50	ug/L	1.00	10/26/1999 19:55	
1,2-Dichloropropane	ND	0.50	ug/L	1.00	10/26/1999 19:55	
Bromodichloromethane	ND	0.50	ug/L	1.00	10/26/1999 19:55	
2-Chloroethylvinyl ether	ND	0.50	ug/L	1.00	10/26/1999 19:55	
trans-1,3-Dichloropropene	ND	0.50	ug/L	1.00	10/26/1999 19:55	
cis-1,3-Dichloropropene	ND	0.50	ug/L	1.00	10/26/1999 19:55	
1,1,2-Trichloroethane	ND	0.50	ug/L	1.00	10/26/1999 19:55	
Tetrachloroethene	ND	0.50	ug/L	1.00	10/26/1999 19:55	
Dibromochloromethane	ND	0.50	ug/L	1.00	10/26/1999 19:55	
Chlorobenzene	ND	0.50	ug/L	1.00	10/26/1999 19:55	
Bromoform	ND	2.0	ug/L	1.00	10/26/1999 19:55	
1,1,2,2-Tetrachloroethane	ND	0.50	ug/L	1.00	10/26/1999 19:55	
1,3-Dichlorobenzene	ND	0.50	ug/L	1.00	10/26/1999 19:55	
1,4-Dichlorobenzene	ND	0.50	ug/L	1.00	10/26/1999 19:55	
1,2-Dichlorobenzene	ND	0.50	ug/L	1.00	10/26/1999 19:55	
Trichlorotrifluoroethane	ND	2.0	ug/L	1.00	10/26/1999 19:55	
Chloromethane	ND	1.0	ug/L	1.00	10/26/1999 19:55	
Bromomethane	ND	1.0	ug/L	1.00	10/26/1999 19:55	
Surrogate(s)						
1-Chloro-2-fluorobenzene	73.3	50-150	%	1.00	10/26/1999 19:55	

To: **SOMA**
 Attn.: Glenn Leong

Test Method: 8010
 Prep Method: 5030

Batch QC Report
 Halogenated Volatile Organic Compounds

Method Blank	Water	QC Batch # 1999/10/26-01.25
MB: 1999/10/26-01.25-001		Date Extracted: 10/26/1999 09:17

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Dichlorodifluoromethane	ND	1.0	ug/L	10/26/1999 09:17	
Vinyl chloride	ND	0.5	ug/L	10/26/1999 09:17	
Chloroethane	ND	0.5	ug/L	10/26/1999 09:17	
Trichlorofluoromethane	ND	0.5	ug/L	10/26/1999 09:17	
1,1-Dichloroethene	ND	0.5	ug/L	10/26/1999 09:17	
Methylene chloride	ND	5.0	ug/L	10/26/1999 09:17	
trans-1,2-Dichloroethene	ND	0.5	ug/L	10/26/1999 09:17	
cis-1,2-Dichloroethene	ND	0.5	ug/L	10/26/1999 09:17	
1,1-Dichloroethane	ND	0.5	ug/L	10/26/1999 09:17	
Chloroform	ND	3.0	ug/L	10/26/1999 09:17	
1,1,1-Trichloroethane	ND	0.5	ug/L	10/26/1999 09:17	
Carbon tetrachloride	ND	0.5	ug/L	10/26/1999 09:17	
1,2-Dichloroethane	ND	0.5	ug/L	10/26/1999 09:17	
Trichloroethene	ND	0.5	ug/L	10/26/1999 09:17	
1,2-Dichloropropane	ND	0.5	ug/L	10/26/1999 09:17	
Bromodichloromethane	ND	0.5	ug/L	10/26/1999 09:17	
2-Chloroethylvinyl ether	ND	0.5	ug/L	10/26/1999 09:17	
trans-1,3-Dichloropropene	ND	0.5	ug/L	10/26/1999 09:17	
cis-1,3-Dichloropropene	ND	0.5	ug/L	10/26/1999 09:17	
1,1,2-Trichloroethane	ND	0.5	ug/L	10/26/1999 09:17	
Tetrachloroethene	ND	0.5	ug/L	10/26/1999 09:17	
Dibromochloromethane	ND	0.5	ug/L	10/26/1999 09:17	
Chlorobenzene	ND	0.5	ug/L	10/26/1999 09:17	
Bromoform	ND	2.0	ug/L	10/26/1999 09:17	
1,1,2,2-Tetrachloroethane	ND	0.5	ug/L	10/26/1999 09:17	
1,3-Dichlorobenzene	ND	0.5	ug/L	10/26/1999 09:17	
1,4-Dichlorobenzene	ND	0.5	ug/L	10/26/1999 09:17	
1,2-Dichlorobenzene	ND	0.5	ug/L	10/26/1999 09:17	
Trichlorotrifluoroethane	ND	2.0	ug/L	10/26/1999 09:17	
Chloromethane	ND	1.0	ug/L	10/26/1999 09:17	
Bromomethane	ND	1.0	ug/L	10/26/1999 09:17	
Surrogate(s)					
1-Chloro-2-fluorobenzene	76.5	50-150	%	10/26/1999 09:17	

To: **SOMA**
 Attn: Glenn Leong

Test Method: 8010
 Prep Method: 5030

Batch QC Report

Halogenated Volatile Organic Compounds

Laboratory Control Spike (LCS/LCSD)	Water	QC Batch # 1999/10/26-01.25
LCS: 1999/10/26-01.25-002	Extracted: 10/26/1999 10:11	Analyzed: 10/26/1999 10:11
LCSD: 1999/10/26-01.25-003	Extracted: 10/26/1999 11:04	Analyzed: 10/26/1999 11:04

Compound	Conc. [ug/L]		Exp.Conc. [ug/L]		Recovery [%]		RPD [%]	Ctrl. Limits [%]		Flags	
	LCS	LCSD	LCS	LCSD	LCS	LCSD		Recovery	RPD	LCS	LCSD
1,1-Dichloroethene	19.5	19.2	20.0	20.0	97.5	96.0	1.6	50-140	20		
Trichloroethene	19.3	19.3	20.0	20.0	96.5	96.5	0.0	50-150	20		
Chlorobenzene	19.2	19.1	20.0	20.0	96.0	95.5	0.5	50-150	20		
Surrogate(s)											
1-Chloro-2-fluorobenzene	16.5	16.8	20	20	82.5	84.0		50-150			

Semi-volatile Organic Compounds

SOMA	☒ 1260 B 45th St. Emeryville, CA 94608
Attn: Glenn Leong	Phone: (510) 654-3900 Fax: () -
Project #: 151-002	Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
CPT-1-1W	Water	10/21/1999 15:00	1
CPT-1-2W	Water	10/21/1999 18:00	2

To: **SOMA**
 Attn.: Glenn Leong

Test Method: 8270A
 Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: CPT-1-1W	Lab Sample ID: 1999-10-0408-001
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 15:00	Extracted: 10/25/1999 15:58
Matrix: Water	QC-Batch: 1999/10/25-01.11
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Phenol	ND	20	ug/L	10.00	10/27/1999 01:03	
Bis(2-chloroethyl)ether	ND	20	ug/L	10.00	10/27/1999 01:03	
2-Chlorophenol	ND	20	ug/L	10.00	10/27/1999 01:03	
1,3-Dichlorobenzene	ND	20	ug/L	10.00	10/27/1999 01:03	
1,4-Dichlorobenzene	ND	20	ug/L	10.00	10/27/1999 01:03	
Benzyl alcohol	ND	50	ug/L	10.00	10/27/1999 01:03	
1,2-Dichlorobenzene	ND	20	ug/L	10.00	10/27/1999 01:03	
2-Methylphenol	ND	20	ug/L	10.00	10/27/1999 01:03	
Bis(2-chloroisopropyl) ether	ND	20	ug/L	10.00	10/27/1999 01:03	
4-Methylphenol	ND	20	ug/L	10.00	10/27/1999 01:03	
N-Nitroso-di-n-propylamine	ND	20	ug/L	10.00	10/27/1999 01:03	
Hexachloroethane	ND	20	ug/L	10.00	10/27/1999 01:03	
Nitrobenzene	ND	20	ug/L	10.00	10/27/1999 01:03	
Isophorone	ND	20	ug/L	10.00	10/27/1999 01:03	
2-Nitrophenol	ND	20	ug/L	10.00	10/27/1999 01:03	
2,4-Dimethylphenol	ND	20	ug/L	10.00	10/27/1999 01:03	
Bis(2-chloroethoxy) methane	ND	50	ug/L	10.00	10/27/1999 01:03	
2,4-Dichlorophenol	ND	20	ug/L	10.00	10/27/1999 01:03	
1,2,4-Trichlorobenzene	ND	20	ug/L	10.00	10/27/1999 01:03	
Naphthalene	ND	20	ug/L	10.00	10/27/1999 01:03	
4-Chloroaniline	ND	20	ug/L	10.00	10/27/1999 01:03	
Hexachlorobutadiene	ND	20	ug/L	10.00	10/27/1999 01:03	
4-Chloro-3-methylphenol	ND	50	ug/L	10.00	10/27/1999 01:03	
2-Methylnaphthalene	ND	20	ug/L	10.00	10/27/1999 01:03	
Hexachlorocyclopentadiene	ND	20	ug/L	10.00	10/27/1999 01:03	
2,4,6-Trichlorophenol	ND	20	ug/L	10.00	10/27/1999 01:03	
2,4,5-Trichlorophenol	ND	20	ug/L	10.00	10/27/1999 01:03	
2-Chloronaphthalene	ND	20	ug/L	10.00	10/27/1999 01:03	
2-Nitroaniline	ND	100	ug/L	10.00	10/27/1999 01:03	
Dimethyl phthalate	ND	50	ug/L	10.00	10/27/1999 01:03	
Acenaphthylene	ND	20	ug/L	10.00	10/27/1999 01:03	
3-Nitroaniline	ND	100	ug/L	10.00	10/27/1999 01:03	
Acenaphthene	ND	20	ug/L	10.00	10/27/1999 01:03	

To: **SOMA**
 Attn.: Glenn Leong

Test Method: 8270A
 Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: CPT-1-1W	Lab Sample ID: 1999-10-0408-001
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 15:00	Extracted: 10/25/1999 15:58
Matrix: Water	QC-Batch: 1999/10/25-01.11
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
2,4-Dinitrophenol	ND	100	ug/L	10.00	10/27/1999 01:03	
4-Nitrophenol	ND	100	ug/L	10.00	10/27/1999 01:03	
Dibenzofuran	ND	20	ug/L	10.00	10/27/1999 01:03	
2,4-Dinitrotoluene	ND	20	ug/L	10.00	10/27/1999 01:03	
2,6-Dinitrotoluene	ND	50	ug/L	10.00	10/27/1999 01:03	
Diethyl phthalate	ND	50	ug/L	10.00	10/27/1999 01:03	
4-Chlorophenyl phenyl ether	ND	20	ug/L	10.00	10/27/1999 01:03	
Fluorene	ND	50	ug/L	10.00	10/27/1999 01:03	
4-Nitroaniline	ND	100	ug/L	10.00	10/27/1999 01:03	
2-Methyl-4,6-dinitrophenol	ND	100	ug/L	10.00	10/27/1999 01:03	
N-Nitrosodiphenylamine	ND	20	ug/L	10.00	10/27/1999 01:03	
4-Bromophenyl phenyl ether	ND	50	ug/L	10.00	10/27/1999 01:03	
Hexachlorobenzene	ND	20	ug/L	10.00	10/27/1999 01:03	
Pentachlorophenol	ND	100	ug/L	10.00	10/27/1999 01:03	
Phenanthrene	ND	20	ug/L	10.00	10/27/1999 01:03	
Anthracene	ND	20	ug/L	10.00	10/27/1999 01:03	
Di-n-butyl phthalate	ND	50	ug/L	10.00	10/27/1999 01:03	
Fluoranthene	ND	20	ug/L	10.00	10/27/1999 01:03	
Pyrene	ND	20	ug/L	10.00	10/27/1999 01:03	
Butyl benzyl phthalate	ND	50	ug/L	10.00	10/27/1999 01:03	
3,3-Dichlorobenzidine	ND	50	ug/L	10.00	10/27/1999 01:03	
Benzo(a)anthracene	ND	20	ug/L	10.00	10/27/1999 01:03	
bis(2-Ethylhexyl) phthalate	ND	50	ug/L	10.00	10/27/1999 01:03	
Chrysene	ND	20	ug/L	10.00	10/27/1999 01:03	
Di-n-octyl phthalate	ND	50	ug/L	10.00	10/27/1999 01:03	
Benzo(b)fluoranthene	ND	20	ug/L	10.00	10/27/1999 01:03	
Benzo(k)fluoranthene	ND	20	ug/L	10.00	10/27/1999 01:03	
Benzo(a)pyrene	ND	20	ug/L	10.00	10/27/1999 01:03	
Indeno(1,2,3-c,d)pyrene	ND	20	ug/L	10.00	10/27/1999 01:03	
Dibenzo(a,h)anthracene	ND	20	ug/L	10.00	10/27/1999 01:03	
Benzo(g,h,i)perylene	ND	20	ug/L	10.00	10/27/1999 01:03	
Benzoic acid	ND	100	ug/L	10.00	10/27/1999 01:03	
Surrogate(s)						

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-10-0408

To: **SOMA**
Attn.: Glenn Leong

Test Method: 8270A
Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: CPT-1-1W	Lab Sample ID: 1999-10-0408-001
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 15:00	Extracted: 10/25/1999 15:58
Matrix: Water	QC-Batch: 1999/10/25-01.11
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Nitrobenzene-d5	67.2	35-114	%	10.00	10/27/1999 01:03	
2-Fluorobiphenyl	77.2	43-116	%	10.00	10/27/1999 01:03	
p-Terphenyl-d14	101.7	33-141	%	10.00	10/27/1999 01:03	
Phenol-d5	26.5	10-110	%	10.00	10/27/1999 01:03	
2-Fluorophenol	41.3	25-100	%	10.00	10/27/1999 01:03	
2,4,6-Tribromophenol	55.4	10-123	%	10.00	10/27/1999 01:03	

To: **SOMA**
Attn.: Glenn Leong

Test Method: 8270A
Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: CPT-1-2W	Lab Sample ID: 1999-10-0408-002
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 18:00	Extracted: 10/25/1999 15:58
Matrix: Water	QC-Batch: 1999/10/25-01.11

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Phenol	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Bis(2-chloroethyl)ether	ND	2.0	ug/L	1.00	10/27/1999 01:48	
2-Chlorophenol	ND	2.0	ug/L	1.00	10/27/1999 01:48	
1,3-Dichlorobenzene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
1,4-Dichlorobenzene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Benzyl alcohol	ND	5.0	ug/L	1.00	10/27/1999 01:48	
1,2-Dichlorobenzene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
2-Methylphenol	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Bis(2-chloroisopropyl) ether	ND	2.0	ug/L	1.00	10/27/1999 01:48	
4-Methylphenol	ND	2.0	ug/L	1.00	10/27/1999 01:48	
N-Nitroso-di-n-propylamine	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Hexachloroethane	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Nitrobenzene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Isophorone	ND	2.0	ug/L	1.00	10/27/1999 01:48	
2-Nitrophenol	ND	2.0	ug/L	1.00	10/27/1999 01:48	
2,4-Dimethylphenol	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Bis(2-chloroethoxy) methane	ND	5.0	ug/L	1.00	10/27/1999 01:48	
2,4-Dichlorophenol	ND	2.0	ug/L	1.00	10/27/1999 01:48	
1,2,4-Trichlorobenzene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Naphthalene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
4-Chloroaniline	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Hexachlorobutadiene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
4-Chloro-3-methylphenol	ND	5.0	ug/L	1.00	10/27/1999 01:48	
2-Methylnaphthalene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Hexachlorocyclopentadiene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
2,4,6-Trichlorophenol	ND	2.0	ug/L	1.00	10/27/1999 01:48	
2,4,5-Trichlorophenol	ND	2.0	ug/L	1.00	10/27/1999 01:48	
2-Chloronaphthalene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
2-Nitroaniline	ND	10	ug/L	1.00	10/27/1999 01:48	
Dimethyl phthalate	ND	5.0	ug/L	1.00	10/27/1999 01:48	
Acenaphthylene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
3-Nitroaniline	ND	10	ug/L	1.00	10/27/1999 01:48	
Acenaphthene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
2,4-Dinitrophenol	ND	10	ug/L	1.00	10/27/1999 01:48	
4-Nitrophenol	ND	10	ug/L	1.00	10/27/1999 01:48	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-10-0408

To: **SOMA**
Attn.: Glenn Leong

Test Method: 8270A
Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: CPT-1-2W	Lab Sample ID: 1999-10-0408-002
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 18:00	Extracted: 10/25/1999 15:58
Matrix: Water	QC-Batch: 1999/10/25-01.11

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Dibenzofuran	ND	2.0	ug/L	1.00	10/27/1999 01:48	
2,4-Dinitrotoluene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
2,6-Dinitrotoluene	ND	5.0	ug/L	1.00	10/27/1999 01:48	
Diethyl phthalate	ND	5.0	ug/L	1.00	10/27/1999 01:48	
4-Chlorophenyl phenyl ether	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Fluorene	ND	5.0	ug/L	1.00	10/27/1999 01:48	
4-Nitroaniline	ND	10	ug/L	1.00	10/27/1999 01:48	
2-Methyl-4,6-dinitrophenol	ND	10	ug/L	1.00	10/27/1999 01:48	
N-Nitrosodiphenylamine	ND	2.0	ug/L	1.00	10/27/1999 01:48	
4-Bromophenyl phenyl ether	ND	5.0	ug/L	1.00	10/27/1999 01:48	
Hexachlorobenzene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Pentachlorophenol	ND	10	ug/L	1.00	10/27/1999 01:48	
Phenanthrene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Anthracene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Di-n-butyl phthalate	ND	5.0	ug/L	1.00	10/27/1999 01:48	
Fluoranthene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Pyrene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Butyl benzyl phthalate	ND	5.0	ug/L	1.00	10/27/1999 01:48	
3,3-Dichlorobenzidine	ND	5.0	ug/L	1.00	10/27/1999 01:48	
Benzo(a)anthracene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
bis(2-Ethylhexyl) phthalate	ND	5.0	ug/L	1.00	10/27/1999 01:48	
Chrysene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Di-n-octyl phthalate	ND	5.0	ug/L	1.00	10/27/1999 01:48	
Benzo(b)fluoranthene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Benzo(k)fluoranthene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Benzo(a)pyrene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Indeno(1,2,3-c,d)pyrene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Dibenzo(a,h)anthracene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Benzo(g,h,i)perylene	ND	2.0	ug/L	1.00	10/27/1999 01:48	
Benzoic acid	ND	10	ug/L	1.00	10/27/1999 01:48	
Surrogate(s)						
Nitrobenzene-d5	27.4	35-114	%	1.00	10/27/1999 01:48	sl
2-Fluorobiphenyl	29.2	43-116	%	1.00	10/27/1999 01:48	sl
p-Terphenyl-d14	67.8	33-141	%	1.00	10/27/1999 01:48	
Phenol-d5	10.9	10-110	%	1.00	10/27/1999 01:48	

1220 Quarry Lane * Pleasanton, CA 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-10-0408

To: **SOMA**
Attn.: Glenn Leong

Test Method: 8270A
Prep Method: 3510/8270A

Semi-volatile Organic Compounds

Sample ID: CPT-1-2W	Lab Sample ID: 1999-10-0408-002
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 18:00	Extracted: 10/25/1999 15:58
Matrix: Water	QC-Batch: 1999/10/25-01.11

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Surrogate(s)						
2-Fluorophenol	16.6	25-100	%	1.00	10/27/1999 01:48	sl
2,4,6-Tribromophenol	39.3	10-123	%	1.00	10/27/1999 01:48	

To: **SOMA**
 Attn.: Glenn Leong

Test Method: 8270A
 Prep Method: 3510/8270A

Batch QC Report
 Semi-volatile Organic Compounds

Method Blank	Water	QC Batch # 1999/10/25-01.11
MB: 1999/10/25-01.11-001		Date Extracted: 10/25/1999

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Phenol	ND	2.0	ug/L	10/25/1999 18:09	
Bis(2-chloroethyl)ether	ND	2.0	ug/L	10/25/1999 18:09	
2-Chlorophenol	ND	2.0	ug/L	10/25/1999 18:09	
1,3-Dichlorobenzene	ND	2.0	ug/L	10/25/1999 18:09	
1,4-Dichlorobenzene	ND	2.0	ug/L	10/25/1999 18:09	
Benzyl alcohol	ND	5.0	ug/L	10/25/1999 18:09	
1,2-Dichlorobenzene	ND	2.0	ug/L	10/25/1999 18:09	
2-Methylphenol	ND	2.0	ug/L	10/25/1999 18:09	
Bis(2-chloroisopropyl) ether	ND	2.0	ug/L	10/25/1999 18:09	
4-Methylphenol	ND	2.0	ug/L	10/25/1999 18:09	
N-Nitroso-di-n-propylamine	ND	2.0	ug/L	10/25/1999 18:09	
Hexachloroethane	ND	2.0	ug/L	10/25/1999 18:09	
Nitrobenzene	ND	2.0	ug/L	10/25/1999 18:09	
Isophorone	ND	2.0	ug/L	10/25/1999 18:09	
2-Nitrophenol	ND	2.0	ug/L	10/25/1999 18:09	
2,4-Dimethylphenol	ND	2.0	ug/L	10/25/1999 18:09	
Bis(2-chloroethoxy) methane	ND	5.0	ug/L	10/25/1999 18:09	
2,4-Dichlorophenol	ND	2.0	ug/L	10/25/1999 18:09	
1,2,4-Trichlorobenzene	ND	2.0	ug/L	10/25/1999 18:09	
Naphthalene	ND	2.0	ug/L	10/25/1999 18:09	
4-Chloroaniline	ND	2.0	ug/L	10/25/1999 18:09	
Hexachlorobutadiene	ND	2.0	ug/L	10/25/1999 18:09	
4-Chloro-3-methylphenol	ND	5.0	ug/L	10/25/1999 18:09	
2-Methylnaphthalene	ND	2.0	ug/L	10/25/1999 18:09	
Hexachlorocyclopentadiene	ND	2.0	ug/L	10/25/1999 18:09	
2,4,6-Trichlorophenol	ND	2.0	ug/L	10/25/1999 18:09	
2,4,5-Trichlorophenol	ND	2.0	ug/L	10/25/1999 18:09	
2-Chloronaphthalene	ND	2.0	ug/L	10/25/1999 18:09	
2-Nitroaniline	ND	10	ug/L	10/25/1999 18:09	
Dimethyl phthalate	ND	5.0	ug/L	10/25/1999 18:09	
Acenaphthylene	ND	2.0	ug/L	10/25/1999 18:09	
3-Nitroaniline	ND	10	ug/L	10/25/1999 18:09	
Acenaphthene	ND	2.0	ug/L	10/25/1999 18:09	
2,4-Dinitrophenol	ND	10	ug/L	10/25/1999 18:09	
4-Nitrophenol	ND	10	ug/L	10/25/1999 18:09	
Dibenzofuran	ND	2.0	ug/L	10/25/1999 18:09	
2,4-Dinitrotoluene	ND	2.0	ug/L	10/25/1999 18:09	
2,6-Dinitrotoluene	ND	5.0	ug/L	10/25/1999 18:09	
Diethyl phthalate	ND	5.0	ug/L	10/25/1999 18:09	
4-Chlorophenyl phenyl ether	ND	2.0	ug/L	10/25/1999 18:09	
Fluorene	ND	5.0	ug/L	10/25/1999 18:09	
4-Nitroaniline	ND	10	ug/L	10/25/1999 18:09	
2-Methyl-4,6-dinitrophenol	ND	10	ug/L	10/25/1999 18:09	

To: **SOMA**
 Attn.: Glenn Leong

Test Method: 8270A
 Prep Method: 3510/8270A

Batch QC Report
 Semi-volatile Organic Compounds

Method Blank	Water	QC Batch # 1999/10/25-01.11
MB: 1999/10/25-01.11-001		Date Extracted: 10/25/1999

Compound	Result	Rep.Limit	Units	Analyzed	Flag
N-Nitrosodiphenylamine	ND	2.0	ug/L	10/25/1999 18:09	
4-Bromophenyl phenyl ether	ND	5.0	ug/L	10/25/1999 18:09	
Hexachlorobenzene	ND	2.0	ug/L	10/25/1999 18:09	
Pentachlorophenol	ND	10	ug/L	10/25/1999 18:09	
Phenanthrene	ND	2.0	ug/L	10/25/1999 18:09	
Anthracene	ND	2.0	ug/L	10/25/1999 18:09	
Di-n-butyl phthalate	ND	5.0	ug/L	10/25/1999 18:09	
Fluoranthene	ND	2.0	ug/L	10/25/1999 18:09	
Pyrene	ND	2.0	ug/L	10/25/1999 18:09	
Butyl benzyl phthalate	ND	5.0	ug/L	10/25/1999 18:09	
3,3-Dichlorobenzidine	ND	5.0	ug/L	10/25/1999 18:09	
Benzo(a)anthracene	ND	2.0	ug/L	10/25/1999 18:09	
bis(2-Ethylhexyl) phthalate	ND	5.0	ug/l.	10/25/1999 18:09	
Chrysene	ND	2.0	ug/L	10/25/1999 18:09	
Di-n-octyl phthalate	ND	5.0	ug/L	10/25/1999 18:09	
Benzo(b)fluoranthene	ND	2.0	ug/L	10/25/1999 18:09	
Benzo(k)fluoranthene	ND	2.0	ug/L	10/25/1999 18:09	
Benzo(a)pyrene	ND	2.0	ug/L	10/25/1999 18:09	
Indeno(1,2,3-c,d)pyrene	ND	2.0	ug/L	10/25/1999 18:09	
Dibenzo(a,h)anthracene	ND	2.0	ug/L	10/25/1999 18:09	
Benzo(g,h,i)perylene	ND	2.0	ug/L	10/25/1999 18:09	
Benzoic acid	ND	10	ug/L	10/25/1999 18:09	
Surrogate(s)					
Nitrobenzene-d5	66.4	35-114	%	10/25/1999 18:09	
2-Fluorobiphenyl	77.6	43-116	%	10/25/1999 18:09	
p-Terphenyl-d14	87.2	33-141	%	10/25/1999 18:09	
Phenol-d5	26.4	10-110	%	10/25/1999 18:09	
2-Fluorophenol	40.0	25-100	%	10/25/1999 18:09	
2,4,6-Tribromophenol	51.6	10-123	%	10/25/1999 18:09	

To: **SOMA**
 Attn: Glenn Leong

Test Method: 8270A
 Prep Method: 3510/8270A

Batch QC Report

Semi-volatile Organic Compounds

Laboratory Control Spike (LCS/LCSD)	Water	QC Batch # 1999/10/25-01.11
LCS: 1999/10/25-01.11-002	Extracted: 10/25/1999	Analyzed: 10/26/1999 11:49
LCSD: 1999/10/25-01.11-003	Extracted: 10/25/1999	Analyzed: 10/25/1999 19:37

Compound	Conc. [ug/L]		Exp.Conc. [ug/L]		Recovery [%]		RPD [%]	Ctrl. Limits [%]		Flags	
	LCS	LCSD	LCS	LCSD	LCS	LCSD		Recovery	RPD	LCS	LCSD
Phenol	16.3	16.3	60.0	60.0	27.2	27.2	0.0	12-89	35		
2-Chlorophenol	36.6	36.2	60.0	60.0	61.0	60.3	1.2	23-134	25		
1,4-Dichlorobenzene	19.5	19.4	30.0	30.0	65.0	64.7	0.5	36-97	30		
N-Nitroso-di-n-propylamin	19.8	19.7	30.0	30.0	66.0	65.7	0.5	10-130	34		
1,2,4-Trichlorobenzene	17.3	17.6	30.0	30.0	57.7	58.7	1.7	44-142	35		
4-Chloro-3-methylphenol	41.9	41.4	60.0	60.0	69.8	69.0	1.2	22-147	31		
Acenaphthene	20.4	20.5	30.0	30.0	68.0	68.3	0.4	56-118	30		
4-Nitrophenol	18.4	17.4	60.0	60.0	30.7	29.0	5.7	1-51	35		
2,4-Dinitrotoluene	20.4	19.1	30.0	30.0	68.0	63.7	6.5	39-139	35		
Pentachlorophenol	29.4	28.2	60.0	60.0	49.0	47.0	4.2	45-125	35		
Pyrene	22.0	22.0	30.0	30.0	73.3	73.3	0.0	52-115	35		
Surrogate(s)											
Nitrobenzene-d5	16.5	16.7	25	25	66.0	66.8		35-114			
2-Fluorobiphenyl	19.0	19.4	25	25	76.0	77.6		43-116			
p-Terphenyl-d14	21.5	20.9	25	25	86.0	83.6		33-141			
Phenol-d5	14.2	14.2	50	50	28.4	28.4		10-110			
2-Fluorophenol	21.4	21.4	50	50	42.8	42.8		25-100			
2,4,6-Tribromophenol	30.7	29.8	50	50	61.4	59.6		10-123			

To: **SOMA**
Attn: Glenn Leong

Test Method: 8270A
Prep Method: 3510/8270A

Legend & Notes

Semi-volatile Organic Compounds

Analysis Flags

rl

Reporting limits raised due to reduced sample size.

Analyte Flags

sl

Surrogate recoveries were lower than QC limit due to matrix interference, confirmed by reanalysis.

Diesel

SOMA	☒ 1260 B 45th St. Emeryville, CA 94608
Attn: Glenn Leong	Phone: (510) 654-3900 Fax: () -
Project #: 151-002	Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
CPT-1-1W	Water	10/21/1999 15:00	1
CPT-1-2W	Water	10/21/1999 18:00	2

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-10-0408

To: **SOMA**
Attn.: Glenn Leong

Test Method: 8015m
Prep Method: 3510/8015M

Diesel

Sample ID: CPT-1-1W	Lab Sample ID: 1999-10-0408-001
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 15:00	Extracted: 10/25/1999 08:00
Matrix: Water	QC-Batch: 1999/10/25-03.10

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Diesel	ND	50	ug/L	1.00	10/28/1999 09:56	
Surrogate(s) o-Terphenyl	105.8	60-130	%	1.00	10/28/1999 09:56	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-10-0408

To: **SOMA**
Attn.: Glenn Leong

Test Method: 8015m
Prep Method: 3510/8015M

Diesel

Sample ID: CPT-1-2W	Lab Sample ID: 1999-10-0408-002
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 18:00	Extracted: 10/25/1999 08:00
Matrix: Water	QC-Batch: 1999/10/25-03.10

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Diesel	100	52	ug/L	1.04	10/28/1999 10:43	nhc
<i>Surrogate(s)</i> o-Terphenyl	62.0	60-130	%	1.00	10/28/1999 10:43	

To: **SOMA**
Attn.: Glenn Leong

Test Method: 8015m
Prep Method: 3510/8015M

Batch QC Report
Diesel

Method Blank	Water	QC Batch # 1999/10/25-03.10
MB: 1999/10/25-03.10-001		Date Extracted: 10/25/1999 08:00

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Diesel	ND	50	ug/L	10/26/1999 17:10	
Surrogate(s) o-Terphenyl	110.0	60-130	%	10/26/1999 17:10	

To: **SOMA**
 Attn: Glenn Leong

Test Method: 8015m
 Prep Method: 3510/8015M

Batch QC Report

Diesel

Laboratory Control Spike (LCS/LCSD)	Water	QC Batch # 1999/10/25-03.10
LCS: 1999/10/25-03.10-002	Extracted: 10/25/1999 08:00	Analyzed: 10/26/1999 09:47
LCSD: 1999/10/25-03.10-003	Extracted: 10/25/1999 08:00	Analyzed: 10/27/1999 11:03

Compound	Conc. [ug/L]		Exp. Conc. [ug/L]		Recovery [%]		RPD	Ctrl. Limits [%]		Flags	
	LCS	LCSD	LCS	LCSD	LCS	LCSD		Recovery	RPD	LCS	LCSD
Diesel	1010	1100	1250	1250	80.8	88.0	8.5	60-130	25		
Surrogate(s) o-Terphenyl	22.6	22.5	20.0	20.0	113.0	112.5		60-130			

To: **SOMA**
Attn: Glenn Leong

Test Method: 8015m
Prep Method: 3510/8015M

Legend & Notes

Diesel

Analyte Flags

nhc

Compounds reported are in the Diesel range. They do not exhibit a pattern characteristic of hydrocarbon.

Gas/BTEX

SOMA	<input checked="" type="checkbox"/> 1260 B 45th St. Emeryville, CA 94608
Attn: Glenn Leong	Phone: (510) 654-3900 Fax: () -
Project #: 151-002	Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
CPT-1-1W	Water	10/21/1999 15:00	1
CPT-1-2W	Water	10/21/1999 18:00	2

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-10-0408

To: **SOMA**

Test Method: 8020
8015M

Attn.: Glenn Leong

Prep Method: 5030

Gas/BTEX

Sample ID: CPT-1-1W	Lab Sample ID: 1999-10-0408-001
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 15:00	Extracted: 11/01/1999 12:34
Matrix: Water	QC-Batch: 1999/11/01-01.02

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Gasoline	ND	50	ug/L	1.00	11/01/1999 12:34	
Benzene	ND	0.50	ug/L	1.00	11/01/1999 12:34	
Toluene	ND	0.50	ug/L	1.00	11/01/1999 12:34	
Ethyl benzene	ND	0.50	ug/L	1.00	11/01/1999 12:34	
Xylene(s)	ND	0.50	ug/L	1.00	11/01/1999 12:34	
Surrogate(s)						
Trifluorotoluene	114.7	58-124	%	1.00	11/01/1999 12:34	
4-Bromofluorobenzene-FID	94.6	50-150	%	1.00	11/01/1999 12:34	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-10-0408

To: **SOMA**

Test Method: 8020
8015M

Attn.: Glenn Leong

Prep Method: 5030

Gas/BTEX

Sample ID: CPT-1-2W	Lab Sample ID: 1999-10-0408-002
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 18:00	Extracted: 10/28/1999 20:12
Matrix: Water	QC-Batch: 1999/10/28-01.05

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Gasoline	ND	50	ug/L	1.00	10/28/1999 20:12	
Benzene	ND	0.50	ug/L	1.00	10/28/1999 20:12	
Toluene	ND	0.50	ug/L	1.00	10/28/1999 20:12	
Ethyl benzene	ND	0.50	ug/L	1.00	10/28/1999 20:12	
Xylene(s)	ND	0.50	ug/L	1.00	10/28/1999 20:12	
Surrogate(s)						
Trifluorotoluene	71.3	58-124	%	1.00	10/28/1999 20:12	
Trifluorotoluene-FID	89.6	58-124	%	1.00	10/28/1999 20:12	

To: **SOMA**

Test Method: 8020
8015M

Attn.: Glenn Leong

Prep Method: 5030

Batch QC Report
Gas/BTEX

Method Blank	Water	QC Batch # 1999/10/28-01.05
MB: 1999/10/28-01.05-001		Date Extracted: 10/28/1999 12:36

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Gasoline	ND	50	ug/L	10/28/1999 12:36	
Benzene	ND	0.5	ug/L	10/28/1999 12:36	
Toluene	ND	0.5	ug/L	10/28/1999 12:36	
Ethyl benzene	ND	0.5	ug/L	10/28/1999 12:36	
Xylene(s)	ND	0.5	ug/L	10/28/1999 12:36	
Surrogate(s)					
Trifluorotoluene	65.2	58-124	%	10/28/1999 12:36	
Trifluorotoluene-FID	89.8	58-124	%	10/28/1999 12:36	

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-10-0408

To: SOMA

Test Method: 8020
8015M

Attn.: Glenn Leong

Prep Method: 5030

Batch QC Report Gas/BTEX

Method Blank	Water	QC Batch # 1999/11/01-01.02
MB: 1999/11/01-01.02-001		Date Extracted: 11/01/1999 09:26

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Gasoline	ND	50	ug/L	11/01/1999 09:26	
Benzene	ND	0.5	ug/L	11/01/1999 09:26	
Toluene	ND	0.5	ug/L	11/01/1999 09:26	
Ethyl benzene	ND	0.5	ug/L	11/01/1999 09:26	
Xylene(s)	ND	0.5	ug/L	11/01/1999 09:26	
Surrogate(s)					
Trifluorotoluene	124.0	58-124	%	11/01/1999 09:26	
4-Bromofluorobenzene-FID	97.0	50-150	%	11/01/1999 09:26	

1220 Quarry Lane * Pleasanton, CA 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

To: **SOMA**

Test Method: 8020
8015M

Attn: Glenn Leong

Prep Method: 5030

Batch QC Report

Gas/BTEX

Laboratory Control Spike (LCS/LCSD)		Water		QC Batch # 1999/10/28-01.05	
LCS:	1999/10/28-01.05-002	Extracted:	10/28/1999 14:14	Analyzed:	10/28/1999 14:14
LCSD:	1999/10/28-01.05-003	Extracted:	10/28/1999 14:46	Analyzed:	10/28/1999 14:46

Compound	Conc. [ug/L]		Exp. Conc. [ug/L]		Recovery [%]		RPD [%]	Ctrl. Limits [%]		Flags	
	LCS	LCSD	LCS	LCSD	LCS	LCSD		Recovery	RPD	LCS	LCSD
Gasoline	484	490	500	500	96.8	98.0	1.2	75-125	20		
Benzene	101	93.0	100.0	100.0	101.0	93.0	8.2	77-123	20		
Toluene	101	92.1	100.0	100.0	101.0	92.1	9.2	78-122	20		
Ethyl benzene	100	92.0	100.0	100.0	100.0	92.0	8.3	70-130	20		
Xylene(s)	290	271	300	300	96.7	90.3	6.8	75-125	20		
Surrogate(s)											
Trifluorotoluene	508	475	500	500	101.6	95.0		58-124			
Trifluorotoluene-FID	461	460	500	500	92.2	92.0		58-124			

To: SOMA

Test Method: 8020
8015M

Attn: Glenn Leong

Prep Method: 5030

Batch QC Report

Gas/BTEX

Laboratory Control Spike (LCS/LCSD)	Water	QC Batch # 1999/11/01-01.02
LCS: 1999/11/01-01.02-002	Extracted: 11/01/1999 16:47	Analyzed: 11/01/1999 16:47
LCSD: 1999/11/01-01.02-003	Extracted: 11/01/1999 06:52	Analyzed: 11/01/1999 06:52

Compound	Conc. [ug/L]		Exp.Conc. [ug/L]		Recovery [%]		RPD [%]	Ctrl. Limits [%]		Flags	
	LCS	LCSD	LCS	LCSD	LCS	LCSD		Recovery	RPD	LCS	LCSD
Gasoline	464	453	500	500	92.8	90.6	2.4	75-125	20		
Benzene	113	99.9	100.0	100.0	113.0	99.9	12.3	77-123	20		
Toluene	111	99.1	100.0	100.0	111.0	99.1	11.3	78-122	20		
Ethyl benzene	107	95.7	100.0	100.0	107.0	95.7	11.1	70-130	20		
Xylene(s)	316	283	300	300	105.3	94.3	11.0	75-125	20		
Surrogate(s)											
Trifluorotoluene	504	456	500	500	100.8	91.2		58-124			
4-Bromofluorobenzene-FI	475	429	500	500	95.0	85.8		50-150			

Organochlorine Pesticides and PCBs

SOMA	✉ 1260 B 45th St. Emeryville, CA 94608
Attn: Glenn Leong	Phone: (510) 654-3900 Fax: () -
Project #: 151-002	Project: 1600 63rd Street

Samples Reported

Sample ID	Matrix	Date Sampled	Lab #
CPT-1-1W	Water	10/21/1999 15:00	1
CPT-1-2W	Water	10/21/1999 18:00	2

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-10-0408

To: SOMA
Attn.: Glenn Leong

Test Method: 8080A
Prep Method: 3510/8080

Organochlorine Pesticides and PCBs

Sample ID: CPT-1-1W	Lab Sample ID: 1999-10-0408-001
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 15:00	Extracted: 10/26/1999
Matrix: Water	QC-Batch: 1999/10/26-02.13
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Aldrin	ND	0.80	ug/L	10.00	10/28/1999 05:32	
Dieldrin	ND	0.60	ug/L	10.00	10/28/1999 05:32	
Endrin aldehyde	ND	2.0	ug/L	10.00	10/28/1999 05:32	
Endrin	ND	4.0	ug/L	10.00	10/28/1999 05:32	
Heptachlor	ND	0.60	ug/L	10.00	10/28/1999 05:32	
Heptachlor epoxide	ND	1.0	ug/L	10.00	10/28/1999 05:32	
4,4'-DDT	ND	2.0	ug/L	10.00	10/28/1999 05:32	
4,4'-DDE	ND	0.80	ug/L	10.00	10/28/1999 05:32	
4,4'-DDD	ND	1.0	ug/L	10.00	10/28/1999 05:32	
Endosulfan I	ND	1.0	ug/L	10.00	10/28/1999 05:32	
Endosulfan II	ND	1.0	ug/L	10.00	10/28/1999 05:32	
alpha-BHC	ND	0.60	ug/L	10.00	10/28/1999 05:32	
beta-BHC	ND	0.60	ug/L	10.00	10/28/1999 05:32	
gamma-BHC (Lindane)	ND	0.60	ug/L	10.00	10/28/1999 05:32	
delta-BHC	ND	0.60	ug/L	10.00	10/28/1999 05:32	
Endosulfan sulfate	ND	2.0	ug/L	10.00	10/28/1999 05:32	
4,4'-Methoxychlor	ND	2.0	ug/L	10.00	10/28/1999 05:32	
Toxaphene	ND	10	ug/L	10.00	10/28/1999 05:32	
Chlordane	ND	10	ug/L	10.00	10/28/1999 05:32	
Aroclor 1016	ND	5.0	ug/L	10.00	10/28/1999 05:32	
Aroclor 1221	ND	5.0	ug/L	10.00	10/28/1999 05:32	
Aroclor 1232	ND	5.0	ug/L	10.00	10/28/1999 05:32	
Aroclor 1242	ND	5.0	ug/L	10.00	10/28/1999 05:32	
Aroclor 1248	ND	5.0	ug/L	10.00	10/28/1999 05:32	
Aroclor 1254	ND	5.0	ug/L	10.00	10/28/1999 05:32	
Aroclor 1260	ND	5.0	ug/L	10.00	10/28/1999 05:32	
Surrogate(s)						
2,4,5,6-Tetrachloro-m-xylene	86.3	62-123	%	10.00	10/28/1999 05:32	
Decachlorobiphenyl	62.3	56-136	%	10.00	10/28/1999 05:32	

1220 Quarry Lane * Pleasanton, CA 94566-4756
Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

CHROMALAB, INC.

Environmental Services (SDB)

Submission #: 1999-10-0408

To: **SOMA**
Attn.: Glenn Leong

Test Method: 8080A
Prep Method: 3510/8080

Organochlorine Pesticides and PCBs

Sample ID: CPT-1-2W	Lab Sample ID: 1999-10-0408-002
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 18:00	Extracted: 10/26/1999
Matrix: Water	QC-Batch: 1999/10/26-02.13
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Aldrin	ND	2.0	ug/L	25.00	10/28/1999 05:58	
Dieldrin	ND	1.5	ug/L	25.00	10/28/1999 05:58	
Endrin aldehyde	ND	5.0	ug/L	25.00	10/28/1999 05:58	
Endrin	ND	10	ug/L	25.00	10/28/1999 05:58	
Heptachlor	ND	1.5	ug/L	25.00	10/28/1999 05:58	
Heptachlor epoxide	ND	2.5	ug/L	25.00	10/28/1999 05:58	
4,4'-DDT	ND	5.0	ug/L	25.00	10/28/1999 05:58	
4,4'-DDE	ND	2.0	ug/L	25.00	10/28/1999 05:58	
4,4'-DDD	ND	2.5	ug/L	25.00	10/28/1999 05:58	
Endosulfan I	ND	2.5	ug/L	25.00	10/28/1999 05:58	
Endosulfan II	ND	2.5	ug/L	25.00	10/28/1999 05:58	
alpha-BHC	ND	1.5	ug/L	25.00	10/28/1999 05:58	
beta-BHC	ND	1.5	ug/L	25.00	10/28/1999 05:58	
gamma-BHC (Lindane)	ND	1.5	ug/L	25.00	10/28/1999 05:58	
delta-BHC	ND	1.5	ug/L	25.00	10/28/1999 05:58	
Endosulfan sulfate	ND	5.0	ug/L	25.00	10/28/1999 05:58	
4,4'-Methoxychlor	ND	5.0	ug/L	25.00	10/28/1999 05:58	
Toxaphene	ND	25	ug/L	25.00	10/28/1999 05:58	
Chlordane	ND	25	ug/L	25.00	10/28/1999 05:58	
Aroclor 1016	ND	13	ug/L	25.00	10/28/1999 05:58	
Aroclor 1221	ND	13	ug/L	25.00	10/28/1999 05:58	
Aroclor 1232	ND	13	ug/L	25.00	10/28/1999 05:58	
Aroclor 1242	ND	13	ug/L	25.00	10/28/1999 05:58	
Aroclor 1248	ND	13	ug/L	25.00	10/28/1999 05:58	
Aroclor 1254	ND	13	ug/L	25.00	10/28/1999 05:58	
Aroclor 1260	ND	13	ug/L	25.00	10/28/1999 05:58	
Surrogate(s)						
2,4,5,6-Tetrachloro-m-xylene	85.9	62-123	%	25.00	10/28/1999 05:58	
Decachlorobiphenyl	93.9	56-136	%	25.00	10/28/1999 05:58	

1220 Quarry Lane * Pleasanton, CA 94566-4756

Telephone: (925) 484-1919 * Facsimile: (925) 484-1096

To: **SOMA**
 Attn.: Glenn Leong

Test Method: 8080A
 Prep Method: 3510/8080

Organochlorine Pesticides and PCBs

Sample ID: CPT-1-2W	Lab Sample ID: 1999-10-0408-002
Project: 151-002 1600 63rd Street	Received: 10/22/1999 16:30
Sampled: 10/21/1999 18:00	Extracted: 10/26/1999
Matrix: Water	QC-Batch: 1999/10/26-02.13
Sample/Analysis Flag: rl (See Legend & Note section)	

Compound	Result	Rep.Limit	Units	Dilution	Analyzed	Flag
Aldrin	ND	2.0	ug/L	25.00	10/28/1999 05:58	
Dieldrin	ND	1.5	ug/L	25.00	10/28/1999 05:58	
Endrin aldehyde	ND	5.0	ug/L	25.00	10/28/1999 05:58	
Endrin	ND	10	ug/L	25.00	10/28/1999 05:58	
Heptachlor	ND	1.5	ug/L	25.00	10/28/1999 05:58	
Heptachlor epoxide	ND	2.5	ug/L	25.00	10/28/1999 05:58	
4,4'-DDT	ND	5.0	ug/L	25.00	10/28/1999 05:58	
4,4'-DDE	ND	2.0	ug/L	25.00	10/28/1999 05:58	
4,4'-DDD	ND	2.5	ug/L	25.00	10/28/1999 05:58	
Endosulfan I	ND	2.5	ug/L	25.00	10/28/1999 05:58	
Endosulfan II	ND	2.5	ug/L	25.00	10/28/1999 05:58	
alpha-BHC	ND	1.5	ug/L	25.00	10/28/1999 05:58	
beta-BHC	ND	1.5	ug/L	25.00	10/28/1999 05:58	
gamma-BHC (Lindane)	ND	1.5	ug/L	25.00	10/28/1999 05:58	
delta-BHC	ND	1.5	ug/L	25.00	10/28/1999 05:58	
Endosulfan sulfate	ND	5.0	ug/L	25.00	10/28/1999 05:58	
4,4'-Methoxychlor	ND	5.0	ug/L	25.00	10/28/1999 05:58	
Toxaphene	ND	25	ug/L	25.00	10/28/1999 05:58	
Chlordane	ND	25	ug/L	25.00	10/28/1999 05:58	
Aroclor 1016	ND	13	ug/L	25.00	10/28/1999 05:58	
Aroclor 1221	ND	13	ug/L	25.00	10/28/1999 05:58	
Aroclor 1232	ND	13	ug/L	25.00	10/28/1999 05:58	
Aroclor 1242	ND	13	ug/L	25.00	10/28/1999 05:58	
Aroclor 1248	ND	13	ug/L	25.00	10/28/1999 05:58	
Aroclor 1254	ND	13	ug/L	25.00	10/28/1999 05:58	
Aroclor 1260	ND	13	ug/L	25.00	10/28/1999 05:58	
Surrogate(s)						
2,4,5,6-Tetrachloro-m-xylene	85.9	62-123	%	25.00	10/28/1999 05:58	
Decachlorobiphenyl	93.9	56-136	%	25.00	10/28/1999 05:58	

To: **SOMA**
 Attn.: Glenn Leong

Test Method: 8080A
 Prep Method: 3510/8080

Batch QC Report
 Organochlorine Pesticides and PCBs

Method Blank	Water	QC Batch # 1999/10/26-02.13
MB: 1999/10/26-02.13-001		Date Extracted: 10/26/1999

Compound	Result	Rep.Limit	Units	Analyzed	Flag
Aldrin	ND	0.080	ug/L	10/28/1999 03:19	
Dieldrin	ND	0.060	ug/L	10/28/1999 03:19	
Endrin aldehyde	ND	0.20	ug/L	10/28/1999 03:19	
Endrin	ND	0.40	ug/L	10/28/1999 03:19	
Heptachlor	ND	0.060	ug/L	10/28/1999 03:19	
Heptachlor epoxide	ND	0.10	ug/L	10/28/1999 03:19	
4,4'-DDT	ND	0.20	ug/L	10/28/1999 03:19	
4,4'-DDE	ND	0.080	ug/L	10/28/1999 03:19	
4,4'-DDD	ND	0.10	ug/L	10/28/1999 03:19	
Endosulfan I	ND	0.10	ug/L	10/28/1999 03:19	
Endosulfan II	ND	0.10	ug/L	10/28/1999 03:19	
alpha-BHC	ND	0.060	ug/L	10/28/1999 03:19	
beta-BHC	ND	0.060	ug/L	10/28/1999 03:19	
gamma-BHC (Lindane)	ND	0.060	ug/L	10/28/1999 03:19	
delta-BHC	ND	0.060	ug/L	10/28/1999 03:19	
Endosulfan sulfate	ND	0.20	ug/L	10/28/1999 03:19	
4,4'-Methoxychlor	ND	0.20	ug/L	10/28/1999 03:19	
Toxaphene	ND	1.0	ug/L	10/28/1999 03:19	
Chlordane	ND	1.0	ug/L	10/28/1999 03:19	
Aroclor 1016	ND	0.5	ug/L	10/28/1999 03:19	
Aroclor 1221	ND	0.5	ug/L	10/28/1999 03:19	
Aroclor 1232	ND	0.5	ug/L	10/28/1999 03:19	
Aroclor 1242	ND	0.5	ug/L	10/28/1999 03:19	
Aroclor 1248	ND	0.5	ug/L	10/28/1999 03:19	
Aroclor 1254	ND	0.5	ug/L	10/28/1999 03:19	
Aroclor 1260	ND	0.5	ug/L	10/28/1999 03:19	
Surrogate(s)					
2,4,5,6-Tetrachloro-m-xylene	96.2	62-123	%	10/28/1999 03:19	
Decachlorobiphenyl	97.0	56-136	%	10/28/1999 03:19	

To: **SOMA**
 Attn: Glenn Leong

Test Method: 8080A
 Prep Method: 3510/8080

Batch QC Report

Organochlorine Pesticides and PCBs

Laboratory Control Spike (LCS/LCSD)	Water	QC Batch # 1999/10/26-02.13
LCS: 1999/10/26-02.13-002	Extracted: 10/26/1999	Analyzed: 10/28/1999 03:46
LCSD: 1999/10/26-02.13-003	Extracted: 10/26/1999	Analyzed: 10/28/1999 04:12

Compound	Conc. [ug/L]		Exp.Conc. [ug/L]		Recovery [%]			RPD		Ctrl. Limits [%]		Flags	
	LCS	LCSD	LCS	LCSD	LCS	LCSD	RPD [%]	Recovery	RPD	LCS	LCSD		
Aldrin	0.413	0.422	0.500	0.500	82.6	84.4	2.2	65-135	25				
Dieldrin	0.466	0.468	0.500	0.500	93.2	93.6	0.4	65-135	20				
Endrin	0.452	0.449	0.500	0.500	90.4	89.8	0.7	65-135	20				
Heptachlor	0.421	0.417	0.500	0.500	84.2	83.4	1.0	65-135	20				
4,4'-DDT	0.440	0.450	0.500	0.500	88.0	90.0	2.2	65-135	20				
gamma-BHC (Lindane)	0.395	0.408	0.500	0.500	79.0	81.6	3.2	65-135	20				
Surrogate(s)													
2,4,5,6-Tetrachloro-m-xyI	39.3	38.4	50	50	78.6	76.8		62-123					
Decachlorobiphenyl	46.6	39.8	50	50	93.2	79.6		56-136					

To: SOMA
Attn: Glenn Leong

Test Method: 8080A
Prep Method: 3510/8080

Legend & Notes

Organochlorine Pesticides and PCBs

Analysis Flags

rl

Reporting limits raised due to reduced sample size.

CHROMALAB, INC.

1220 Quarry Lane • Pleasanton, California 94566-4756
510/484-1919 • Facsimile 510/484-1088

99-10-0408

Reference #: 48680

Chain of Custody

Environmental Services (SOB) (DOHS 1094)

DATE 10/22/99 PAGE 1 OF 1

PROJ MGR: Glenn Leung COMPANY: SOMA Corp. ADDRESS: 1260 B 45th St. Emergville, CA 94608					ANALYSIS REPORT														NUMBER OF CONTAINERS	
SAMPLERS (SIGNATURE) <i>Jeff Hennier</i>		(PHONE NO.) 510/654-3900 (FAX NO.) 510/654-1900			TPH (EPA 8015, 8021) By Gas w/ BTEX	PURGEABLE AROMATICS BTEX (EPA 8020)	TPH-Diesel (EPA 8015M)	TEPH (EPA 8015M) Dibenz. Diesel, DM.O.	PURGEABLE HALOCARBONS (HVOCs) (EPA 8010 by 8260)	VOLATILE ORGANICS (VOCs) (EPA 8260)	SEMI-VOLATILES (EPA 8270)	TOTAL OIL AND GREASE (SM 5520 B + F, E + F)	TOTAL RECOVERABLE HYDROCARBONS (EPA 418.1)	PESTICIDES (EPA 8090) PCBs (EPA 8080)	PNA's by <input type="checkbox"/> 8270 <input type="checkbox"/> 8310	<input type="checkbox"/> pH <input type="checkbox"/> Spec. Cond. <input type="checkbox"/> TSS <input type="checkbox"/> TDS	LUFT METALS: Cd, Cr, Pb, Ni, Zn	CAM 17 METALS (EPA 6010/7470/7471)		TOTAL LEAD	☐ W.E.T. ☐ TCLP
SAMPLE ID.	DATE	TIME	MATRIX	PRESERV.																
CPT-1-1W	10/21/99	1500	H ₂ O		X		X	X	X				X							
CPT-2-2W	"	1800	il		↓		↓	↓	↓				↓							

PROJECT INFORMATION		SAMPLE RECEIPT		RELINQUISHED BY 1		RELINQUISHED BY 2		RELINQUISHED BY 3		
PROJECT NAME 1600 63rd Street	TOTAL NO OF CONTAINERS	TOTAL NO OF CONTAINERS		<i>Jeff Hennier</i> (SIGNATURE) (TIME) Jeff Hennier 10/22/99 (PRINTED NAME) (DATE)		<i>Tom Wright 1630</i> (SIGNATURE) (TIME) Tom Wright 10/22/99 (PRINTED NAME) (DATE)		<i>D. Harrington 1630</i> (SIGNATURE) (TIME) D. Harrington 1630 (PRINTED NAME) (DATE)		
PROJECT NUMBER 151-002	HEAD SPACE	HEAD SPACE		<i>Azove</i> (SIGNATURE) (COMPANY)		<i>CL</i> (SIGNATURE) (COMPANY)		<i>Chromalab</i> (SIGNATURE) (COMPANY)		
P.O.#	TEMPERATURE	TEMPERATURE		RECEIVED BY 1 <i>Tom Wright 1416</i> (SIGNATURE) (TIME) Tom Wright 10/22/99 (PRINTED NAME) (DATE) <i>CL</i> (COMPANY)		RECEIVED BY 2		RECEIVED BY (LABORATORY) 3 <i>D. Harrington</i> (SIGNATURE) (TIME) D. Harrington 1630 (PRINTED NAME) (DATE) Chromalab 10/22/99 (PRINTED NAME) (DATE)		
TAT	STANDARD 5-DAY	24	48	72	OTHER		OTHER		OTHER	
Report: <input checked="" type="checkbox"/> Routine <input type="checkbox"/> Level 2 <input type="checkbox"/> Level 3 <input type="checkbox"/> Level 4 SPECIAL INSTRUCTIONS/COMMENTS: CC: fax results to Jeff Hennier fax # 415/485-6062										

L-09:98(FRU) 08:51 CHROMALAB, INC. TEL: 510 484 1000

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

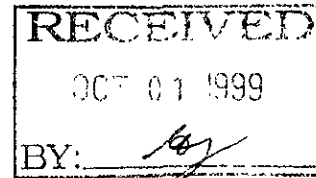
James E. Bruya, Ph.D.
Charlene Jensen, M.S.
Bradley T. Benson, B.S.
Kurt Johnson, B.S.

3012 16th Avenue West
Seattle, WA 98119-2029
TEL: (206) 285-8282
FAX: (206) 283-5044
e-mail: fbi@isomedia.com

2081

September 27, 1999

Glenn Leong, Project Manager
SOMA Corporation
1260B 45th Street
Emeryville, CA 94608.



Dear Mr. Leong:

Included are the results from the additional testing of material submitted on August 10, 1999 from your 1999-08-0100 project.

The sample submitted for forensic evaluation arrived in good condition. Upon its arrival, sample HP-5-W was assigned our laboratory project number 908048 and was placed in a refrigerator where it was maintained at 4°C until removed for sample processing.

It was requested that we determine if gasoline or waste oil is present in sample HP-5-W. In order to make this determination the sample was extracted and analyzed using a gas chromatograph (GC) with a flame ionization detector (FID) and an electron capture detector (ECD). In addition, an analysis using a gas chromatograph with a mass spectrometer (GC/MS) was performed on the sample to gain further information about the petroleum material present. The sample was also digested and analyzed by inductively coupled plasma (ICP) for metals. The results of the GC/MS and ICP analyses can be found in this report. The results of the GC/FID/ECD analysis were issued to Gary Cook of Chromalab on August 24, 1999. It was also requested the material in sample HP-5-W be compared to results for the testing on sample MW-2. The results of the testing for sample MW-2 can be found in a report issued to Gary Cook of Chromalab on June 24, 1999.

The GC/FID trace of sample HP-5-W showed material consistent with degraded Bunker C or crude oil. The GC/MS results did not show the presence of common gasoline components such as isooctane or C3-benzenes.¹ This indicates that

¹ The Petroleum Hydrocarbon Criteria Working Group Series, Volume 3. Selection of Representative TPH Fractions Based on Fate and Transport Considerations.

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

Glenn Leong
September 27, 1999
Page 2

gasoline is not present in a significant quantity in sample HP-5-W. An elevated level of metals was not found in sample HP-5-W. Waste oils commonly contain metal from the wear of engine parts.² However, the absence of an elevated level of wear metals does not mean that waste oil is not present. While the presence of waste oil cannot be entirely ruled out the GC/FID trace of sample HP-5-W does not show material consistent with a high level of waste oil.

The petroleum material in sample HP-5-W and MW-2 share the same general boiling ranges and appear to be compositionally similar. Both samples contain petroleum consistent with Bunker C or crude oil.

Any samples that may remain are currently scheduled for disposal in 30 days. If you would like us to return your samples or arrange for long term storage at our offices, please contact us as soon as possible. We appreciate this opportunity to be of service to you. Please do not hesitate to call should you have any questions or require additional documentation.

Sincerely,

FRIEDMAN & BRUYA, INC.



Bradley T. Benson
Chemist

Enclosures
NAA0927R.DOC

² Composition and Management of Used Oil Generated in the United States. EPA Publication # EPA/530-SW-0113.

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

Date of Report: 09/27/99

Date Received: 08/10/99

Project: 1999-08-0100

Date Analyzed: 09/07/99

**RESULTS FROM THE ANALYSIS OF THE PRODUCT SAMPLE
FOR PARAFFINS, ISOPARAFFINS, OLEFINS,
NAPHTHENES, AND AROMATICS
Results Reported as % by Weight**

Laboratory ID 908048-01
Client ID HP-5-W

<u>Compound</u>	<u>Weight Percent</u>
Propane	<0.01
Methanol	<0.01
Isobutane	<0.01
Ethanol	<0.01
n-Butane	<0.01
t-2-Butene	<0.01
c-2-Butene	<0.01
Isopropanol	<0.01
3-Methyl-1-butene	<0.01
Isopentane	<0.01
tert-Butanol	<0.01
1-Pentene	<0.01
2-Methyl-1-butene	<0.01
n-Propanol	<0.01
n-Pentane	<0.01
t-2-Pentene	<0.01
c-2-Pentene	<0.01
2-Methyl-2-butene	<0.01
MTBE	<0.01
sec-Butanol	<0.01
4-Methyl-1-pentene	<0.01
Isobutanol	<0.01
2,3-Dimethylbutane	<0.01
Cyclopentane	<0.01
2-Methylpentane	<0.01
DIPE	<0.01
3-Methylpentane	0.10
n-Butanol	<0.01
1-Hexene	<0.01
ETBE	<0.01
n-Hexane	4.31

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

Date of Report: 09/27/99
 Date Received: 08/10/99
 Project: 1999-08-0100
 Date Analyzed: 09/07/99

**RESULTS FROM THE ANALYSIS OF THE PRODUCT SAMPLE
 FOR PARAFFINS, ISOPARAFFINS, OLEFINS,
 NAPHTHENES, AND AROMATICS
 Results Reported as % by Weight**

Laboratory ID 908048-01
 Client ID HP-5-W

<u>Compound</u>	<u>Weight Percent</u>
t-2-Hexene	<0.01
2-Methyl-1-pentene	<0.01
2-Methyl-2-pentene	<0.01
c-2-Hexene	<0.01
2,2-Dimethylpentane	<0.01
2,4-Dimethylpentane	<0.01
Methylcyclopentane	0.79
2,2,3-Trimethylbutane	<0.01
Benzene	<0.01
1-Methylcyclopentene	<0.01
TAME	<0.01
3,3-Dimethylpentane	<0.01
Cyclohexane	<0.01
2-Methylhexane	<0.01
2,3-Dimethylpentane	0.04
1,1-Dimethylcyclopentane	<0.01
3-Methylhexane	0.03
c-1,3-Dimethylcyclopentane	0.02
3-Ethylpentane	0.01
Isooctane	<0.01
t-1,2-Dimethylcyclopentane	0.02
1-Heptene	<0.01
n-Heptane	<0.01
t-3-Heptene	<0.01
c-3-Heptene	0.04
t-2-Heptene	<0.01
c-2-Heptene	<0.01
2,2-Dimethylhexane	<0.01
2,5-Dimethylhexane	0.02
Methylcyclohexane	0.07
2,4-Dimethylhexane	0.02
Ethylcyclopentane	0.01

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

Date of Report: 09/27/99

Date Received: 08/10/99

Project: 1999-08-0100

Date Analyzed: 09/07/99

**RESULTS FROM THE ANALYSIS OF THE PRODUCT SAMPLE
FOR PARAFFINS, ISOPARAFFINS, OLEFINS,
NAPHTHENES, AND AROMATICS
Results Reported as % by Weight**

Laboratory ID 908048-01
Client ID HP-5-W

<u>Compound</u>	<u>Weight Percent</u>
t-1,c-2,4-Trimethylcyclopentane	0.14
t-1,c-2,3-Trimethylcyclopentane	0.08
2,3,4-Trimethylpentane	0.01
Toluene	<0.01
2,3-Dimethylhexane	0.03
2-Methylheptane	0.07
3-Methylheptane	<0.01
4-Methylheptane	0.04
3-Ethylhexane	0.02
1-Octene	<0.01
1,2,3-Trimethylcyclopentane	0.04
t-1,2-Dimethylcyclohexane	0.17
n-Octane	<0.01
1-Ethyl-1-methylcyclopentane	0.02
c-2-Octene	<0.01
c-1,2-Dimethylcyclohexane	0.14
Isopropylcyclopentane	0.06
2,5-Dimethylheptane	0.07
3,5-Dimethylheptane	0.02
n-Propylcyclopentane	0.03
Ethylbenzene	<0.01
2,3-Dimethylheptane	0.18
3,4-Dimethylheptane	0.04
2-Methyloctane	0.07
m-Xylene	<0.01
p-Xylene	<0.01
3-Methyloctane	0.16
1-Nonene	<0.01
3,3-Diethylpentane	<0.01
4-Nonene	<0.01
o-Xylene	<0.01
n-Nonane	<0.01

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

Date of Report: 09/27/99

Date Received: 08/10/99

Project: 1999-08-0100

Date Analyzed: 09/07/99

**RESULTS FROM THE ANALYSIS OF THE PRODUCT SAMPLE
FOR PARAFFINS, ISOPARAFFINS, OLEFINS,
NAPHTHENES, AND AROMATICS
Results Reported as % by Weight**

Laboratory ID 908048-01

Client ID HP-5-W

<u>Compound</u>	<u>Weight Percent</u>
Isobutylcyclopentane	0.13
t-2-Nonene+c-2-Nonene	<0.01
Isopropylbenzene	<0.01
3,3-Dimethyloctane	0.04
n-Butylcyclopentane	<0.01
n-Propylbenzene	<0.01
2,3-Dimethyloctane	<0.01
1-Methyl-3-ethylbenzene	<0.01
1-Methyl-4-ethylbenzene	<0.01
2-Methylnonane	0.15
3-Ethyloctane	0.15
3-Methylnonane	0.14
1,3,5-Trimethylbenzene	<0.01
1-Methyl-2-ethylbenzene	<0.01
1,2,4-Trimethylbenzene	<0.01
tert-Butylbenzene	<0.01
n-Decane	<0.01
Isobutylbenzene	<0.01
Isopropylcyclohexane	0.15
sec-Butylbenzene	<0.01
1-Methyl-3-isopropylbenzene	<0.01
sec-Butylcyclohexane	<0.01
1-Methyl-4-isopropylbenzene	<0.01
1,2,3-Trimethylbenzene	<0.01
Indan	<0.01
1-Methyl-3-n-propylbenzene	<0.01
1-Methyl-4-n-propylbenzene	<0.01
n-Butylbenzene	<0.01
1,3-Dimethyl-5-ethylbenzene	<0.01
1,2-Diethylbenzene	<0.01
1-Methyl-2-n-propylbenzene	<0.01
1,4-Dimethyl-2-ethylbenzene	<0.01

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

Date of Report: 09/27/99

Date Received: 08/10/99

Project: 1999-08-0100

Date Analyzed: 09/07/99

**RESULTS FROM THE ANALYSIS OF THE PRODUCT SAMPLE
FOR PARAFFINS, ISOPARAFFINS, OLEFINS,
NAPHTHENES, AND AROMATICS
Results Reported as % by Weight**

Laboratory ID 908048-01

Client ID HP-5-W

<u>Compound</u>	<u>Weight Percent</u>
1,2-Dimethyl-4-ethylbenzene	<0.01
1,3-Dimethyl-2-ethylbenzene	<0.01
1,2-Dimethyl-3-ethylbenzene	<0.01
n-Undecane	<0.01
1,2,4,5-Tetramethylbenzene	<0.01
2-Methylbutylbenzene	<0.01
1-tert-Butyl-2-methylbenzene	<0.01
n-Pentylbenzene	<0.01
Methylindan	<0.01
1-tert-Butyl-3,5-dimethylbenzene	<0.01
1-tert-Butyl-4-ethylbenzene	<0.01
n-Dodecane	<0.01
1,3,5-Triethylbenzene	<0.01
1,2,4-Triethylbenzene	<0.01
Naphthalene	<0.01
n-Hexylbenzene	<0.01
2-Methylnaphthalene	<0.01
n-Tridecane	<0.01
1-Methylnaphthalene	<0.01
n-Tetradecane	<0.01
n-Pentadecane	<0.01

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

Date of Report: 09/27/99

Date Received: 08/10/99

Project: 1999-08-0100

Date Analyzed: 09/07/99

**RESULTS FROM THE ANALYSIS OF THE PRODUCT SAMPLE
FOR PARAFFINS, ISOPARAFFINS, OLEFINS,
NAPHTHENES, AND AROMATICS
Results Reported as % by Weight**

PIANO SUMMARY

Laboratory ID 908048-01
Client ID HP-5-W

	<u>Weight Percent</u>
Total Identified Compounds	7.66
Oxygenated Compounds	<0.01
Hydrocarbon Compounds	7.66
Unidentified Compounds	92.34
Total	100.00

	Paraffins	Isoparaffins	Aromatics	Naphthenes	Olefins	Total
C3	<0.01				<0.01	<0.01
C4	<0.01	<0.01			<0.01	<0.01
C5	<0.01	<0.01		<0.01	<0.01	<0.01
C6	4.31	0.10	<0.01	0.79	<0.01	5.20
C7	<0.01	0.08	<0.01	0.13	0.04	0.24
C8	<0.01	0.22	<0.01	0.69	<0.01	0.91
C9	<0.01	0.54	<0.01	0.28	<0.01	0.82
C10	<0.01	0.48	<0.01	<0.01		0.48
C11	<0.01		<0.01			<0.01
C12	<0.01		<0.01			<0.01
C13	<0.01					<0.01
C14	<0.01					<0.01
C15	<0.01					<0.01
Total	4.31	1.42	<0.01	1.88	0.04	7.66

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

Date of Report: 09/27/99

Date Received: 08/10/99

Project: 1999-08-0100

Date Extracted: 09/03/99

Date Analyzed: 09/10/99

RESULTS FROM THE ANALYSIS OF THE PRODUCT SAMPLE
FOR TOTAL METALS BY
INDUCTIVELY COUPLED PLASMA (ICP)
(METHOD 6010)

Results Reported as $\mu\text{g/g}$ (ppm)

<u>Sample ID</u> Laboratory ID	<u>HP-5-W</u> 908048-01	<u>Method Blank</u>
Analyte:		
Barium	14	<10
Cadmium	<1	<1
Chromium	<1	<1
Lead	2	<2
Copper	1	<1
Nickel	1	<1
Zinc	2	<1
Manganese	14	<2

FRIEDMAN & BRUYA, INC.

ENVIRONMENTAL CHEMISTS

Date of Report: 09/27/99

Date Received: 08/10/99

Project: 1999-08-0100

QUALITY ASSURANCE RESULTS
FOR TOTAL METALS BY
INDUCTIVELY COUPLED PLASMA (ICP)
(METHOD 6010)

Laboratory Code: 909001-01 (Duplicate)

Analyte	Reporting Units	Sample Result	Duplicate Result	Relative Percent Difference	Acceptance Criteria
Barium	ug/g (ppm)	<10	<10	nm	0-20
Cadmium	ug/g (ppm)	<1	<1	nm	0-20
Chromium	ug/g (ppm)	<1	<1	nm	0-20
Lead	ug/g (ppm)	<2	<2	nm	0-20
Copper	ug/g (ppm)	2	2	0	0-20
Nickel	ug/g (ppm)	<1	<1	nm	0-20
Zinc	ug/g (ppm)	2	2	0	0-20
Manganese	ug/g (ppm)	<2	<2	nm	0-20

Laboratory Code: (Matrix Spike)

Analyte	Reporting Units	Spike Level	Sample Result	% Recovery MS	% Recovery MSD	Acceptance Criteria	RPD
Barium	ug/g (ppm)	5	<10	109	107	80-120	2
Cadmium	ug/g (ppm)	5	<1	104	102	80-120	2
Chromium	ug/g (ppm)	5	<1	93	91	80-120	2
Lead	ug/g (ppm)	10	<2	87	85	80-120	2
Copper	ug/g (ppm)	5	2	105	103	80-120	2
Nickel	ug/g (ppm)	10	<1	107	105	80-120	2
Zinc	ug/g (ppm)	5	2	107	104	80-120	3
Manganese	ug/g (ppm)	10	<2	106	104	80-120	2

Laboratory Code: Laboratory Control Sample

Analyte	Reporting Units	Spike Level	% Recovery LCS	% Recovery LCSD	Acceptance Criteria	RPD
Barium	ug/g (ppm)	5	107	105	80-120	2
Cadmium	ug/g (ppm)	5	105	106	80-120	1
Chromium	ug/g (ppm)	5	104	103	80-120	1
Lead	ug/g (ppm)	10	105	106	80-120	1
Copper	ug/g (ppm)	5	105	104	80-120	1
Nickel	ug/g (ppm)	10	108	109	80-120	1
Zinc	ug/g (ppm)	5	109	110	80-120	1
Manganese	ug/g (ppm)	10	101	106	80-120	5

nm - The analyte was not detected in one or more of the duplicate analyses. Therefore, calculation of the RPD is not applicable.

08048

CHROMALAB, INC.

Environmental Services (SDS) (DOHS 1094)

Lab: *Friedman & Bruya*

Sub-Contract

1220 Quarry Lane • Pleasanton, California 94566-4756
510/404-1919 • Facsimile 510/484-1096

BTS 8-10-99 B02

Chain of Custody

DATE 8/6/99 PAGE 1 OF 1

ANALYSIS REPORT

PROJECT
COMPANY
ADDRESS

*Gary Cook
Chromalab*

SAMPLES (SIGNATURE)

(PHONE NO.)

(FAX NO.)

Hydrocarbon
Fingerprint
by GC/FID

Chromalab Reference
or
Submission Number(s)

NUMBER OF CONTAINERS

SAMPLE ID.	DATE	TIME	MATRIX	PRESERV.
HP-5-W	8/5/99	0930	H2O	<input checked="" type="checkbox"/>

PROJECT INFORMATION

PROJECT NAME: _____
 PROJECT NUMBER: 1999-08-0100
 P.O. #: _____

SAMPLE RECEIPT

TOTAL NO OF CONTAINERS: _____
 HEAD SPACE: _____
 REC'D GOOD CONDITION/COLD: _____
 CONFORMS TO RECORD: _____

TAT STANDARD 5 DAY: _____
 24 48 72 OTHER

RELINQUISHED BY 1
Denise Harrington (DATE) _____
 (SIGNATURE)
D. Harrington (DATE) 1200
 (PRINTED NAME)
Chromalab (DATE) 8/9/99
 (COMPANY)

RELINQUISHED BY 2
 _____ (DATE) _____
 (SIGNATURE)
 _____ (DATE) _____
 (PRINTED NAME)
 _____ (DATE) _____
 (COMPANY)

RELINQUISHED BY 3
 _____ (DATE) _____
 (SIGNATURE)
 _____ (DATE) _____
 (PRINTED NAME)
 _____ (DATE) _____
 (COMPANY)

RECEIVED BY 1
S. Osborn (DATE) 9:30A
 (SIGNATURE)
S. Osborn (DATE) _____
 (PRINTED NAME)
F&B, Inc. (DATE) 8/10/99
 (COMPANY)

RECEIVED BY 2
 _____ (DATE) _____
 (SIGNATURE)
 _____ (DATE) _____
 (PRINTED NAME)
 _____ (DATE) _____
 (COMPANY)

RECEIVED BY (ALTERNATIVE) 3
 _____ (DATE) _____
 (SIGNATURE)
 _____ (DATE) _____
 (PRINTED NAME)
 _____ (DATE) _____
 (COMPANY)

SPECIAL INSTRUCTIONS/COMMENTS
Standard TAT

APPENDIX C
CPT DATA LOG AND DRILLERS REPORT



GREGG DRILLING & TESTING, INC.

SPECIALIZING IN ENVIRONMENTAL, GEOTECHNICAL AND IN-SITU TESTING

November 1, 1999

Jeff Hennier
Azure Environmental
828 Mission Avenue
San Rafael, CA 94901

**RE: CPT Site Investigation – FEDEX Station, 1600 63rd St., Emeryville, CA
October 21, 1999**

Dear Jeff,

Please find enclosed a data report and diskette for the site investigation work carried out at the above referenced site on October 21, 1999. Please contact me at our Martinez office if you have any questions/comments concerning the enclosed contents.

Sincerely,

A handwritten signature in black ink, appearing to read "Tim J. Boyd". The signature is fluid and cursive, with a large loop at the end.

Tim J. Boyd, Operations Manager – CRT Division



GREGG DRILLING & TESTING, INC.

SPECIALIZING IN ENVIRONMENTAL, GEOTECHNICAL AND IN-SITU TESTING

PRESENTATION OF CONE PENETRATION TEST DATA

SITE INVESTIGATION

**FEDEX STATION
EMERYVILLE, CALIFORNIA**

**Prepared for:
AZURE ENVIRONMENTAL
San Rafael, California**

**Prepared by:
GREGG IN SITU, INC.
Martinez, California**

**Prepared on:
November 1, 1999**

SOUTHERN CALIFORNIA: 2726 WALNUT AVENUE • SIGNAL HILL, CA 90806 • (562) 427-6899 • FAX (562) 427-3314

NORTHERN CALIFORNIA: 950 HOWE ROAD • MARTINEZ, CA 94553 • (925) 313-5800 • FAX (925) 313-0302

CENTRAL CALIFORNIA: P.O. BOX 3618 • PASO ROBLES, CA 93446 • (805) 226-9672

www.greggdrilling.com

TABLE OF CONTENTS

1.0 INTRODUCTION

2.0 FIELD EQUIPMENT & PROCEDURES

3.0 CONE PENETRATION TEST DATA & INTERPRETATION

APPENDIX

- CPT Plots
- Interpretation Chart
- Soil Sampling
- Pore Pressure Dissipation Plots
- Interpretation Output
- References
- Computer Diskette with ASCII Files

PRESENTATION OF CONE PENETRATION TEST DATA

1.0 INTRODUCTION

This report presents the results of a Cone Penetration Testing (CPT) program carried out at the FEDEX station site, located in Emeryville, CA. The work was performed on October 21, 1999. The scope of work was performed as directed by Azure Environmental personnel.

2.0 FIELD EQUIPMENT & PROCEDURES

The Cone Penetration Tests (CPT) were carried out by GREGG IN SITU, INC. of Martinez, CA using an integrated electronic cone system. The CPT soundings were performed in accordance with ASTM standards (D3441). A 20 ton capacity cone was used for all of the soundings. This cone has a tip area of 15 sq.cm. and friction sleeve area of 225 sq.cm. The cone is designed with an equal end area friction sleeve and a tip end area ratio of 0.85.

The cones used during the program recorded the following parameters at 5 cm depth intervals:

- Tip Resistance (Q_c)
- Sleeve Friction (F_s)
- Dynamic Pore Pressure (U_t)

The above parameters were printed simultaneously on a printer and stored on a computer diskette for future analysis and reference.

The pore water pressure element was located directly behind the cone tip. The pore water pressure element was 5.0 mm thick and consisted of porous plastic. Each of the elements were saturated in glycerin under vacuum pressure prior to penetration. Pore pressure dissipations were recorded at 5 second intervals when appropriate during pauses in the penetration.

A complete set of baseline readings was taken prior to each sounding to determine temperature shifts and any zero load offsets. Monitoring base line readings ensures that the cone electronics are operating properly.

The cones were pushed using GREGG's truck-mounted CPT rig, having a down pressure capacity of approximately 25 tons. One (1) CPT soundings was performed to a depth of approximately 130 feet. Test locations and depths were determined in the field by Azure Environmental personnel.

November 1, 1999

Azure Environmental
FEDEX Station
Emeryville, CA

3.0 CONE PENETRATION TEST DATA & INTERPRETATION

The cone penetration test data is presented in graphical form in the attached Appendix. Penetration depths are referenced to existing ground surface. This data includes CPT logs of measured soil parameters and a computer tabulation of interpreted soil types along with additional geotechnical parameters and pore pressure dissipation data.

The stratigraphic interpretation is based on relationships between cone bearing (Q_c), sleeve friction (F_s), and penetration pore pressure (U_t). The friction ratio (R_f), which is sleeve friction divided by cone bearing, is a calculated parameter that is used to infer soil behavior type. Generally, cohesive soils (clays) have high friction ratios, low cone bearing and generate large excess pore water pressures. Cohesionless soils (sands) have lower friction ratios, high cone bearing and generate little in the way of excess pore water pressures.

The interpretation of soils encountered on this project was carried out using recent correlations developed by Robertson et al, 1990. It should be noted that it is not always possible to clearly identify a soil type based on Q_c , F_s and U_t . In these situations, experience and judgment and an assessment of the pore pressure dissipation data should be used to infer the soil behavior type. The soil classification chart used to interpret soil types based on Q_c and R_f is provided in the Appendix.

We hope the information presented is sufficient for your purposes. If you have any questions, please do not hesitate to contact our office at (925) 313-5800.

Sincerely,



Tim J. Boyd
Operations Manager – CPT Division

REFERENCES

- Robertson, P.K. and Campanella, R.G. and Wightman, A., 1983 "SPT-CPT Correlations", Journal of the Geotechnical Division, ASCE, Vol. 109, No. GT11, Nov., pp. 1449-1460.
- Robertson, P.K. and Campanella, R.G., 1985 "Evaluation of Liquefaction Potential of Sands Using the CPT", Journal of Geotechnical Division, ASCE, Vol. III, No. 3, Mar., pp. 384-407.
- Robertson, P.K. and Campanella, R.G., Gillespie, D. and Grieg, J., 1986, "Use of Piezometer Cone Data", Proceedings of In Situ 86, ASCE Specialty Conference, Blacksburg, Virginia.
- Robertson, P.K. and Campanella, R.G., 1990, "Guidelines for Use, Interpretation and Application of the CPT and CPTU", UBC, Soil Mechanics Series No. 105, Civil Eng. Dept., Vancouver, B.C., V6T 1W5, Canada; also available from Hogentogler and Co., P.O. Box 385, Gaithersburg, MD 20877, 3rd Edition, 197 pp.
- Robertson, P.K., Campanella, R.G., Gillespie, D. and Rice, A., 1986, "Seismic CPT to Measure In Situ Shear Wave Velocity", Journal of Geotechnical Engineering, ASCE, Vol. 112, No. 8, pp. 791-803.

SUMMARY TABLE

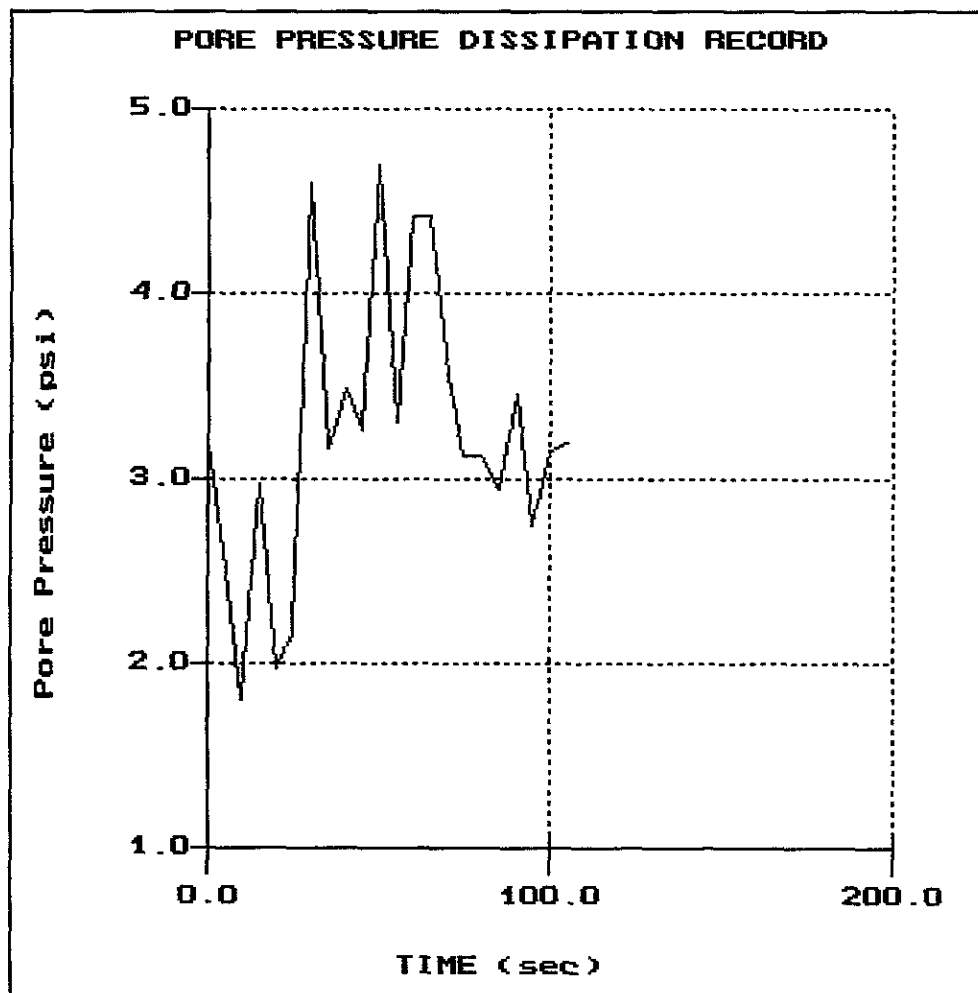
APPENDIX A
CPT DATA

AZURE ENVIR.

Hole: CPT-01

Geologist: J. Hennier

Location: 1600 63rd St. Date: 10:21:99 08:20



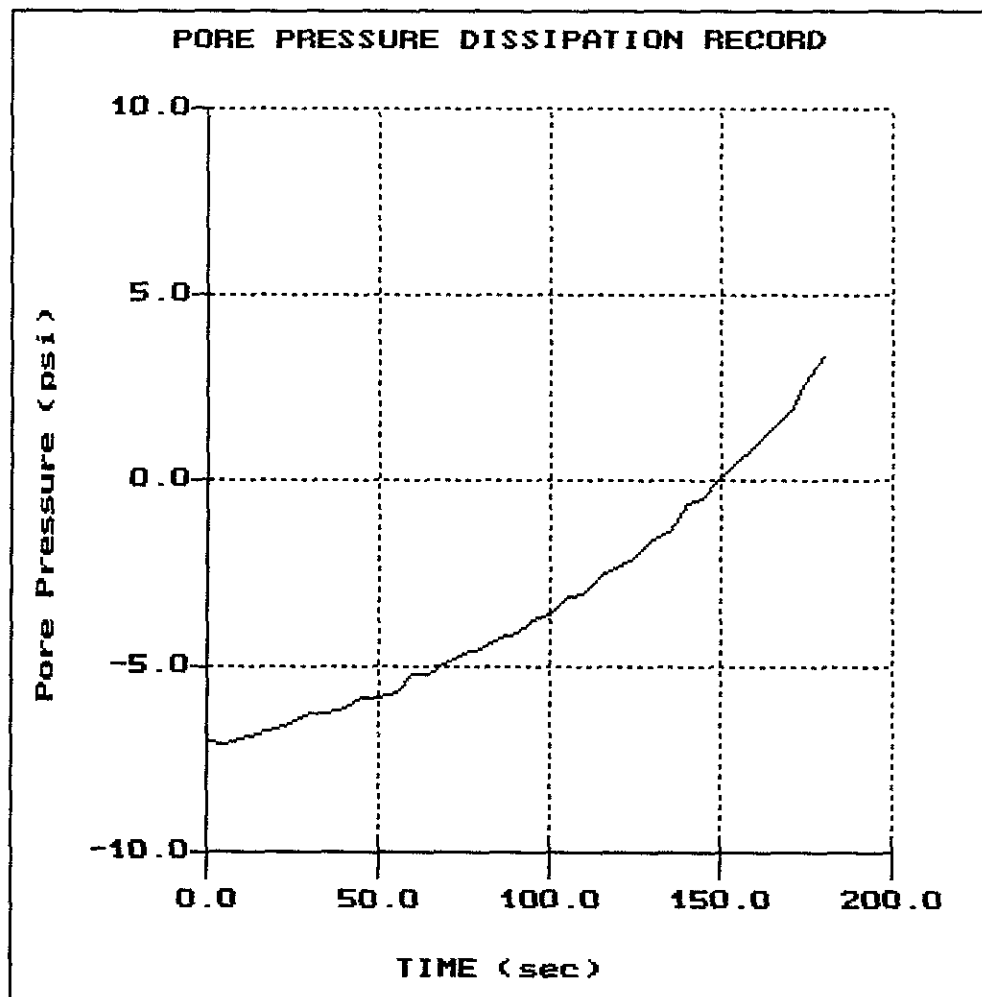
File: 119C01.PPR
Depth (m): 1.65
(ft): 5.41
Duration: 105.0s
U-min: 1.81 10.0s
U-max: 4.70 50.0s

AZURE ENVIR.

Hole: CPT-01

Geologist: J. Hennier

Location: 1600 63rd St. Date: 10:21:99 08:20



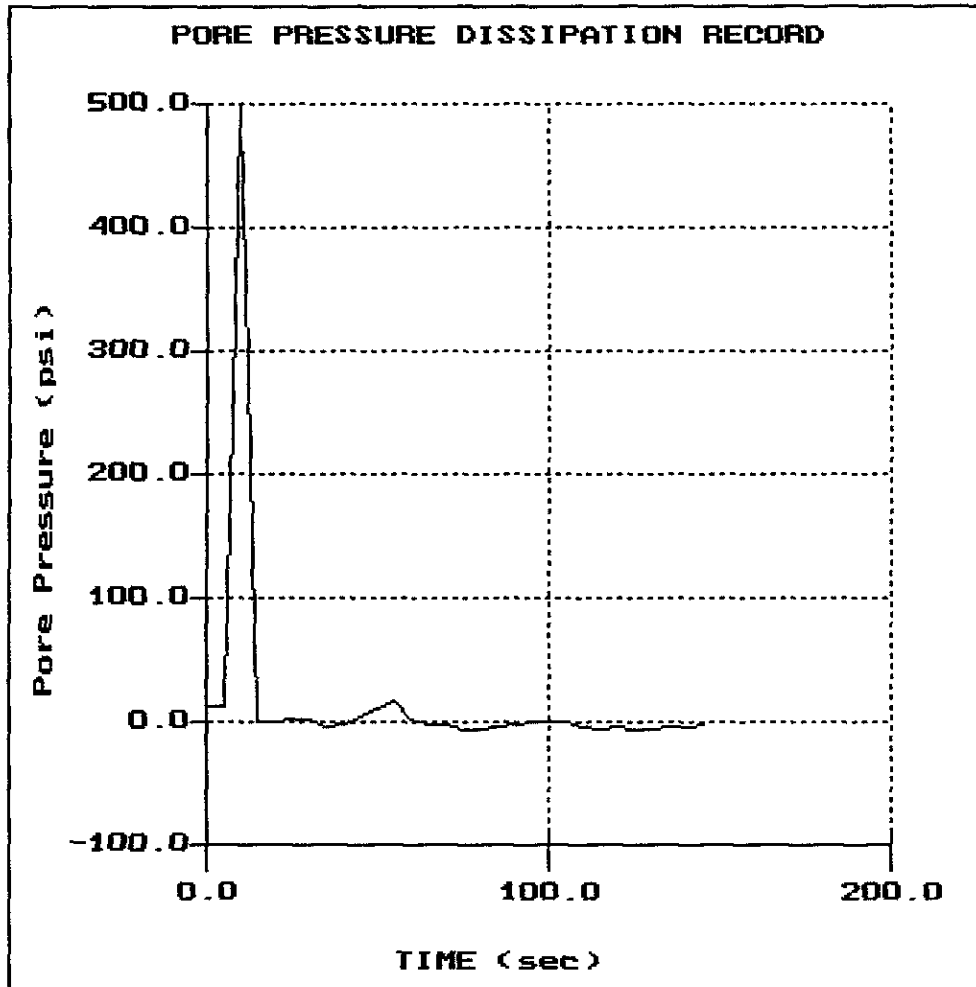
File: 119C01.PPR
Depth (m): 9.85
(ft): 32.32
Duration: 180.0s
U-min: -7.08 5.0s
U-max: 3.32 180.0s

AZURE ENVIR.

Hole: CPT-01

Geologist: J.Hennier

Location: 1600 63rd St. Date: 10:21:99 08:20



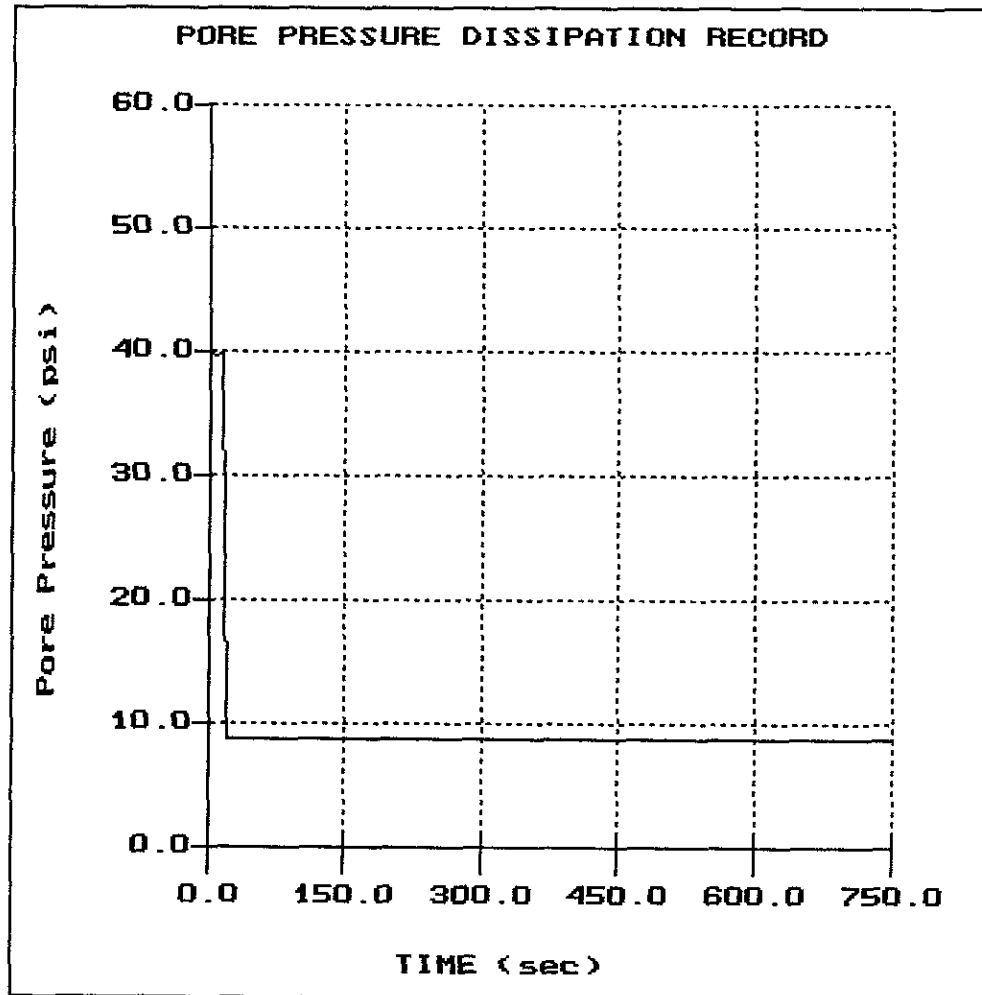
File: 119C01.PPR
Depth (m): 30.35
(ft): 99.57
Duration : 145.0s
U-min: -5.78 75.0s
U-max: 498.70 10.0s

AZURE ENVIR.

Hole: CPT-01

Geologist: J. Hennier

Location: 1600 63rd St. Date: 10:21:99 08:20



File: 119C01.PPR
Depth (m): 33.55
(ft): 110.07
Duration : 800.0s
U-min: 8.69 550.0s
U-max: 56.48 800.0s

Interpretation Output - Release 1.00.19c

Run No: 99-1101-0916-2426

b No: 99-XXX

Client: AZURE ENVIRONMENTAL

Project: 1600 63rd Street - Emeryville, CA

Site: 1600 63RD ST.

Location: CPT-01

Geologist: JEFF HENNIR

CPT Date: 99/21/10

CPT Time: 08:20

CPT File: 119C01.COR

 Water Table (m): 3.05 (ft): 10.0
 Averaging Increment (m): 0.30
 Su Nkt used: 12.50
 Phi Method : Robertson and Campanella, 1983
 Dr Method : Jamiolkowski - All Sands
 Used Unit Weights Assigned to Soil Zones

Depth (ft)	Depth (m)	AvgQt (tsf)	AvgFs (tsf)	AvgRf (%)	E.Stress (tsf)	Hyd. Pr. (tsf)	N60 (N1)60 (blows/ft)	Delta (N1)60 CS	Su (tsf)	CRR	Dr (%)	Phi (deg)	OCR (ratio)	SBT		
0.49	0.15	0.000	0.000	0.0	0.031	0.000	0.0	0.0	0.0	0.000	0.00	0.0	0.0	1.0	0	
1.48	0.45	0.000	0.000	0.0	0.092	0.000	0.0	0.0	0.0	0.000	0.00	0.0	0.0	1.0	0	
2.46	0.75	0.000	0.000	0.0	0.153	0.000	0.0	0.0	0.0	0.000	0.00	0.0	0.0	1.0	0	
3.44	1.05	0.000	0.000	0.0	0.214	0.000	0.0	0.0	0.0	0.000	0.00	0.0	0.0	1.0	0	
4.43	1.35	0.000	0.000	0.0	0.275	0.000	0.0	0.0	0.0	0.000	0.00	0.0	0.0	1.0	0	
5.41	1.65	7.344	0.179	2.4	0.334	0.000	4.7	8.1	8.1	16.2	0.561	0.10	0.0	0.0	6.0	4
6.40	1.95	13.666	0.755	5.5	0.389	0.000	13.1	21.0	0.0	21.0	1.062	0.00	0.0	0.0	6.0	3
7.30	2.22	16.536	0.936	5.7	0.439	0.000	15.8	23.9	0.0	23.9	1.288	0.00	0.0	0.0	6.0	3
8.20	2.50	21.749	0.892	4.1	0.491	0.000	13.9	19.8	19.8	39.7	1.701	0.41	0.0	0.0	6.0	4
9.19	2.80	17.721	0.677	3.8	0.547	0.000	11.3	15.3	15.3	30.6	1.374	0.23	0.0	0.0	6.0	4
10.17	3.10	18.019	0.563	3.1	0.598	0.005	8.6	11.2	11.2	22.3	1.393	0.22	0.0	0.0	6.0	5
11.15	3.40	30.874	0.782	2.5	0.624	0.036	11.8	15.0	8.8	23.8	2.417	0.16	39.7	38.0	6.0	6
12.14	3.70	92.629	2.128	2.3	0.650	0.067	29.6	36.8	7.1	43.8	0.000	0.41	70.7	44.0	1.0	7
13.21	4.02	75.950	2.323	3.1	0.679	0.100	29.1	35.3	11.7	47.0	6.014	0.39	64.3	42.0	10.0	6
14.27	4.35	142.882	5.097	3.6	0.706	0.133	54.7	65.1	0.0	65.1	11.363	0.00	81.9	46.0	10.0	6
15.26	4.65	59.905	2.685	4.5	0.732	0.164	28.7	33.5	0.0	33.5	4.721	0.00	0.0	0.0	10.0	5
16.24	4.95	124.406	4.137	3.3	0.758	0.195	47.7	54.8	0.0	54.8	9.876	0.00	76.9	44.0	10.0	6
17.22	5.25	121.594	2.665	2.2	0.784	0.226	38.8	43.8	7.3	51.2	0.000	0.00	75.7	44.0	1.0	7
18.21	5.55	88.261	1.836	2.1	0.811	0.256	28.2	31.3	7.1	38.4	0.000	0.32	66.1	42.0	1.0	7
19.19	5.85	28.655	0.929	3.2	0.838	0.287	13.7	15.0	15.0	30.0	2.202	0.41	0.0	0.0	6.0	5
20.18	6.15	90.174	1.318	1.5	0.865	0.318	21.6	23.2	3.8	27.0	0.000	0.25	65.8	42.0	1.0	8
21.16	6.45	92.963	2.578	2.8	0.892	0.348	35.6	37.7	12.1	49.8	7.338	0.44	66.2	42.0	10.0	6
22.15	6.75	185.368	3.644	2.0	0.919	0.379	59.2	61.7	6.5	68.3	0.000	0.00	85.6	46.0	1.0	7
23.13	7.05	113.370	3.022	2.7	0.946	0.410	36.2	37.2	10.1	47.3	0.000	0.00	71.0	42.0	1.0	7
24.11	7.35	143.978	2.621	1.8	0.973	0.441	46.0	46.6	6.5	53.1	0.000	0.00	77.5	44.0	1.0	7
25.10	7.65	171.652	2.538	1.5	1.001	0.471	41.1	41.1	3.4	44.5	0.000	0.00	82.1	44.0	1.0	8
26.08	7.95	116.211	1.970	1.7	1.029	0.502	37.1	36.6	6.4	43.0	0.000	0.38	70.5	42.0	1.0	7
27.07	8.25	19.352	0.613	3.2	1.056	0.533	9.3	9.0	9.0	18.0	1.421	0.15	0.0	0.0	6.0	5
28.05	8.55	22.426	0.469	2.1	1.081	0.564	8.6	8.3	8.3	16.5	1.662	0.19	30.0	32.0	6.0	6
29.04	8.85	39.358	1.171	3.0	1.107	0.594	18.8	17.9	17.6	35.6	3.013	0.00	0.0	0.0	6.0	5
30.02	9.15	25.112	0.543	2.2	1.133	0.625	9.6	9.0	9.0	18.1	1.868	0.22	30.0	34.0	6.0	6
31.00	9.45	30.650	0.732	2.4	1.158	0.656	11.7	10.9	10.9	21.8	2.307	0.33	30.7	34.0	6.0	6
31.99	9.75	32.641	0.712	2.2	1.184	0.687	12.5	11.5	11.5	23.0	2.462	0.37	32.1	36.0	6.0	6
32.97	10.05	29.903	0.753	2.5	1.210	0.717	11.5	10.4	10.4	20.8	2.238	0.30	30.0	34.0	6.0	6
33.96	10.35	21.361	0.830	3.9	1.235	0.748	13.6	12.3	0.0	12.3	1.550	0.00	0.0	0.0	6.0	4
34.94	10.65	15.955	0.581	3.6	1.261	0.779	10.2	9.1	0.0	9.1	1.113	0.00	0.0	0.0	3.0	4
35.92	10.95	17.319	0.697	4.0	1.286	0.809	16.6	14.6	0.0	14.6	1.218	0.00	0.0	0.0	3.0	3

Run No: 99-1101-0916-2426

CPT File: 119C01.COR

Depth (ft)	Depth (m)	AvgQt (tsf)	AvgPs (tsf)	AvgRf (%)	B.Stress (tsf)	Hyd. Pr (tsf)	N60 (blows/ft)	(N1)60	Delta (N1)60	Su (tsf)	CRR	Dr (%)	Phi (deg)	OCR (ratio)	SBT	
36.91	11.25	17.119	0.414	2.4	1.311	0.840	8.2	7.2	7.2	14.3	1.197	0.12	0.0	0.0	3.0	5
37.89	11.55	18.037	0.441	2.4	1.336	0.871	8.6	7.5	7.5	14.9	1.266	0.12	0.0	0.0	3.0	5
38.88	11.85	35.019	0.885	2.5	1.362	0.902	13.4	11.5	11.5	23.0	2.620	0.37	32.2	34.0	6.0	6
39.86	12.15	29.895	0.720	2.4	1.388	0.932	11.5	9.7	9.7	19.4	2.206	0.26	30.0	34.0	6.0	6
40.85	12.45	63.730	2.580	4.0	1.413	0.963	30.5	25.7	25.7	51.3	4.908	0.00	0.0	0.0	6.0	5
41.83	12.75	23.526	0.912	3.9	1.439	0.994	15.0	12.5	0.0	12.5	1.687	0.00	0.0	0.0	6.0	4
42.81	13.05	19.026	0.601	3.2	1.465	1.025	9.1	7.5	0.0	7.5	1.323	0.00	0.0	0.0	3.0	5
43.80	13.35	48.850	2.070	4.2	1.490	1.055	23.4	19.2	19.2	38.3	3.704	0.00	0.0	0.0	6.0	5
44.78	13.65	34.302	1.325	3.9	1.516	1.086	16.4	13.3	0.0	13.3	2.536	0.00	0.0	0.0	6.0	5
45.77	13.95	61.246	2.103	3.4	1.542	1.117	29.3	23.6	23.6	47.2	4.687	0.00	0.0	0.0	6.0	5
46.75	14.25	100.337	3.500	3.5	1.567	1.147	38.4	30.7	19.3	50.0	7.810	0.00	60.3	40.0	10.0	6
47.74	14.55	23.281	0.548	2.4	1.593	1.178	8.9	7.1	7.1	14.1	1.641	0.15	30.0	32.0	6.0	6
48.72	14.85	23.944	0.637	2.7	1.618	1.209	11.5	9.0	9.0	18.0	1.689	0.15	0.0	0.0	6.0	5
49.70	15.15	33.898	1.069	3.2	1.644	1.240	16.2	12.7	12.7	25.3	2.481	0.28	0.0	0.0	6.0	5
50.69	15.45	50.670	2.200	4.3	1.670	1.270	24.3	18.8	0.0	18.8	3.818	0.00	0.0	0.0	6.0	5
51.67	15.75	60.432	3.819	6.3	1.699	1.301	57.9	44.4	0.0	44.4	0.000	0.00	44.6	36.0	1.0	11
52.66	16.05	50.590	1.970	3.9	1.729	1.332	24.2	18.4	18.4	36.8	3.802	0.00	0.0	0.0	6.0	5
53.64	16.35	54.080	2.381	4.4	1.755	1.363	25.9	19.6	0.0	19.6	4.077	0.00	0.0	0.0	6.0	5
54.63	16.65	111.287	5.141	4.6	1.784	1.393	106.6	79.8	67.6	147.4	0.000	0.00	61.4	40.0	1.0	11
55.61	16.95	77.610	4.979	6.4	1.818	1.424	74.3	55.1	0.0	55.1	0.000	0.00	50.8	38.0	1.0	11
56.59	17.25	48.902	1.788	3.7	1.847	1.455	23.4	17.2	17.2	34.5	3.648	0.00	0.0	0.0	6.0	5
57.58	17.55	48.791	1.880	3.9	1.873	1.486	23.4	17.1	17.1	34.1	3.635	0.00	0.0	0.0	6.0	5
58.56	17.85	43.988	1.682	3.8	1.899	1.516	21.1	15.3	15.3	30.6	3.246	0.43	0.0	0.0	6.0	5
59.55	18.15	44.956	1.661	3.7	1.924	1.547	21.5	15.5	15.5	31.0	3.319	0.45	0.0	0.0	6.0	5
60.53	18.45	56.387	2.444	4.3	1.950	1.578	27.0	19.3	0.0	19.3	4.229	0.00	0.0	0.0	6.0	5
61.51	18.75	45.980	1.642	3.6	1.976	1.608	22.0	15.7	15.7	31.3	3.392	0.00	0.0	0.0	6.0	5
62.42	19.02	41.894	1.187	2.8	1.999	1.637	16.0	11.4	11.4	22.7	3.061	0.36	31.8	34.0	6.0	6
63.32	19.30	41.770	1.260	3.0	2.023	1.665	20.0	14.1	14.1	28.1	3.047	0.36	0.0	0.0	6.0	5
64.30	19.60	40.812	1.360	3.3	2.048	1.696	19.5	13.7	13.7	27.3	2.965	0.33	0.0	0.0	6.0	5
65.29	19.90	61.848	3.226	5.2	2.078	1.726	59.2	41.1	0.0	41.1	0.000	0.00	42.4	36.0	1.0	11
66.27	20.20	66.374	3.620	5.5	2.111	1.757	63.6	43.8	0.0	43.8	0.000	0.00	44.2	36.0	1.0	11
67.26	20.50	29.054	0.904	3.1	2.141	1.788	13.9	9.5	0.0	9.5	2.010	0.00	0.0	0.0	3.0	5
68.24	20.80	76.362	3.642	4.8	2.170	1.818	73.1	49.6	0.0	49.6	0.000	0.00	47.8	36.0	1.0	11
69.22	21.10	112.509	5.592	5.0	2.204	1.849	107.7	72.6	72.6	145.2	0.000	0.00	58.7	38.0	1.0	11
70.21	21.40	122.040	6.511	5.3	2.237	1.880	116.9	78.1	78.1	156.3	0.000	0.00	60.8	40.0	1.0	11
71.19	21.70	182.077	8.636	4.7	2.271	1.911	174.4	115.7	0.0	115.7	0.000	0.00	72.1	42.0	1.0	11
72.18	22.00	196.286	9.523	4.9	2.304	1.941	188.0	123.8	0.0	123.8	0.000	0.00	74.0	42.0	1.0	11
73.16	22.30	74.527	4.264	5.7	2.338	1.972	71.4	46.7	0.0	46.7	0.000	0.00	46.1	36.0	1.0	11
74.15	22.60	58.697	1.900	3.2	2.367	2.003	22.5	14.6	14.6	29.2	4.346	0.00	39.0	34.0	6.0	6
75.13	22.90	54.326	1.629	3.0	2.393	2.034	20.8	13.5	13.5	26.9	3.992	0.00	36.7	34.0	6.0	6
76.11	23.20	46.169	1.539	3.3	2.419	2.064	22.1	14.2	14.2	28.4	3.335	0.37	0.0	0.0	6.0	5
77.10	23.50	36.174	1.083	3.0	2.444	2.095	17.3	11.1	11.1	22.2	2.531	0.21	0.0	0.0	6.0	5
78.08	23.80	39.691	1.118	2.8	2.470	2.126	15.2	9.7	9.7	19.4	2.808	0.26	30.0	32.0	6.0	6
79.07	24.10	50.717	1.438	2.8	2.496	2.156	19.4	12.3	12.3	24.6	3.685	0.44	34.1	32.0	6.0	6
80.05	24.40	42.435	1.771	4.2	2.521	2.187	20.3	12.8	0.0	12.8	3.018	0.00	0.0	0.0	6.0	5
81.04	24.70	44.467	1.721	3.9	2.547	2.218	21.3	13.3	0.0	13.3	3.176	0.00	0.0	0.0	6.0	5
82.02	25.00	64.439	3.726	5.8	2.577	2.249	61.7	38.4	0.0	38.4	0.000	0.00	40.5	34.0	1.0	11
83.00	25.30	72.817	3.737	5.1	2.610	2.279	69.7	43.2	0.0	43.2	0.000	0.00	43.8	36.0	1.0	11
83.99	25.60	71.081	3.519	5.0	2.644	2.310	68.1	41.9	0.0	41.9	0.000	0.00	42.9	34.0	1.0	11
84.97	25.90	76.720	4.162	5.4	2.677	2.341	73.5	44.9	0.0	44.9	0.000	0.00	44.9	36.0	1.0	11
85.96	26.20	86.396	5.727	6.6	2.711	2.372	82.7	50.3	0.0	50.3	0.000	0.00	48.2	36.0	1.0	11
86.94	26.50	71.729	4.003	5.6	2.744	2.402	68.7	41.5	0.0	41.5	0.000	0.00	42.7	34.0	1.0	11
87.93	26.80	53.856	1.766	3.3	2.774	2.433	25.8	15.5	15.5	31.0	3.892	0.45	0.0	0.0	6.0	5
88.91	27.10	51.675	1.502	2.9	2.799	2.464	19.8	11.8	11.8	23.7	3.713	0.40	33.0	32.0	6.0	6

Run No: 99-1101-0916-2426

CPT File: 119C01.COR

Depth (ft)	Depth (m)	AvgQt (tsf)	AvgF ₈ (tsf)	AvgR _f (%)	E.Stress (tsf)	Hyd. Pr. (tsf)	N60 (N1)60 (blows/ft)	Delta (N1)60 (N1)60	CS	Su (tsf)	CRR	Dr (%)	Phi (deg)	OCR (ratio)	SBT	
89.89	27.40	45.482	0.974	2.1	2.825	2.495	17.4	10.4	10.4	20.7	3.213	0.30	30.0	32.0	6.0	6
90.88	27.70	47.645	1.004	2.1	2.851	2.525	18.3	10.8	10.8	21.6	3.382	0.32	30.4	32.0	6.0	6
91.86	28.00	59.846	1.659	2.8	2.876	2.556	22.9	13.5	13.5	27.0	4.353	0.00	36.8	34.0	6.0	6
92.85	28.30	57.211	1.659	2.9	2.902	2.587	21.9	12.9	12.9	25.7	4.138	0.00	35.4	32.0	6.0	6
93.83	28.60	103.868	5.553	5.3	2.931	2.617	99.5	58.1	0.0	58.1	0.000	0.00	52.3	36.0	1.0	11
94.82	28.90	67.046	2.561	3.8	2.961	2.648	32.1	18.7	0.0	18.7	4.915	0.00	0.0	0.0	6.0	5
95.80	29.20	78.298	3.138	4.0	2.987	2.679	37.8	21.7	21.7	43.4	5.811	0.00	0.0	0.0	6.0	5
96.78	29.50	124.625	6.292	5.0	3.016	2.710	119.3	68.7	0.0	68.7	0.000	0.00	57.1	38.0	1.0	11
97.77	29.80	163.773	8.115	5.0	3.050	2.740	156.8	89.8	89.8	179.6	0.000	0.00	64.8	38.0	1.0	11
98.75	30.10	187.937	8.549	4.5	3.083	2.771	180.0	102.5	87.7	190.3	0.000	0.00	68.6	40.0	1.0	11
99.74	30.40	169.393	4.457	2.6	3.114	2.802	54.1	30.6	17.5	48.2	0.000	0.00	65.5	40.0	1.0	7
100.72	30.70	165.083	11.043	6.7	3.144	2.833	158.1	89.2	0.0	89.2	0.000	0.00	64.6	38.0	1.0	11
101.70	31.00	124.502	7.739	6.2	3.177	2.863	119.2	66.9	0.0	66.9	0.000	0.00	56.4	38.0	1.0	11
102.69	31.30	55.985	2.157	3.9	3.207	2.894	26.8	15.0	0.0	15.0	3.991	0.00	0.0	0.0	6.0	5
103.67	31.60	44.312	1.621	3.7	3.233	2.925	21.2	11.8	0.0	11.8	3.052	0.00	0.0	0.0	3.0	5
104.66	31.90	50.357	2.042	4.1	3.258	2.955	24.1	13.4	0.0	13.4	3.531	0.00	0.0	0.0	6.0	5
105.64	32.20	56.595	2.284	4.0	3.284	2.986	27.1	15.0	0.0	15.0	4.026	0.00	0.0	0.0	6.0	5
106.63	32.50	67.614	2.693	4.0	3.310	3.017	32.4	17.8	0.0	17.8	4.903	0.00	0.0	0.0	6.0	5
107.61	32.80	57.986	2.194	3.8	3.335	3.048	27.8	15.2	0.0	15.2	4.128	0.00	0.0	0.0	6.0	5
108.59	33.10	43.291	1.880	4.3	3.361	3.078	27.6	15.1	0.0	15.1	2.948	0.00	0.0	0.0	3.0	4
109.58	33.40	52.734	2.428	4.6	3.387	3.109	33.7	18.3	0.0	18.3	3.699	0.00	0.0	0.0	6.0	4
110.56	33.70	61.674	2.443	4.0	3.412	3.140	29.5	16.0	0.0	16.0	4.410	0.00	0.0	0.0	6.0	5
111.55	34.00	61.712	2.020	3.3	3.438	3.171	23.6	12.8	12.8	25.5	4.408	0.00	35.1	32.0	6.0	6
112.53	34.30	84.274	3.706	4.4	3.467	3.201	80.7	43.3	0.0	43.3	0.000	0.00	43.9	34.0	1.0	11
113.52	34.60	127.849	6.843	5.4	3.501	3.232	122.4	65.4	0.0	65.4	0.000	0.00	55.7	38.0	1.0	11
114.50	34.90	79.239	4.252	5.4	3.534	3.263	75.9	40.4	0.0	40.4	0.000	0.00	41.9	34.0	1.0	11
115.48	35.20	84.506	3.909	4.6	3.568	3.294	80.9	42.8	0.0	42.8	0.000	0.00	43.6	34.0	1.0	11
116.47	35.50	92.118	4.969	5.4	3.601	3.324	88.2	46.5	0.0	46.5	0.000	0.00	45.9	34.0	1.0	11
117.45	35.80	60.385	2.277	3.8	3.631	3.355	28.9	15.2	0.0	15.2	4.272	0.00	0.0	0.0	6.0	5
118.44	36.10	59.826	2.369	4.0	3.657	3.386	28.6	15.0	0.0	15.0	4.223	0.00	0.0	0.0	6.0	5
119.42	36.40	54.079	2.010	3.7	3.682	3.416	25.9	13.5	0.0	13.5	3.758	0.00	0.0	0.0	6.0	5
120.41	36.70	52.057	1.860	3.6	3.708	3.447	24.9	12.9	0.0	12.9	3.592	0.00	0.0	0.0	3.0	5
121.39	37.00	58.186	2.456	4.2	3.734	3.478	27.9	14.4	0.0	14.4	4.078	0.00	0.0	0.0	6.0	5
122.37	37.30	57.079	2.526	4.4	3.759	3.509	27.3	14.1	0.0	14.1	3.985	0.00	0.0	0.0	6.0	5
123.36	37.60	59.013	2.225	3.8	3.785	3.539	28.3	14.5	0.0	14.5	4.135	0.00	0.0	0.0	6.0	5
124.34	37.90	73.244	3.042	4.2	3.811	3.570	35.1	18.0	0.0	18.0	5.269	0.00	0.0	0.0	6.0	5
125.33	38.20	81.888	3.761	4.6	3.840	3.601	78.4	40.0	0.0	40.0	0.000	0.00	41.6	34.0	1.0	11
126.31	38.50	75.799	3.462	4.6	3.874	3.632	72.6	36.9	0.0	36.9	0.000	0.00	39.3	32.0	1.0	11
127.30	38.80	65.660	2.807	4.3	3.903	3.662	31.4	15.9	0.0	15.9	4.648	0.00	0.0	0.0	6.0	5
128.28	39.10	66.994	2.844	4.2	3.929	3.693	32.1	16.2	0.0	16.2	4.750	0.00	0.0	0.0	6.0	5
129.26	39.40	68.236	3.079	4.5	3.955	3.724	32.7	16.4	0.0	16.4	4.845	0.00	0.0	0.0	6.0	5
130.25	39.70	79.849	3.539	4.4	3.980	3.754	38.2	19.2	0.0	19.2	5.769	0.00	0.0	0.0	6.0	5

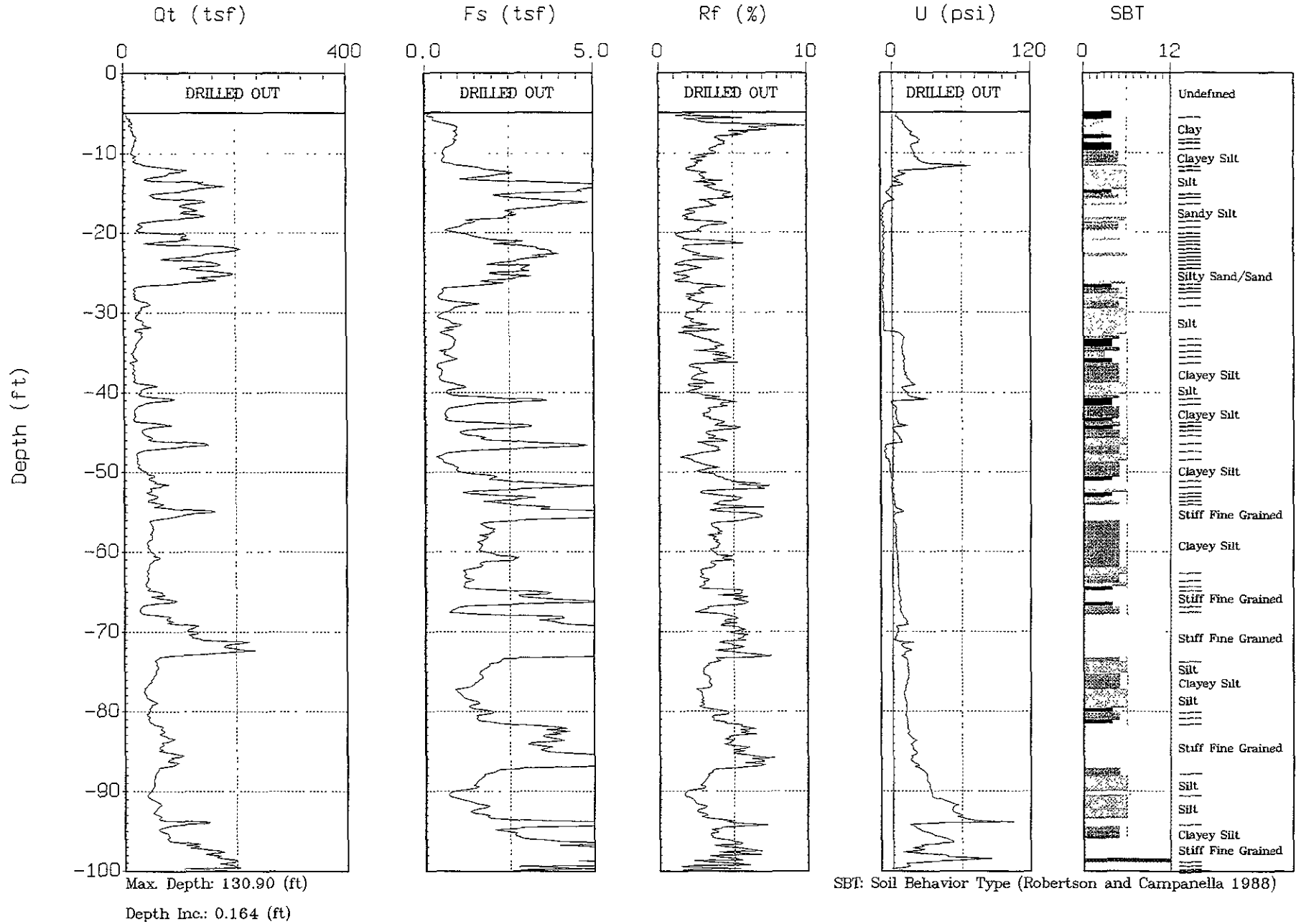
APPENDIX B
FIGURES



AZURE ENVIR.

Site: 1800 63RD ST
Location: CPT-01

Geologist: JEFF HENNER
Date: 10/21/99 08:20

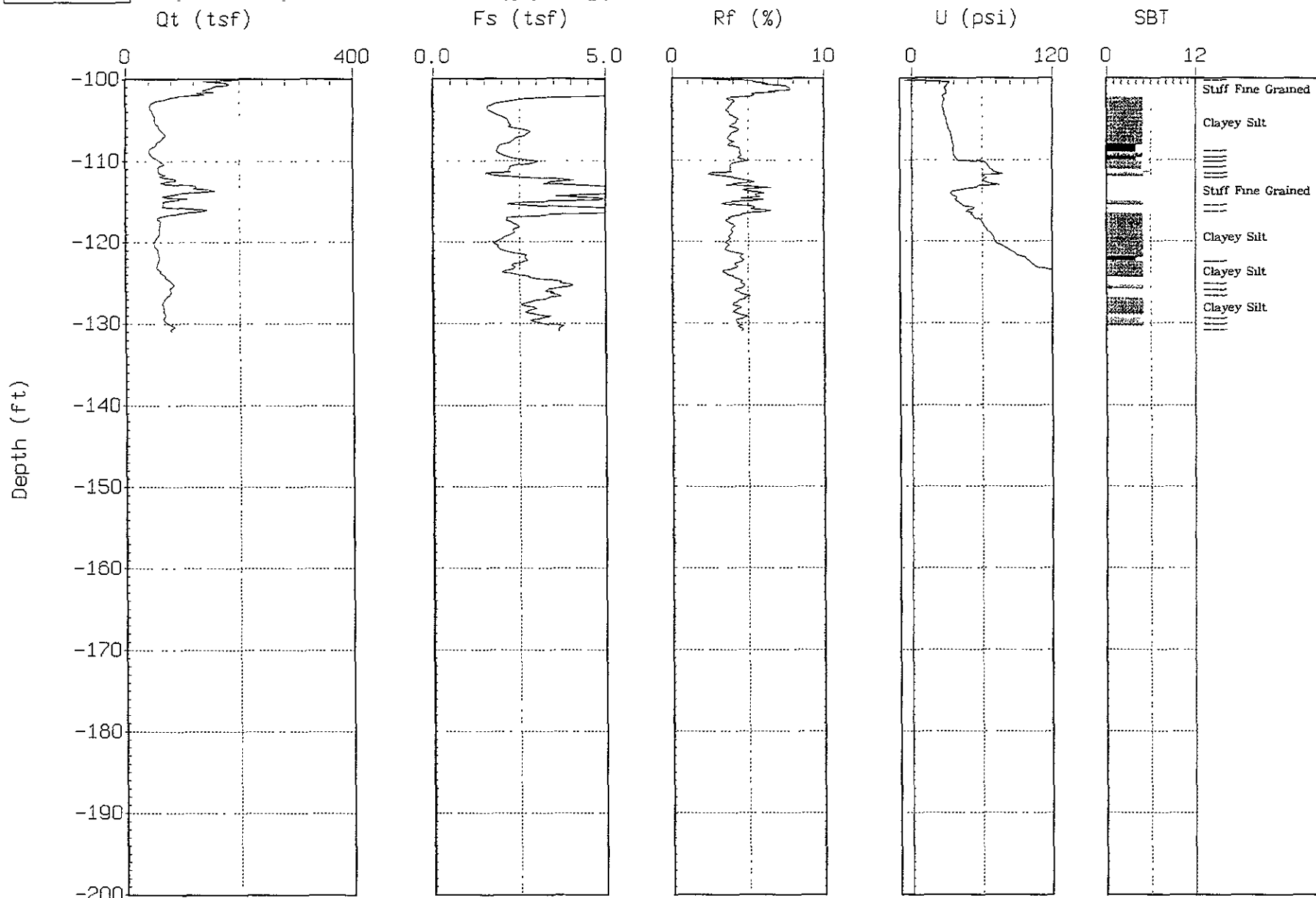




AZURE ENVIR.

Site 1600 63RD ST
Location CPT-01

Geologist: JEFF KENNEDY
Date: 10/21/99 08:20



Max. Depth: 130.90 (ft)

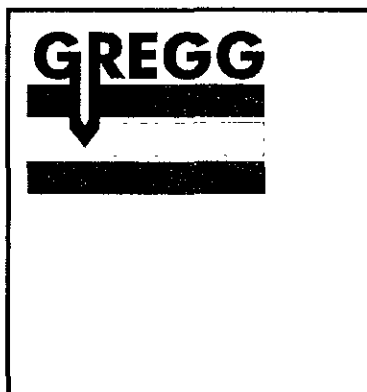
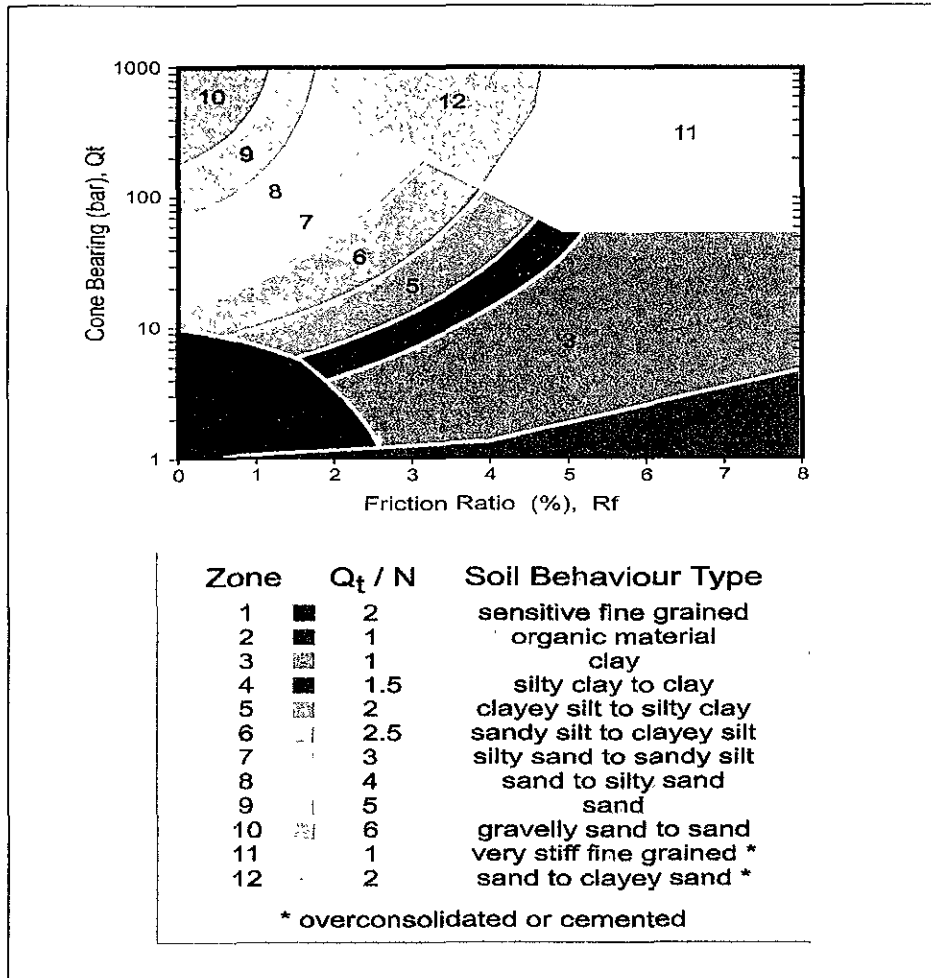
Depth Inc.: 0.164 (ft)

SBT: Soil Behavior Type (Robertson and Campanella 1988)

CPT Classification Chart

(after Robertson 1990)

Non-Normalized Classification Chart



Geotechnical and Environmental In Situ Testing Contractors

Los Angeles · San Francisco · Houston · Aiken
 Vancouver · Edmonton · Salt Lake City · New Jersey

Tel: (925)313-5800 · Fax: (925)313-0302 · E-mail: gregg@ecis.com