GOLDSMITH AND LATHROP
COMMERCIAL AND INDUSTRIAL REAL ESTATE

July 19, 1989

CERTIFIED MAIL
Mr. Airu Levi
Alameda County Health Care Services
Hazardous Materials Divisions
80 Swan Way, Room 200
Oakland, CA 94261

Dear Mr. Levi:

My office represents the owners of the Watergate Office Complex in Emeryville, California. As part of a pending business transaction, the owners retained Woodward-Clyde as consultants to perform an environmental site assessment of the property. Enclosed is a copy of their report.

The site assessment was prepared in three phases. Phase One (January 24, 1989) is an historical review of the property; Phase Two (March 29, 1989) is a subsurface investigation and chemical analysis; Phase Three (June 16, 1989) consists of a verification sampling and chemical analysis, hydrogeology study and exposure assessment.

Please contact me in the event you require additional information or documentation. If you have any questions of a technical nature, please do not hesitate to contact Mr. Alan Lattanner at Woodward-Clyde Consultants (Telephone 874-3262).

Please be advised that we have met with and provided copies of the site assessment report to the State of California Regional Water Quality Control Board. Copies of the report have also been sent to the U. S. EPA and the Department of Health Services of the State of California.

Sincerely,

GOLDSMITH AND LATHROP

Thomas N. Lathrop

CC: Alan Lattanner, Woodward-Clyde Consultants
F. P. Lathrop
Roy Ikeda, Crosby, Heafey, Roach & May

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1800 Powell St

REPORT: PHASE II PRELIMINARY ENVIRONMENTAL SITE ASSESSMENT LATHROP PROPERTY EMERYVILLE, CALIFORNIA

Prepared for

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c/o Goldsmith and Lathrop
2000 Powell Street, Suite 1660
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March 29, 1989

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1.0 INTRODUCTION

1.1 PROJECT BACKGROUND

Woodward-Clyde Consultants (WCC) was retained by Mr. Thomas N. Lathrop on behalf of Mr. F.P. Lathrop to perform a preliminary environmental site assessment (PESA) of the Lathrop property, outlined in bold on Figure 1, in Emeryville, California. The work was divided into two phases: a background investigation (Phase I) and a subsurface investigation (Phase II). The final Phase I report was delivered to Mr. Thomas N. Lathrop on January 24, 1989. Results from the background investigation were used to develop the work plan for the subsurface investigation. Where appropriate, reference to the Phase I report will be made to reduce the volume of this report and provide continuity with previous observations, analyses and conclusions. This work was conducted according to Agreement Number 8810235A, dated January 13, 1989, between Mr. F.P. Lathrop and WCC.

1.2 OBJECTIVES AND SCOPE OF SERVICES

The Phase II subsurface investigation was performed to test soil and groundwater for the presence of chemical constitutents listed as hazardous by federal or state agencies. Sampling was performed at locations on the Lathrop property selected on the basis of results from the Phase I investigation. Chemical testing was specified based on Phase I results. Those constituents believed to have a significant possibility of presence in the subsurface were included in the laboratory testing program. The specific tests WCC requested of the laboratory are found on Table 1. The overall extent of work to identify potential sources or indications of

contamination was limited by the scope of services presented in the above-referenced Agreement.

The scope of services for the Phase II Preliminary Environmental Site Assessment, as outlined in Attachment 2 to the Agreement, included the following tasks:

- Task 1 - Finalize Work Plan
- Task 2 - Drilling, Sampling, and Surveying
- Task 3 - Chemical Analysis of Soil and Groundwater Samples
- Task 4 - Reports

This report describes the results of these tasks plus conclusions and recommendations for further action.

1.3 LIMITATIONS

We have performed our services for this project in accordance with our Agreement and with current professional standards for environmental site assessment investigations. No guarantees are either expressed or implied. Our investigation was limited to the Lathrop property described herein and our opinions are valid for that property only. They do not apply to adjacent properties or to other properties in the vicinity. The subsurface investigation performed was limited to a small number of sampling points. Because of the limited number of soil borings and groundwater monitoring wells sampled, it is possible that hazardous materials which were not detected may be present. Therefore, WCC cannot be held responsible if the investigation failed to detect the presence or quantity of all hazardous substances anywhere on or beneath the property.

There is no investigation which is thorough enough to preclude the presence of materials which now, or in the future, may be considered hazardous at the site. Because regulatory evaluation criteria are

constantly changing, concentrations of contaminants presently considered low may, in the future, fall under different regulatory standards that require remediation.

Opinions and judgments expressed herein, based on our understanding and interpretation of current regulatory standards, should not be construed as legal opinions. This document and the information contained herein have been prepared solely for the use of Mr. F.P. Lathrop. Any reliance on this report by third parties shall be at such party's sole risk.

2.0
SCOPE OF SERVICES

WCC performed the Phase II Preliminary Environmental Site Assessment in accordance with the scope of work described in Attachment 2 to the Agreement referenced in Section 1.1. That scope identified four basic tasks, reproduced in Section 1.2. The results of Phase II were integrated with those of Phase I in this document, the final report. A detailed description of each Phase II task is given below.

2.1 TASK 1 - FINALIZE WORK PLAN

A preliminary Phase II work plan was described under Task 4 of the Phase I Scope of Services. This was updated based on the Phase I findings and finalized for use by WCC personnel and subcontractors. Drilling locations were selected and approved or relocated in cooperation with client.

Sampling methods and a sampling schedule were finalized and a laboratory chemical testing program was specified. The testing program was based on information about possible contaminants revealed during the Phase I investigation.

2.2 TASK 2 - DRILLING AND SAMPLING

Field exploration to gather site-specific environmental data was performed. The scope of field activities included exploratory borings, soil sampling, conversion of exploratory borings to monitoring wells, development of the monitoring wells and sampling of the developed wells.

The soil and groundwater samples were taken to a state certified analytical laboratory for chemical testing.

Five exploratory borings were completed at the locations shown on Figure 1 - Project Site Map. The borings were drilled utilizing 8-inch diameter hollow-stem augers. After completion, each boring was converted to a groundwater monitoring well. The locations of these wells were determined based upon the locations of former bay fill reclamation cells (i.e., interior filled areas enclosed by reclamation dikes) beneath the Lathrop property. One or two monitoring wells were installed within each cell, on the assumption that fill materials might vary from cell to cell.

Each well was completed at depths ranging from 21½ to 27 feet. Drilling ceased when fill material had been penetrated to the depth of Bay Mud as shown on the boring logs in Appendix A. Soil samples from each boring were collected at depths of about 5, 10, 15, 20 and 25 feet or bottom of the borehole using a modified California sampler. The soil samples were retained in 2-inch-diameter by 4-inch-long thin wall brass liners contained within the drive sampler. The soil samples chosen for laboratory analyses were sealed on each end with Teflon tape secured by plastic end caps and vinyl tape. After sealing, the samples were labeled and placed in a chilled ice-chest for transportation to a state certified analytical laboratory. Chain-of-custody procedures were used for sample transportation and shipping.

A WCC geologist observed the drilling and soil sampling activities and prepared a geological log of each boring showing soil types, location of samples, water levels encountered within the boring, odors and field measurements of volatile organic compounds as detected by an OVA organic vapor meter. OVA measurements were taken in the headspace (the volume between cap and contents of the sample tube) above secondary samples from each drive. The following technique was used. The secondary sample was partially extruded from the brass liner, capped and allowed to sit for a

few moments. The cap was then pierced and the probe of the OVA meter inserted into the headspace. The ensuing reading indicated the headspace organic vapor concentration, as noted on the logs.

Augers were steam cleaned prior to use at each boring in order to reduce the potential for cross-contamination from one boring to another. Sampling equipment, including drive samplers and brass liners, was washed in Alconox detergent and triple-rinsed following each drive. The final rinse was performed using distilled water.

Conversion of soil borings to groundwater monitoring wells was accomplished by installing a 2-inch-diameter PVC flush-threaded well casing down the hollow-stem of the auger. In some wells, the augers became plugged with debris such that they had to be pulled out of the hole and the casing inserted directly. No significant sluffing or bridging problems hampered this direct insertion of casing. The screened section of the casing extended from the bottom of the boring to within 2-to-3-1/2 feet of the ground surface. A clean sand filter material was placed in the annulus around the well casing to a point about one foot above the top of the screened section. Bentonite pellets were placed above the sand filter material to a thickness of about two feet, or to a point within the boring such that a grout seal at least one foot thick could be placed, whichever was less. A cement bentonite slurry was placed from the top of the bentonite pellets to the surface. A locking well cap was placed in each well casing and locked prior to the end of each work day. Each well was completed such that the top of each well casing was located about 6 inches below the ground surface within a Christy box vault mounted flush with the ground surface. Soil cuttings from drilling activities were placed in 55-gallon drums. The drums were placed on wooden pallets and stored temporarily on site.

The wells were developed by both pumping and bailing to set the sand pack and remove sediment. Water was removed until it became relatively

clear and free of sediment. During well development the specific conductance and temperature of the water were tracked and recorded. The wells were allowed to stabilize for 24 hours after development. The stabilized groundwater levels were then measured and groundwater samples were collected. Prior to sampling three to five casing volumes of water were removed from the well until conductivity and temperature stabilized. Water samples were then obtained from either the bladder pump surface outlet or downhole using a Teflon bailer and placed in containers prepared and provided by the analytical laboratory. The water samples were placed in a chilled ice-chest for transportation under chain-of-custody procedures to the analytical laboratory. Groundwater removed from the wells prior to sampling and excess sample water was placed in 55-gallon barrels and stored temporarily on site.

2.3 TASK 3 - CHEMICAL ANALYSES OF SOIL AND GROUNDWATER SAMPLES

Soil and groundwater samples that were collected during drilling and water sampling were analyzed for specific substances inherent to materials identified in Phase I. All soil and groundwater samples were labeled and stored in an ice chest at the project site. The samples were shipped to a state certified analytical laboratory. Chain-of-custody records were kept to document the handling and transfer of the samples. Collection and chemical analysis of these samples were performed by approved EPA and DHS Methods. A schedule of chemical tests run is shown on Table 1. These analyses were run on one composite soil sample from each well and on one water sample from each well.

2.4 TASK 4 - REPORTS

Woodward-Clyde Consultants prepared a Health and Safety Plan and a final report on this project, as described below. The status of the Unauthorized Release Report is also discussed.

2.4.1 Health and Safety Plan

WCC developed a site-specific Health and Safety Plan (HSP) in accordance with WCC corporate guidelines. The HSP described procedures to be followed while work tasks were being performed at the site. WCC personnel working at the site were required to follow the requirements of the HSP. The HSP was also delivered to the drilling subcontractor, in advance of field operations, with instructions that WCC's HSP represented the minimum acceptable standards for health and safety compliance, recognizing that the special nature of their work might require additional precautions.

2.4.2 Unauthorized Release Report

Contaminated soil and groundwater were detected by laboratory chemical analyses during the investigation; regulatory agencies should be notified of this fact. In the case of fuel products such as gasoline, diesel, kerosene or fuel components such as benzene, toluene, xylene, or ethylbenzene, one appropriate form of notification is the Unauthorized Release Report program of the California Regional Water Quality Control Board (RWQCB). No such report is known to have been filed for this site to date.

2.4.3 Final Environmental Site Assessment Report

The information obtained from drilling, sampling and chemical testing has been compiled into this report documenting the Phase II work. Section 6.3 contains the Final Environmental Site Assessment Report required by this task.

3.0
TASK 1 - FINALIZE WORK PLAN

The objective of Task 1 was to finalize the drilling and testing program after consultation with the client about the findings of the Phase I investigation and the scope of the proposed Phase II preliminary work plan. As anticipated, there were a number of considerations that led to changes in the proposed preliminary work plan.

3.1 PRELIMINARY PHASE II WORK PLAN

This plan was developed by modifying standard operating procedures for subsurface investigation at hazardous waste sites to suit the special conditions at the Lathrop property. The plan called for borings to obtain soil samples in land reclamation fill cells that were identified in Phase I. The plan described drilling and sampling methods, sample transportation procedures and on-site protocols, as well as storage methodology for spoils produced during drilling. Laboratory tests and tool cleaning procedures were specified.

The plan also discussed conversion of soil borings to monitoring wells, well development and groundwater sampling, sample transportation procedures, soil and water disposal and on-site protocols. A laboratory testing schedule for both soil and water samples was shown along with "target chemical groups" that had been identified in the background investigation. The Preliminary Phase II Work Plan was included as an appendix in the Phase I report.

3.2 CHANGES TO PRELIMINARY PHASE II WORK PLAN

3.2.1 Number of Borings

The preliminary plan called for "up to six monitoring wells." Locations were determined in consultation with the client at a later date. Siting was proposed based on former locations of land reclamation fill cells as determined from historical aerial photographs and on logistical considerations at the site.

Although six wells were originally proposed, the locations of structures, roads and buried utilities forced relocation of the proposed site of one monitoring well. The only acceptable new location was less than 150 feet away from another proposed monitoring well site. Because it was felt that these would be too close together to yield significant additional data, one of the proposed sites was dropped from the program. All other wells were drilled according to the preliminary plan.

3.2.2 Sample Depths and Sampler Used

As stated in the preliminary plan, "samples will be collected at depths of about 5, 10, 15, 20, 25, and 30 feet..." The plan was modified in the field during drilling to include near-surface samples at 2' to 3' depth in MW-1 and MW-4. Three well borings were drilled through the base of the fill material and five feet into Bay Mud. A bottom-hole Bay Mud sample was taken in wells MW-1, MW-3 and MW-4. All well borings were otherwise sampled according to the preliminary plan.

4.0
TASK 2 - DRILLING AND SAMPLING

4.1 DRILLING

Drilling of monitoring well borings proceeded in this order: MW-2, MW-4, MW-1, MW-3, MW-5. Drilling on well MW-2 commenced on Thursday, January 12, 1989. A contract drilling rig and crew were used to drill and take soil samples. The drill rig was a CME-75 equipped with 8-inch diameter hollow-stem augers and operated by one driller with one helper. The rig came equipped with a 2-inch diameter modified California sampler and pneumatic sampler hammer. Clean brass tube liners for the sampler were provided by WCC.

Drilling and sampling were supervised by a WCC senior field technician. Each boring was drilled, sampled and completed as a 2-inch diameter groundwater monitoring well in accordance with the preliminary work plan and changes noted in Section 3.0. All five wells were completed by Monday, January 16, 1989.

Geological logs of the soil borings were prepared during drilling based on observations of soil samples and drill cuttings. These are shown in Appendix A, "Geologic Logs of Boreholes." A general summary of these observations is given here.

The borings ranged from 21-1/2 feet to 27 feet in depth. The typical geologic profile showed an upper layer of imported silty sand soil about 4 feet thick over a layer of silty clay mixed with landfill debris (concrete, wood, linoleum, fiberglass, roofing paper, asphalt shingles,

asbestos insulation) about 18 feet thick. Recent Bay Mud, a gray-to-black soft silty clay, was encountered below the fill material at depths ranging from 18 feet to 21 feet. This is the sequence that was anticipated in the final work plan.

During drilling WCC kept an organic vapor meter (OVA) in continuous operation both to monitor changes in ambient organic vapor concentrations caused by release of methane or other gases during drilling and to test the volatile organic content of soil samples. Windy, rainy weather conditions prevailed over the work period such that the OVA did not detect ambient volatile organics above off-site background levels. High wind also inhibited measurements on soil samples. The highest readings obtained were in MW-5 where a high of 1000 parts per million (ppm) was measured in a sample taken at 6 feet, just below the engineered fill. No other sample had a reading over 50 ppm.

4.2 SAMPLING

Soil sampling proceeded according to the preliminary work plan. Modification of the preliminary work plan sampling program, as described in Section 3.3, was started after completion of monitoring well MW-4 in order to sample Recent Bay Mud. Samples were recovered from all scheduled sample depths in all wells, although the presence of foreign materials sometimes jammed the sampler, forcing the drilling crew to take a second sample before drilling ahead. Samples were capped, tested with the OVA, labeled, and logged on WCC Chain-of-Custody forms in accordance with the work plan.

Groundwater sampling began 5 days after completion of the first monitoring well. Water level measurements were made and each well was developed by pumping water from the well into 55-gallon drums until specific conductance, temperature, and turbidity of the inflow stream stabilized. On average, this required 100 gallons of water to be extracted from each well. The well water levels were allowed to recover and then

water samples were taken for each analytical procedure, as described in the work plan. All scheduled samples were obtained. They were labeled and transported to a state certified analytical laboratory under Chain-of-Custody protocol as stated in the work plan. Chain-of-Custody documentation may be reviewed at WCC's offices.

Table 13 shows the values of several water parameters measured during sampling. Salinity ranged from 2% to 20% that of seawater. Water pH values were mildly basic, ranging from 7.5 to 8.2. All samples had slight hydrocarbon odors. The water level ranged from 6.7 feet to 9.0 feet below top of casing, corresponding approximately to mean sea level.

5.0 TASK 3 - CHEMICAL ANALYSIS OF SOIL AND GROUNDWATER SAMPLES

A suite of chemical tests was performed on soil and groundwater samples taken from the soil borings and monitoring wells. These tests were selected after the Phase I work had revealed the types of waste materials that might be present in the fill. Suspected chemicals included inorganic metals, organochlorine pesticides and volatile and semi-volatile organic compounds including petroleum hydrocarbons and poly-nuclear aromatic (PNA) compounds. The Environmental Protection Agency (EPA) and state agencies have established standardized testing protocols for these substances. The preliminary and final work plans listed the protocols required. These are reproduced in Table 1 along with a brief description of each test.

5.1 SOIL SAMPLE ANALYSIS

Soil samples from each well were combined into a single sample per well, called a "composite sample," for chemical analysis. Each composite soil sample was subjected to the prescribed suite of chemical tests. The practice of blending samples from shallow soil borings is an economy measure that significantly reduces laboratory costs and is a commonly accepted procedure in a preliminary investigation. Ideally, it will result in a value representing the average concentration of each chemical constituent in the borehole. However, it may also mask by dilution unusually high concentrations in any individual sample and is subject to loss of volatiles during blending.

Soil samples were analyzed by the analytical methods shown in Table 1, "Summary of Tests Run." Each of the tests measures the concentration of a

number of individual chemical species. Since most of the species for which tests were performed registered "Not Detected" (N.D.), summary tables were prepared showing only those chemicals that were found. Complete results for all soil tests run can be found in Appendix B. Summary Tables 2 through 5 will be discussed below.

5.1.1 Table 2 - Soil Analysis: Fuel and Lubricant Derivatives Detected

Composite soil samples were tested for four aromatic petroleum derivatives: benzene, toluene, xylene and ethylbenzene (BTXE). They were also analyzed for Total Petroleum Hydrocarbons (TPH) in both low and high boiling point ranges, characteristic of gasoline (low BP) and diesel/ kerosene fuels (high BP). Finally a test for total oil and grease was performed.

Two of the five borings had no detectable BTXE. Of those that did have detectable concentrations the highest measurements were as follows: benzene (0.26 ppm in MW-2), toluene (7.0 ppm in MW-1), xylene (86 ppm in MW-1) and ethylbenzene (6.6 ppm in MW-1).

Low BP hydrocarbons were highest in MW-1 at 1,100 ppm. High BP hydrocarbons were also highest in MW-1 at 1,500 ppm. Total oil and grease was highest in MW-2 at 40,000 ppm. Lesser concentrations of some of the above constituents were found in other wells, as shown in Table 2.

5.1.2 Table 3 - Soil Analysis: Other Organic Constituents Detected

Two types of organic constituents were detected using three test protocols: EPA 8080 (organochlorine pesticides), EPA 8240 (volatile organics) and EPA 8270 (semi-volatile organics). Table 3 shows the two groups of constituents detected. These two types are polynuclear aromatic (PNA) compounds and 2) other organic chemicals grouped together under the general class "organics". The tests did not detect any organochlorine pesticides. (BTXE detected by EPA 8240 are reported with other fuel components in Table 2.)

Three organic constituents were detected. In MW-1, 2-methylnaphthalene was found at a concentration of 7.3 parts per million (ppm), fluoranthene at 8.0 ppm and naphthalene at 76 ppm. In MW-2 only naphthalene was found at a concentration of 13 ppm. In MW-3, fluoranthene was found at 0.16 ppm. No organic constituents were detected in MW-4 or MW-5.

Eight polynuclear aromatic constituents were detected. In MW-1, phenathrene at 17 ppm and pyrene at 13 ppm were detected. In MW-3, benzo(a)anthracene was present in a concentration of 0.13 ppm as well as benzo(a)pyrene (0.25 ppm), benzo(b)fluoranthene (0.4 ppm), benzo(g,h,i)perylene (0.3 ppm), chrysene (0.38 ppm), indeno(1,2,3-cd)pyrene (.43 ppm) and pyrene (0.38 ppm). For comparison with tabulated standard water quality tables, PNA's were summed for each monitoring well. Total PNAs in MW-1 were 30 ppm and in MW-3 they were 2.1 ppm.

5.1.3 Table 4 - Soil Analysis: Inorganic Constituents Detected

Fifteen inorganic constituents were detected. For each constituent the highest concentration found in any one boring was: arsenic (4.8 ppm in MW-3), barium (210 ppm in MW-1), beryllium (0.3 ppm in MW-1), cadmium (1.1. ppm in MW-1), chromium III (120 ppm in MW-1), cobalt (7.2 ppm in MW-5), copper (62 ppm in MW-5), lead (550 ppm in MW-1), mercury (0.33 ppm in MW-1), molybdenum (2.1 ppm in MW-1), nickel (42 ppm in MW-5), selenium (0.33 ppm in MW-4), silver (0.56 ppm in MW-4), vanadium (56 ppm in MW-5) and zinc (670 ppm in MW-2). Lesser concentrations of some of these constituents were found in the other borings, as shown on Table 4.

5.1.4 Table 5 - Soil Analysis: Waste Extraction Test Results

Soluble concentrations of constituents in solid wastes are determined by performing the Waste Extraction Test (WET) described in Section 66700 of Title 22, California Administrative Code, or a variation of this test approved by the RWQCB. The test involves extraction of soluble constituents of solid waste using a solution containing citric acid. The

solution/waste mix is agitated for 48 hours followed by filtration and analysis of the liquid phase. Results are expressed in milligrams of extractable constituents per liter of extract (ppm). A variety of water quality criteria are listed in Marshack (1987)[1], which may be used to evaluate, on a preliminary basis, the WET results.

Composite soil samples from all five wells were analyzed using the WET. The WET uses an extract solution of citric acid titrated to a pH equal to 5.0. This may not be appropriate for conditions at the Lathrop property, as indicated by the measured pH values on groundwater samples from the site. Actual pHs in the groundwater ranged from 7.8 to 8.2, as shown in Table 13. Marshack (1987) says that "if a site being investigated presents neutral or basic conditions, deionized water or another more suitable extraction solution may be substituted for the standard WET buffer solution." The slightly basic conditions at the Lathrop property suggest that a more suitable extract solution would be deionized water having a neutral pH.

After the first round of WET analyses were performed using the standard buffer, one test was repeated using deionized water having a neutral pH to judge the effects. The results are shown side-by-side in Table 5. The effect was to reduce the concentration of some constituents and increase others. The results suggest that future analyses should be run at neutral pH to more closely simulate actual site conditions.

Eight constituents were extracted in detectable concentrations. For each constituent the highest concentration found in any one well was as follows: barium (3.8 ppm in MW-1), cadmium (0.54 ppm in MW-1, N.D. elsewhere), copper (5.3 ppm in MW-5), lead (6.5 ppm in MW-4), mercury (0.0013 ppm in MW-1, N.D. elsewhere), nickel (1.3 ppm in MW-1), vanadium

[1]Marshack, Jon, 1987, "The Designated Level Methodology for Waste Classification and Cleanup Level Determination", California Regional Water Quality Control Board, Central Valley Region.

(0.68 ppm in MW-4) and zinc (20 ppm in MW-2). Lesser concentrations of some of these constituents were found in other borings as shown in Table 5.

5.2 WATER ANALYSIS

Groundwater samples from each well were taken after developing and purging the wells in accordance with the work plan. Each water sample was subjected to the prescribed suite of chemical tests summarized in Table 1. As with soil samples, each test measured the concentration of a number of individual constituents. Most constituents for which tests were run were not detected. Tables 6, 7 and 8 show a summary of only those constituents detected. Results are reported in parts per billion (ppb) unless otherwise noted. Complete results for all tests run on water samples can be found in Appendix C.

5.2.1 Table 6 - Water Analysis: Fuel and Lubricant Derivatives Detected

Water samples were taken and tested for BTXE in a similar manner to that described for soil samples in Section 5.1.1. Results are reported in Table 6 in ppb. None of the wells was free of detectable fuel or lubricant derivatives. The highest detectable concentrations of BTXE were as follows: benzene (4.9 ppb in MW-2), toluene (430 ppb in MW-1), xylene (170 ppb in MW-1) and ethylbenzene (11 ppb in MW-1).

Low BP hydrocarbons were highest in MW-1 at 2,500 ppb. High BP hydrocarbons were highest in MW-3 and MW-4 at 540 ppb each. Total oil and grease was highest in MW-4 at 3,500 ppb. Lesser concentrations of some of the above constituents were found in other wells as shown in Table 6.

5.2.2 Table 7 - Water Analysis: Other Organic Constituents Detected

Water samples were tested for two other types of organic chemicals in a similar manner to that described for soils in Section 5.1.2. They are grouped here under the general class called "organics." Results are reported in Table 7 in ppb. None of the well water was free of detectable

organic constituents, but only one well, MW-4, had PNAs in the water sample.

Fourteen other organic constituents were detected. They are listed here followed by the highest concentration detected and the number of the monitoring well from which it came: acetone (280 ppb in MW-1), benzoic acid (510 ppb in MW-1), benzyl alcohol (6 ppb in MW-1), 2-butanone (55 ppb in MW-1), 2-hexanone (2,800 ppb in MW-1), methylene chloride (360 ppb in MW-3), diethyl phthalate (3 ppb in MW-4), fluorene (3 ppb in MW-4), phenol (78 ppb in MW-1), 2,4-dimethyphenol (76 ppb in MW-1), 2-methylphenol (32 ppb in MW-1), 4-methylphenol (110 ppb in MW-1), 2-methylnaphthalene (9 ppb in MW-4) and naphthalene (59 ppb in MW-1).

Two polynuclear aromatic constituents were detected. In MW-4 acenaphthene was present at 3 ppb. Also in MW-4 phenathrene was present at 4 ppb. As with soil samples, for comparison with some tabulated standard tables PNA's were summed for each monitoring well. Total PNAs in MW-4 were 7 ppb. No PNAs were detected in MW-1, MW-2, MW-3 or MW-5. Lesser concentrations of some of the above constituents were found in other wells as shown in Table 7.

5.2.3 Table 8 - Water Analysis: Inorganic Constituents Detected

Six inorganic constituents were detected in the water samples and are reported in Table 8 in parts per billion (ppb). For each constituent the highest concentration found in any one boring was: arsenic (37 ppb in MW-5), barium (1,400 ppb in MW-2), chromium III (150 ppb in MW-1), lead (700 ppb in MW-1), nickel (78 ppb in MW-5) and zinc (170 ppb in MW-4). Lesser concentrations of some of these constituents were found in other monitoring wells as shown in Table 8.

5.2.4 Table 9 - List of Detected Constituents also on Proposition 65 List

The Safe Drinking Water and Toxic Enforcement Act of 1986 ("Proposition 65") provided that the Governor of California prepare a list

of chemicals "known to the state to cause cancer or reproductive toxicity," (the "Governor's List"). This table shows those detected consitituents that are present on the Governor's List. No toxic dosage or concentration is given on the Governor's List that would indicate whether concentrations found at the site are sufficient to cause health-related problems.

6.0
TASK 4 - REPORTS

6.1 HEALTH AND SAFETY PLAN

A Health and Safety Plan was prepared for this project in advance of field work by WCC's Senior Toxicologist in cooperation with project personnel familiar with site conditions. Consideration was given to the chemical substances identified in the Phase I report as potentially present at the site, physical conditions expected during drilling and other factors. A copy of the plan was delivered to the project personnel and the drilling contractor prior to mobilization. At the site on the first day of drilling before commencement of operations, WCC's representative held a health and safety meeting at which the plan was discussed and all project personnel were given the opportunity to ask questions and comment on health and safety issues and the work plan in general. All project personnel signed "Compliance Agreements" in which they acknowledged their willingness to comply with health and safety plan requirements. A copy of the Health and Safety Plan and the signed compliance agreements are available for review at WCC's offices.

6.2 UNAUTHORIZED RELEASE REPORT

No unauthorized release report has been filed for this site to date as a result of this project. Fuel and lubricant derivatives were detected in soil and water samples in concentrations that may require filing an Unauthorized Release Report with the Regional Water Quality Control Board.

6.3 FINAL ENVIRONMENTAL SITE ASSESSMENT REPORT

The following section contains a review and analysis of the findings of the Phase I and Phase II Preliminary Environmental Site Assessment of the Lathrop property.

This report is organized as follows:

- Summary of Work Performed
- Analysis of Environmental Issues
- Alternatives for Action

6.3.1 Summary of Work Performed

The Preliminary Environmental Site Assessment of the Lathrop Property was performed in two phases. Phase I, a site history review, had the objective of generating the information needed for WCC to render an opinion about whether potential sources or indications of hazardous substance contamination were present on the Lathrop property. The results of this work, presented in a report submitted to Client on January 24, 1989, indicated the potential for contaminated soil and groundwater did exist. Phase II, a subsurface investigation, had the objective of obtaining sufficient information to assess whether or not there were hazardous materials or hazardous wastes in soil or groundwater on the property. The findings of this investigation were presented in the previous sections of this report. Both Phase I and Phase II findings are summarized below.

6.3.1.1 Phase I: Site History Review. The Phase I investigation examined certain conditions and historical facts related to buildings, grounds, construction history, tidelands reclamation history, nearby industrial operations in western Emeryville, public records of contaminated sites in the vicinity and other information. Several cases of soil and groundwater contamination were identified in western Emeryville as a result of the Phase I work. None of these were known or believed to directly impact

conditions on the Lathrop property; however, it was noted that the types of waste materials present at these other sites may have been disposed of at the Emeryville Peninsula as a result of reclamation activities. With regard to buildings and grounds on the Lathrop property, no hazardous waste issues were revealed that would warrant further investigation.

While subsurface conditions were not investigated during the Phase I work, the report noted that "there is reason to believe [hazardous] substances may have been dumped there in the past, prior to development." The report went on to note that, although reclamation operations ceased and development proceeded prior to modern closure requirements, some closure took place. This included removal of asbestos-like waste from the fill in some areas to be developed and installation of an engineered-fill cap resulting in vertical containment of the fill material between Bay Mud below and cap above. The report concluded that "fill materials present a low level of threat to groundwater or surface waters." A Phase II subsurface investigation was recommended to test for hazardous materials in soil and groundwater.

Some public records review data were left incomplete in the Phase I final report because site listings had not been received from government agencies. Two of three solicitations have now been answered; the third is still unavailable to us. Alameda County's "Governor's List" of reportable events under Proposition 65 is substantially covered by CERCLIS (the EPA's list of hazardous waste sites/spills) reporting requirements which, for purposes of this report, may be deemed sufficient to assess the Lathrop property from a public records review perspective. Of ten sites on the CERCLIS within the search radius defined in the Phase I report, eight are documented no further action (NFA). The remaining two are:

- Mike Roberts Color Productions
  6707 Bay Street, Emeryville 94608

- PG&E Emeryville
  4525 Hollis, Emeryville

It is merely noted herein that there was a reportable toxics event at these locations. No attempt was made to inquire into the nature of the problem. The RCRA data base lists numerous permitted transporters, generators, and TSDFs (transport, storage and disposal facilities) in Emeryville. Because no problems are known at these sites, other than those reported in Phase I, no further inquiry was made into conditions at those sites.

6.3.1.2 Phase II: Subsurface Investigation. Phase II involved drilling, soil and water sampling, analytical laboratory testing and evaluation of results. Five borings were drilled through the fill into Bay Mud at depths between 21 and 27 feet below surface. Borings were located so as to penetrate each reclamation cell (i.e., interior filled areas enclosed by reclamation dikes) present beneath the property. Soil samples were taken every 5 feet or so and analyzed as one composite sample per boring. Chemical test results for soil samples, reported in Section 5.1 of this report, showed several organic and inorganic constituents to be present in the soil.

The soil borings were completed as monitoring wells and developed with a small pump. After standing for several days each well was sampled as previously described in Section 4.2. Chemical test results for groundwater samples, reported in Section 5.2, showed several organic and inorganic constituents to be present in the water. A comparison of these results with a variety of potentially applicable or relevant criteria is the subject of discussion in Section 6.3.3.3.4.

The general finding was that the background water quality is comparable to marine water. This is reasonable because the groundwater is believed to be mainly saline waters entrapped in bay sediments. Comparison of water

quality findings with marine water quality goals (California Ocean Plan, S.F. Bay Basin Plan Table 12) reveals that arsenic, lead, nickel and zinc exceed those goals. For many of the detected constituents, in both soil and water samples, no marine water quality criteria are given in the California Ocean Plan or S.F. Bay Basin Plan. Water quality criteria for these constituents must be discussed in site-specific terms with the appropriate regulatory agencies, such as the California Regional Water Quality Control Board and the California Department of Health Services.

6.3.2 Analysis of Environmental Issues

The work performed raises a number of environmental issues that may be evaluated in terms of potential future environmental impacts. These issues are discussed below in order to develop preliminary conclusions about site conditions.

6.3.2.1 Migration from Off-Site Sources. The first issue considered is the problem of off-site contamination of soil and groundwater as it relates to the potential for subsurface contamination at the Lathrop property. Sources of off-site contamination may be divided into two types: those sources identified as a result of a records search of toxic sites cases, and other sources which are not matters of public record.

Public records of several toxics cases exist concerning sites within 2000 feet of the Lathrop property. All of these are located east of U.S. Highway 880. Migration of groundwater from these sites is not believed to have contributed significantly to the concentrations of detected constituents at the Lathrop property.

Regarding unknown sources, there is some evidence to suggest that an unknown off-site source may exist east of the eastern property line. A significant difference in water chemistry was noted between MW-1 and the other wells. These are shown on Table 10 by comparing results from MW-3 to MW-1. The differing water chemistries may result from: 1) MW-1 drilled

into a different reclamation cell that is hydraulically isolated and contains a greater waste load; or 2) contaminants are migrating from the east, off-site, toward the Lathrop property. Without further site hydrogeology characterization, it is not clear which of these, or other possible hypotheses, are correct.

6.3.2.2 Buildings and Grounds. No new issues were raised in the Phase II investigation based on WCC's findings of conditions in buildings, structures or on the grounds of the Lathrop property. Therefore buildings and grounds issues are not considered further in this report. A description of buildings and grounds conditions was given in the "Wells Fargo Realty Finance Environmental Questionnaire and Disclosure Statement" included as Appendix A in the Phase I report.

6.3.2.3 Soil Conditions. Both inorganic and organic substances were identified in composite soil samples taken from borings on the Lathrop property. Results of chemical analysis of composite soil samples are presented in their entirety in Appendix B. Some of these substances appear on one or more of the various published lists of hazardous criteria. The issue considered below relates to determining which of these criteria are relevant to this site and whether they are exceeded by any constituents detected in the soil samples. For soils, two significant criteria are the Total Threshold Limit Concentration and the Soluble Threshold Limit Concentration as determined by the Waste Extraction Test (Title 22, CAC, Division 4, Chapter 30, Section 66700). Because the Lathrop property is fully developed into commercial structures, parking lots and ancillary facilities, and capped beneath the surface with an engineered fill, routine exposure to contaminants via an unintentional disturbance of contaminated soil is perhaps a lesser concern than leaching by downward percolation of surface waters and subsequent groundwater contamination. With this in mind, WCC feels that the Soluble Threshold Limit Concentration is the appropriate criterion for comparison.

Table 11 shows a comparison of constituent concentrations against Soluble Threshold Limit Concentrations (STLCs) in those cases where STLCs exist for the constituent. None of the organic or polynuclear aromatic compounds listed are known to have STLCs. Determination of hazardous criteria for these constituents is subject to site-specific analysis and consultation with regulatory agencies.

Inorganic constituents are shown on Table 11 as extractable concentrations determined in accordance with the Waste Extraction Test (WET) procedure. Of the detected constituents, only lead exceeds the STLC, by a nominal amount (6.5 ppm detected vs. 5.0 ppm STLC).

6.3.2.4 Water Quality.
Discussed below are the following water quality issues:

- water quality goals
- beneficial use considerations
- applicable criteria
- comparison of findings to applicable criteria

Analysis of water quality involves the identification of the bodies of water which could be affected by the constituents detected in soil and groundwater at the Lathrop property and of numerical parameters indicative of the existing water quality. These are generally referred to as "water quality goals".

6.3.2.4.1 Water Quality Goals. The principles which the California Regional Water Quality Control Board (RWQCB) uses in evaluating site-specific cases are, first, that existing water quality (that is, the background water quality which would exist without the particular contaminants in question) should generally be maintained; and secondly, that the required water quality criteria selected should provide the proper assurances that beneficial uses will not be unreasonably affected. While

an investigation of water quality in the region was beyond the scope of this study, it may be reasonable to assume that the ambient marine water conditions in San Francisco Bay near Emeryville would provide a suitable background water quality and that criteria given in the California Ocean Plan on S.F. Bay Basin should apply.

6.3.2.4.2 Preliminary Beneficial Uses Considerations. Beneficial uses of the Central Bay are listed in the "Water Quality Control Plan, San Francisco Bay Basin" published by the RWQCB. These are subject to modification for site-specific factors at the Emeryville Peninsula, but are listed below for initial examination as an illustration of the types of beneficial uses previously found for the Bay.

Existing and Potential Beneficial Uses of Surface Waters

- Industrial Service Supply
- Industrial Process Supply
- Navigation
- Water Contact Recreation
- Non-Contact Water Recreation
- Ocean Commercial and Sport Fishing
- Wildlife Habitat
- Preservation of Rare and Endangered Species
- Fish Migration
- Fish Spawning
- Shellfish Harvesting
- Estaurine Habitat

Mitigating factors which tend to isolate the site from the environment or reduce threat to waters of the state include:

- No water wells are located within 2000 feet of the Lathrop property.
- The property is underlain by Bay Mud having very low hydraulic

conductivity and covered at ground surface by an engineered fill and contained by dikes.

- Surface water infiltration is probably very limited due to extensive pavement covering the site.
- Groundwater is believed to be highly saline and non-potable.
- The water table beneath the Lathrop property is at sea level, downgradient from all surrounding sources of recharge.

6.3.2.4.3 Applicable Criteria. Comparing the above information to the various water quality goals available in Marshack (1987) leads to selection of marine water quality goals for comparison to the findings. Specifically, the goals set forth in the California Ocean Plan and the S.F. Bay Basin Plan appear to be relevant and appropriate standards for this site. A beneficial uses assessment would be required to fully evaluate this opinion.

6.3.2.4.4 Comparison of Findings. Table 12 compares the findings from water quality analysis of samples taken from monitoring wells on the Lathrop property against the California Ocean Plan criteria ("Ocean Plan"), the San Francisco Bay Basin Plan ("Basin Plan") Effluent Limitations and the E.P.A.s Acute Toxicity for Saltwater Acquatic Life criteria selected above. No criteria exist for several of the detected constituents. Where they do, the table shows that four constituents exceed one or more of these marine water quality goals: arsenic, lead, zinc and nickel. No other constituents exceed the marine water quality criteria shown.

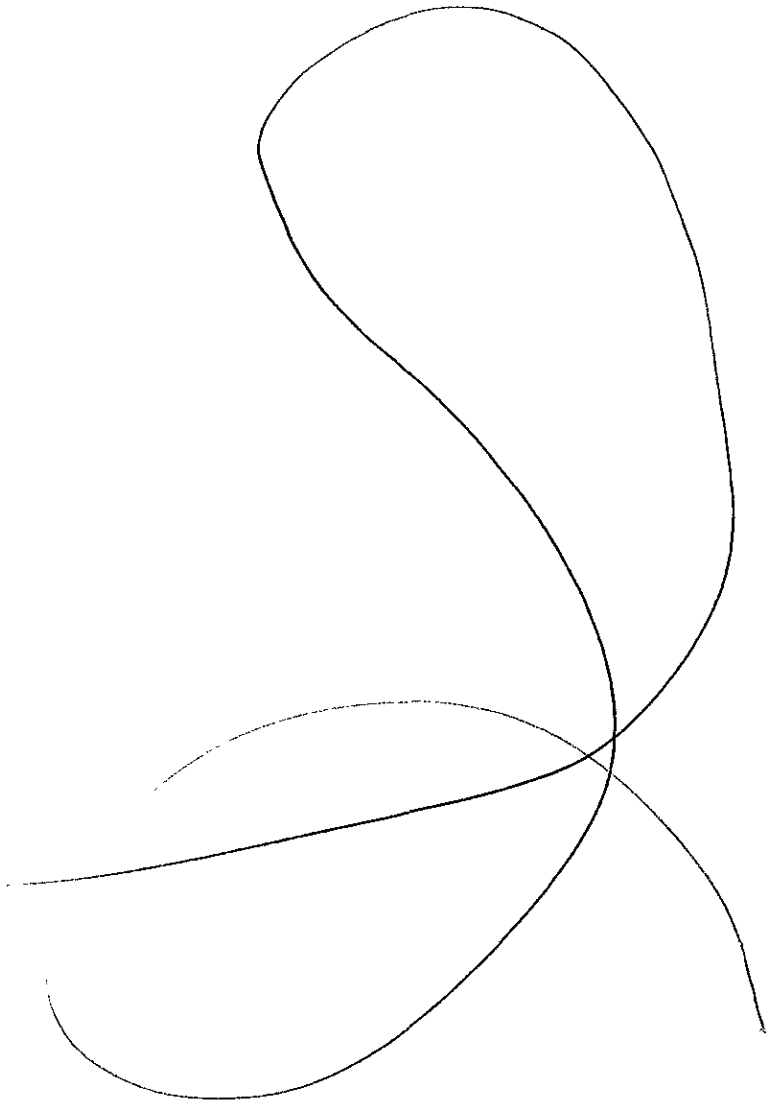


Table 1. SUMMARY OF TESTS RUN

Target Constituents (Test Method)	Soil	Water
Title 22 Metals + Chromium VI (ASS/ICP)	X	X
EPA 8080/608 (Organochlorine Pesticides)	X	X
EPA 8240/624 (Volatile Organics)	X	X
EPA 8270/625 (Semi-Volatile Organics)	X	X
EPA 8015/8020 (Low & Med. BP TPH with BTXE)	X	X
EPA 8015 (High BP TPH)	X	X
Total Recoverable Oil & Grease	X	X

BP - Boiling Point
TPH - Total Petroleum Hydrocarbons
EPA - Environmental Protection Agency
BTXE - Benzene, Toluene, Xylene and Ethylbenzene
AAS/ICP - Atomic Absorption Spectroscopy/Induction Coupled Plasma Detection

Table 2. SOIL ANALYSIS: FUEL AND LUBRICANT DERIVATIVES DETECTED [1,2]

Constituent (ppm)	MW-1	MW-2	MW-3	MW-4	MW-5	Test Description
Benzene	0.14	0.26	--	0.10	--	2
Toluene	7.00	0.48	--	0.72	--	2
Xylene	86.00	7.20	--	1.60	--	2
Ethylbenzene	6.60	0.50	--	0.14	--	2
TPH - Low BP	1,100	44	--	3	--	2
TPH - High BP	1,500	170	12	89	27	EPA 8015
Oil & Grease	9,000	40,000	12	21,000	11,000	Gravimetric

[1] All soil tests were run on composite samples prepared by combining all soil samples from each well into a single sample for analysis.

[2] BTEX tested by both EPA 8240/EPA and (8015/8020): higher result shown.

Blank cells (-) indicate constituent was not detected.

Table 3. SOIL ANALYSIS: OTHER ORGANIC CONSTITUENTS DETECTED[1,2]

Constituent (ppm)	MW-1	MW-2	MW-3	MW-4	MW-5	Test Description
Organics						
2-Methylnaphthalene	7.300	--	--	--	--	EPA 8270
Fluoranthene	8.000	--	0.160	--	--	EPA 8270
Naphthalene	76.000	13.000	--	--	--	EPA 8270
Polynuclear Aromatics (PNAs)						
Benzo(a)anthracene	--	--	0.130			
Benzo(a)pyrene	--	--	0.250	--	--	EPA 8270
Benzo(b)fluoranthene	--	--	0.400	--	--	EPA 8270
Benzo(g,h,i)perylene	--	--	0.300	--	--	EPA 8270
Chrysene	--	--	0.120	--	--	EPA 8270
Indeno(1,2,3-cd)pyrene	--	--	0.430	--	--	EPA 8270
Phenathrene	17.000	--	--	--	--	EPA 8270
Pyrene	13.000	--	0.380	--	--	EPA 8270
Total PNAs[3]	30.000	--	2.010	--	--	

[1] Only constituents that were detected are shown. For a complete list of laboratory results see Appendices B and C, Laboratory Analysis Reports.

[2] Blank cells (-) indicate constituent was not detected.

[3] Criteria available for sum of PNAs

Table 4. SOIL ANALYSIS: INORGANIC CONSTITUENTS DETECTED[1]

Constituent (ppm)	MW-1	MW-2	MW-3	MW-4	MW-5
Arsenic	2.20	0.96	4.80	0.69	1.10
Barium	210.00	160.00	43.00	67.00	56.00
Beryllium	0.30	0.28	0.25	0.15	0.15
Cadmium	1.10	0.47	0.69	0.45	0.34
Chromium III	120.00	43.00	32.00	27.00	25.00
Cobalt	6.70	5.60	5.70	3.90	7.20
Copper	40.00	59.00	43.00	53.00	62.00
Lead	550.00	100.00	82.00	350.00	21.00
Mercury	0.33	0.14	0.13	0.16	0.13
Molybdenum	2.10	0.76	0.65	1.30	0.83
Nickel	30.00	36.00	22.00	25.00	42.00
Selenium	0.17	0.22	0.14	0.33	0.19
Silver	0.18	0.15	0.44	0.56	0.45
Vanadium	19.00	31.00	21.00	30.00	56.00
Zinc	550.00	670.00	130.00	79.00	130.00

[1] Only constituents that were detected are shown. For a complete list of laboratory results see Appendices B and C, Laboratory Analysis Reports. Test Method: AAS/ICP.

Table 5. SOIL ANALYSIS: WASTE EXTRACTION TEST RESULTS[1,2,3] - CONSTITUENTS DETECTED

Constituent (ppm)	MW-1	Rerun[4] MW-1	MW-2	MW-3	MW-4	MW-5
Barium	3.80	0.054	3.50	--	--	--
Cadmium	0.54	--	--	--	--	--
Copper	0.071	0.099	3.50	0.95	1.70	5.30
Lead	0.27	0.36	3.40	4.00	6.50	0.94
Mercury	0.0013	--	--	--	--	--
Nickel	1.30	0.053	0.63	0.81	0.57	0.96
Vanadium	--	--	0.64	--	0.68	0.56
Zinc	3.80	0.064	20.00	--	--	--

1 Waste extraction test was run only on samples where the chemical concentration in soil was equal to or greater than ten times the STLC, a standard laboratory protocol.

2 Only constituents that were detected are shown. For a complete list of laboratory results see Appendices B and C, Laboratory Analysis Reports.

3 Blank cells (-) indicate constituent was not detected.

4 The Waste Extraction Test was rerun on a fresh soil sample from MW-1 using deionized water.

Table 6. WATER ANALYSIS: FUEL AND LUBRICANT DERIVATIVES DETECTED[1,2,3]

Constituent (ppb)	MW-1	MW-2	MW-3	MW-4	MW-5	Test Description
Benzene	4.0	4.9	--	3.7	--	1
Toluene	430.0	0.6	--	9.6	1.1	1
Xylenes	170.0	0.9	0.6	9.6	2.3	1
Ethylbenzene	11.0	--	--	1.9	--	1
TPH - Low BP	2,500	67	--	120	--	EPA 8015
TPH - High BP	290	--	540	540	270	EPA 8015
Oil & Grease	1,400	--	--	3,500	--	Gravimetric

1 Only constituents that were detected are shown. For a complete list of laboratory results see Appendices B and C, Laboratory Analysis Reports.

2 BTXE tested by both EPA 8240 and EPA 8015/8020: highest result shown.

3 Blank cells (-) indicate constituent was not detected.

Table 7. WATER ANALYSIS: OTHER ORGANIC CONSTITUENTS DETECTED[1,2]

Constituent (ppb)	MW-1	MW-2	MW-3	MW-4	MW-5	Test Description
Organics						
Acetone	280	20	--	24	28	EPA 8240
Benzoic Acid	510	--	--	--	--	EPA 8270
Benzyl Alcohol	6	--	--	--	--	EPA 8270
2-Butanone	55	--	--	--	--	EPA 8240
2-Hexanone	2,800	--	--	--	--	EPA 8240
Methylene Chloride	--	4	360	5	3	EPA 8240
Diethyl Phthalate	--	--	--	3	--	EPA 8270
Fluorene	--	--	--	3	--	EPA 8270
Phenol	78	--	--	4	--	EPA 8270
2,4-Dimethylphenol	76	--	--	--	--	EPA 8270
2-Methylphenol	32	--	--	--	--	EPA 8270
4-Methylphenol	110	--	--	--	--	EPA 8270
2-Methylnaphthalene	--	--	--	9	--	EPA 8270
Naphthalene	59	--	--	49	--	EPA 8270
Polynuclear Aromatics (PNAs)						
Acenaphthene	--	--	--	3	--	EPA 8270
Phenathrene	--	--	--	4	--	EPA 8270
Total PNAs	--	--	--	7	--	

[1] Only constituents that were detected are shown. For a complete list of laboratory results see Appendices B and C, Laboratory Analysis Reports.

[2] Blank cells (-) indicate constituent was not detected.

Table 8. WATER ANALYSIS: INORGANIC CONSTITUENTS DETECTED[1,2]

Constituent (ppb)	MW-1	MW-2	MW-3	MW-4	MW-5
Arsenic	--	--	--	--	37
Barium	310	1400	--	850	740
Chromium III	150	--	--	--	--
Lead	700	200	50	100	70
Nickel	--	--	--	64	78
Zinc	--	--	98	170	76

[1] Only constituents that were detected are shown. For a complete list of laboratory results, see Appendices B and C, Laboratory Analysis Reports.

[2] Blank cells (-) indicate constituent was not detected.

Table 9. LIST OF DETECTED CONSTITUENTS ALSO ON PROPOSITION 65 LIST [1]

Constituent	Monitoring Well[2]	Media	Category
Arsenic	1,2,3,4,5	soil	(3)
	5	water	(3)
Benzene	1,2,4	soil	(3)
	1,2,4	water	(3)
Benzo(a)pyrene	3	soil	(3)
Benzo(b)fluoranthene	3	soil	(3)
Beryllium	1,2,3,4,5	soil	(3)
Cadmium	1,2,3,4,5	soil	(3)
Indeno(1,2,3-cd)pyrene	3	soil	(3)
Lead	1,2,3,4,5	soil	(4)
	1,2,3,4,5	water	(4)
Methylene Chloride	2,3,4,5	water	(3)

(1) California Regulatory Notice Register, January 6, 1989.
(2) Monitoring well numbers shown; refer to Figure 2 for locations.
(3) "Chemicals Known to the State to Cause Cancer," Proposition 65 List.
(4) "Chemicals Known to the State to Cause Reproductive Toxicity," Proposition 65 List.

Table 10. COMPARISON OF DETECTED CONSTITUENT CONCENTRATIONS IN WATER FROM MW-1 AND MW-3

Constituent (ppb)	MW-1	MW-3	Detection Level
Benzene	4	--	0.5
Toluene	430	--	0.5
Xylene	140	640	0.5
Ethyl Benzene	9	--	5.0
TPH - Low BP	2,500	--	50.0
TPH - High BP	290	540	50.0

Constituent (ppb)	MW-1	MW-3	Detection Level
Acetone	280	20	50/10
Benzoic Acid	510	--	10/10
Benzyl Alcohol	6.0	--	2/12
2-Butanone	55	--	50/10
2,4-Dimethylphenol	76	--	2/2
2-Hexanone	2,800	--	50/10
Methylene Chloride	ND	4	10/2
2-Methylphenol	32	--	2/2
4-Methylphenol	110	--	2/2
Naphthalene	59	--	2/2
Phenol	78	--	2/2

Blank (--) indicates constituent not detected.

Table 11. SOIL ANALYSIS: COMPARISON AGAINST WASTE CRITERIA

Constituent	Location	Highest Concentration	STLC
Organic Chemicals (ppm)			
2-Methylnapthalene	MW-1	7.3	--
Fluoranthene	MW-1	8.0	--
Naphthalene	MW-1	76	--
Polynuclear Aromatics (ppb)			
Benzo(a)anthracene	MW-1	130	
Benzo(a)pyrene	MW-1	250	
Benzo(a)fluoranthene	MW-1	400	
Benzo(g,h,i)perylene	MW-1	300	
Chrysene	MW-1	120	
Indeno(1,2,3-cd)pyrene	MW-1	430	
Phenanthrene	MW-1	17,000	
Pyrene	MW-1	13,000	
	MW-1	———	———
Total PNA's[3]		31,630	
Inorganics (ppm)		WET Test	
Arsenic		--	--
Barium	MW-1	3.8	100
Beryllium		--	--
Cadmium	MW-1	0.54	1
Chromium III		--	--
Cobalt		--	--
Copper	MW-1	5.3	25
Lead	MW-1	6.5	5
Mercury	MW-1	0.0013	0.2
Molybdenum		--	--
Nickel	MW-1	1.3	20
Selenium		--	--
Silver		--	--
Vanadium	MW-1	0.600	24
Zinc	MW-1	20	--

Blank (--) indicates constituent not detected.

Table 12. WATER ANALYSIS: COMPARISON AGAINST WATER QUALITY GOALS

Constituent	Highest Concentration	Location	California Ocean Plan[1]	S.F. Bay Basin Plan	EPA Acute Toxicity[2]
Fuel and Lubricant Derivaties (ppb)					
Benzene	4.9	MW-2	--	--	5,100
Toluene	430	MW-1	--	--	6,300
Xylene	170	MW-1	--	--	--
Ethyl benzene	11	MW-1	--	--	430
TPH-Low BP	2,500	MW-1	--	--	--
TPH-High BP	540	MW-3,4	--	--	--
Organic Chemicals (ppb)					
Acetone	280	MW-1	--	--	--
Benzoic Acid	510	MW-1	--	--	--
Benzyl Alcohol (ppb)	6	MW-1	--	--	--
2-Butanone	55	MW-1	--	--	--
2-Hexanone	2,800	MW-1	--	--	--
Methylene Chloride	360	MW-3	--	--	12,000
Diethyl Phthalate	3	MW-4	--	--	49,000
Fluorene	3	MW-1	--	--	300
Phenol	78	MW-1	30[3]	500[3]	5,800
2,4-Dimethylphenol	76	MW-1	30[3]	500[3]	--
2-Methylphenol	32	MW-1	30[3]	500[3]	--
4-Methylphenol	110	MW-1	30[3]	500[3]	--
2-Methylnaphthalene	9	MW-4	--	--	--
Napthalene	59	MW-1	--	--	23,500
Polynuclear Aromatics (PNAs)					
Acenapthene	3	MW-4	--	--	970
Phenanthrene	4	MW-4	--	--	300
	—			—	---
Total PNAs	7			15	
Inorganic Chemical (ppb)					
Arsenic	37	MW-5	8	20	2,319
Barium	1,400	MW-2	--	--	--
Chromium (III)	150	MW-1	--	--	10,300
Lead	700	MW-1	8	5.6	--
Nickel	780	MW-5	20	7.1	--
Zinc	170	MW-4	20	58	--

1 6 month median.

2 EPA National ambient water quality criteria to protect saltwater aquatic life.

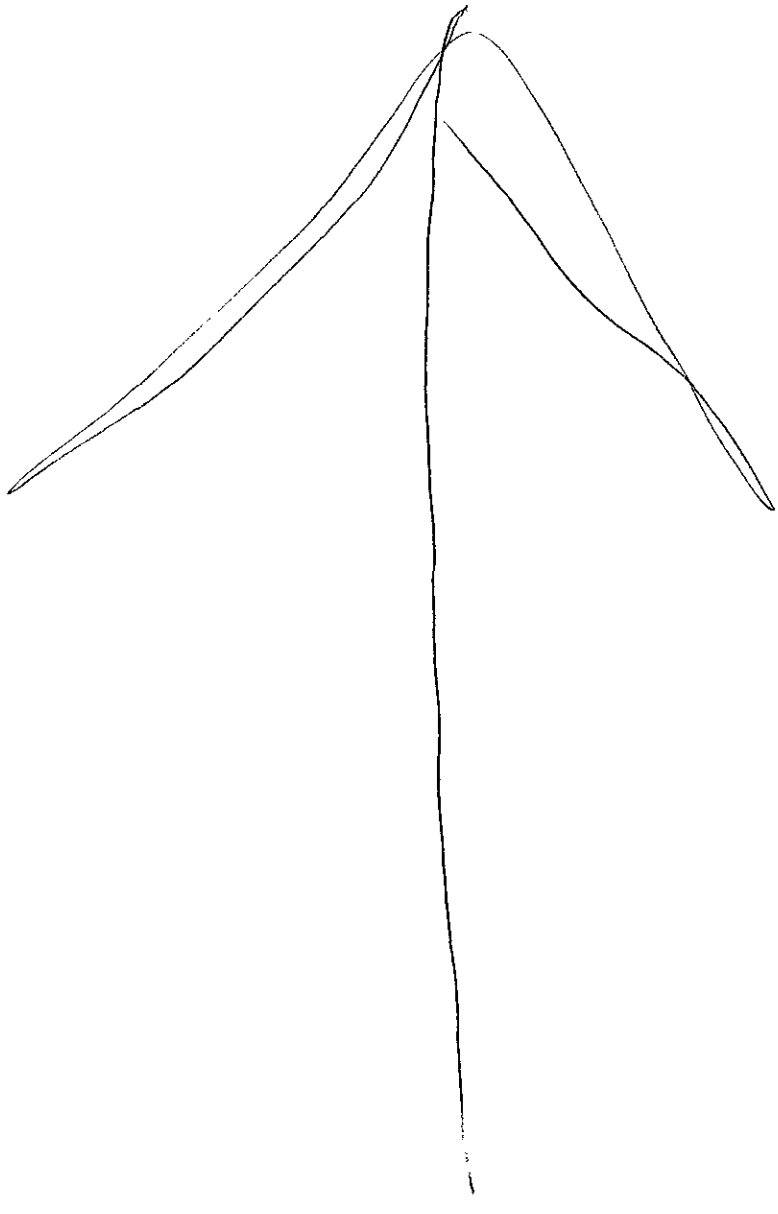
3 For sum of phenols.

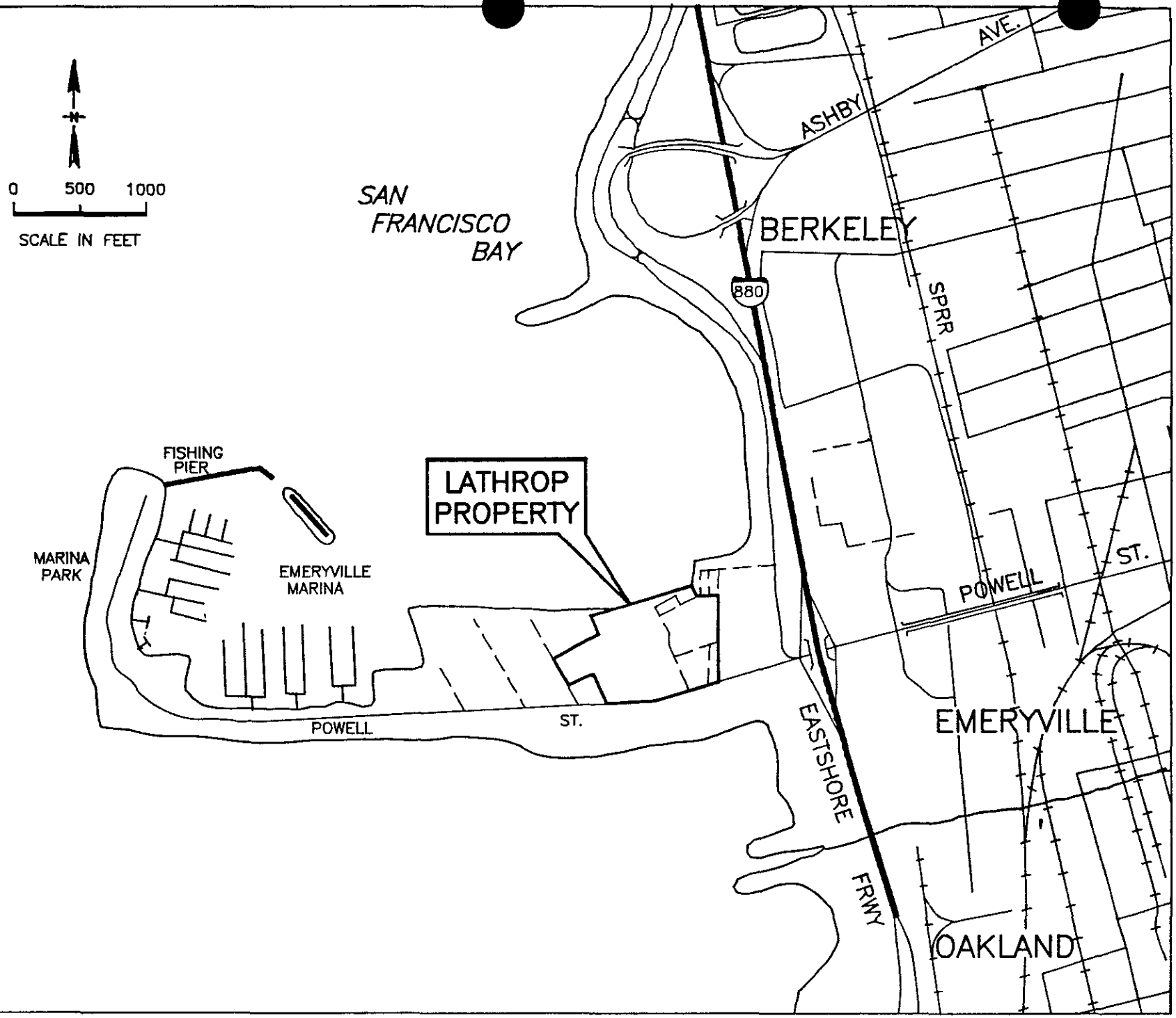
Table 13. WATER PARAMETERS DURING SAMPLING

Well No.	Water Level (feet below MP)	Pre-Sample Discharge (gallons)	Salinity (% seawater)	Temperature (°C)	Specific Conductance (μmho/cm)	pH	Color	Odor	Turbidity
MW-1	--	15	20	20	28,000	7.5	Brown	hydrocarbon	slight
MW-2	8.85	50	8	19	11,000	7.8	Lt. Brown	hydrocarbon	slight
MW-3	6.7	40	8	22	11,000	8.1	Brown	hydrocarbon	slight
MW-4	9.95	50	2	21	3,300	8.2	Lt. Brown	hydrocarbon	slight
MW-5	9.0	40	3	19	4,300	7.8	Lt. Brown	hydrocarbon	very slight

MP - measuring point

2





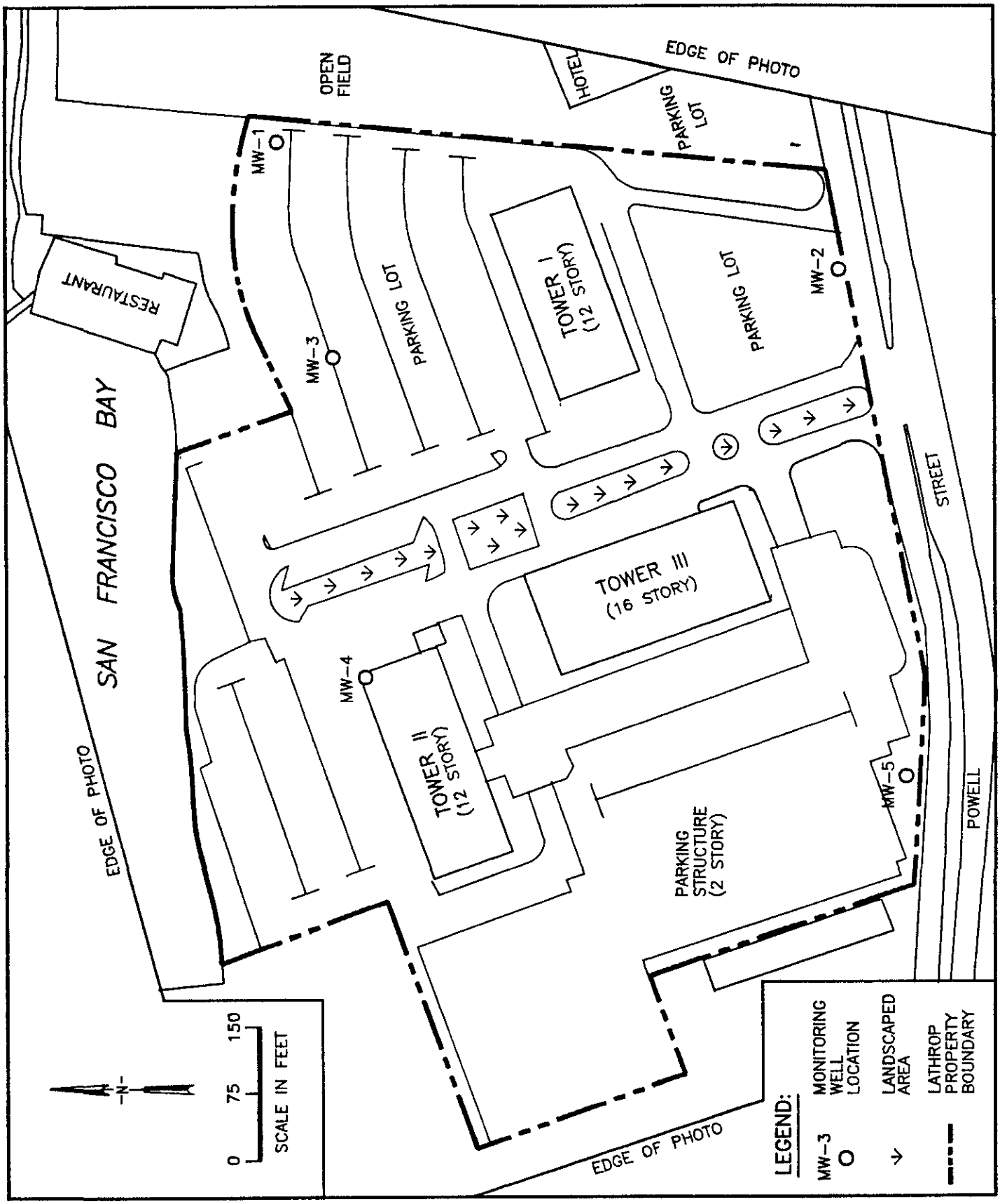
Project No. 88102354

LATHROP PROPERTY ENVIRONMENTAL ASSESSMENT

Woodward-Clyde Consultants

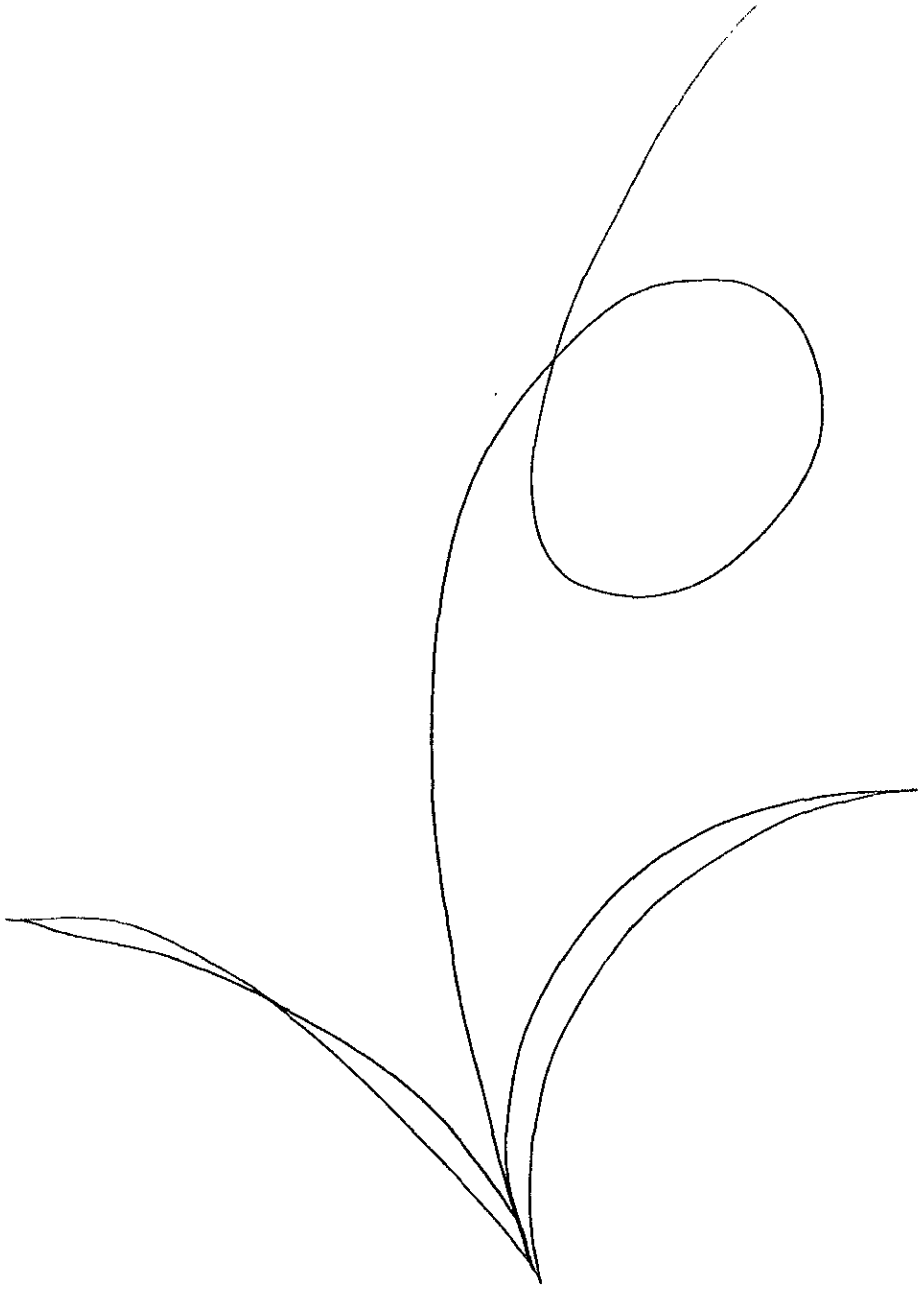
PROJECT SITE MAP

Figure 1



Project No. 8810235A	LATHROP PROPERTY ENVIRONMENTAL ASSESSMENT	MONITORING WELL LOCATIONS PHOTO DATE: 4-5-1985	Figure 2
Woodward-Clyde Consultants			

3



APPENDIX A
GEOLOGIC LOGS OF BOREHOLES

Woodward-Clyde Consultants

PROJECT NAME: Lathrop Property NO. 8810235A

BORING LOCATION	MW-1			ELEVATION AND DATUM	
DRILLING AGENCY	Datum Exploration	DRILLER	Jim / Gary	DATE STARTED / DATE FINISHED	January 13,1989
DRILLING EQUIPMENT	CME - 75			COMPLETION DEPTH	26.5'
DRILLING METHOD	8" Hollowstem Augers	DRILL BIT	CME Carbide	NO. OF SAMPLES / DIST.	N/A
SIZE AND TYPE OF CASING	2" PVC			WATER LEVEL / FIRST	8 1/2'
TYPE OF PERFORATION	0.010" Slotted	FROM 5 TO 25 Ft.		SAMPLER	2"California Modified Type
SIZE AND TYPE OF PACK	Lonestar #2/12 Monterey Sand	FROM 4 TO 25 Ft.		UNDIST.	N/A
TYPE OF SEAL NO. 1	Bentonite Pellets	FROM 2.5 TO 4 Ft.		COMPL. / 24 HRS.	N/A / N/A
TYPE OF SEAL NO. 2	Neat Cement	FROM 0 TO 2.5 Ft.		LOGGED BY:	Chuck Rambo
				CHECKED BY:	Alan Lattanner

DEPTH (feet)	DESCRIPTION	GRAPHIC LOG: Lithology	GRAPHIC LOG: Piezometer Installation	Water Content	Piezometer Data	SAMPLES: Drive Number	SAMPLES: Sample Number	SAMPLES: Recov. (feet)	SAMPLES: Blow Counts	REMARKS (Drill Rate, Fluid Loss, Odor, etc.)
0	FILL - CLAYEY SAND (SC) -brown -very moist -with fine roots									
	FILL - SILTY CLAY (CL) -dark gray -moist -with concrete rubble									
5					5	1	2 3 4		9 50	
	FILL - TAR PAPER -dark reddish brown -very hard									
10					10	2	1 2 3 4		1 1 2	
	FILL - SILTY CLAY (CL) -gray -with concrete and wood rubble									
15	-pink -with asbestos -very soft			1/16/89	15	3	4		3 1 2	OVA = 2 ppm
	SILTY CLAY (CL) -dark gray -with shell fragments									
20					20	4	1 2 3 4		1 1 1	
25	-with gravel -light gray -moist -stiff				25	5	2 3 4		6 8 10	
	Bottom of boring at 26 1/2' Augered to 25'									
30					30					
35					35					

Woodward-Clyde Consultants PROJECT NAME: Lathrop Property NO. 8810235A

BORING LOCATION	MW-2			ELEVATION AND DATUM	
DRILLING AGENCY	Datum Exploration	DRILLER	Jim / Gary	DATE STARTED / DATE FINISHED	January 12,1989
DRILLING EQUIPMENT	CME - 75			COMPLETION DEPTH	25'
DRILLING METHOD	8" Hollowstem Augers	DRILL BIT	CME Carbide	NO. OF SAMPLES / DIST.	N/A
SIZE AND TYPE OF CASING	2" PVC			WATER LEVEL / FIRST	10.5'
TYPE OF PERFORATION	0.010" Slotted	FROM 5 TO 25 Ft.		SAMPLER	2"California Modified Type
SIZE AND TYPE OF PACK	Lonestar #2/12 Monterey Sand	FROM 4 TO 25 Ft.		UNDIST.	N/A
TYPE OF SEAL NO. 1	Bentonite Pellets	FROM 2.5 TO 4 Ft.		COMPL. / 24 HRS.	N/A / N/A
TYPE OF SEAL NO. 2	Neat Cement	FROM 0 TO 2.5 Ft.		LOGGED BY:	Chuck Rambo
				CHECKED BY:	Alan Lattanner

DEPTH (feet)	DESCRIPTION	GRAPHIC LOG: Lithology	GRAPHIC LOG: Piezometer Installation	Water Content	Piezometer Data	SAMPLES: Drive Number	SAMPLES: Sample Number	SAMPLES: Recov. (Feet.)	SAMPLES: Blow Count	REMARKS (Drill Rate, Fluid Loss, Odor, etc.)
0	FILL - SILTY SAND (SM) -with clay -with gray gravel -brown -moist					1	1 2 3 4		4 5 8	OVA = 0 ppm
5	FILL - SILTY CLAY (CL) -with sand lenses -black					2	1 2 3 4		12 16 9	OVA = 8 ppm from the drum of cuttings Petroleum Odor from the drums
10	-with concrete and wood debris			1/16/89		3	3 4		8 4 7	
15	-with roofing paper, asphalt shingles, and wood debris					4	1 2 3 4		14 15 10	OVA = 50 ppm from the drum of cuttings
20	SILTY CLAY (CH) -dark gray -moist -very soft					5	1 2 3 4		1 2 3	OVA = 0 ppm
25	Bottom of boring at 25'									
30										
35										

FIELD LOG OF BORING NO. MW-2 SHEET 1 OF 1

Woodward-Clyde Consultants PROJECT NAME: Lathrop Property NO. 8810235A

BORING LOCATION: MW-3		ELEVATION AND DATUM	
DRILLING AGENCY: Datum Exploration	DRILLER: Jim / Gary	DATE STARTED / DATE FINISHED: January 13,1989	
DRILLING EQUIPMENT: CME - 75		COMPLETION DEPTH: 21 1/2'	SAMPLER: 2"California Modified Type
DRILLING METHOD: 8" Hollowstem Augers	DRILL BIT: CME Carbide	NO. OF SAMPLES: DIST. N/A	UNDIST. N/A
SIZE AND TYPE OF CASING: 2" PVC		WATER LEVEL: FIRST 12'	COMPL. N/A / 24 HRS. N/A
TYPE OF PERFORATION: 0.010" Slotted	FROM 5 TO 21.5 Ft.	LOGGED BY: Chuck Rambo	CHECKED BY: Alan Lattanner
SIZE AND TYPE OF PACK: Lonestar #2/12 Monterey Sand	FROM 4 TO 21.5 Ft.		
TYPE OF SEAL — NO. 1: Bentonite Pellets	FROM 2.5 TO 4 Ft.		
TYPE OF SEAL — NO. 2: Neat Cement	FROM 0 TO 2.5 Ft.		

DEPTH (feet)	DESCRIPTION	GRAPHIC LOG: Lithology	GRAPHIC LOG: Piezometer Installation	Water Content	Piezometer Data	SAMPLES: Drive Number	SAMPLES: Sample Number	SAMPLES: Recov. (Feet.)	SAMPLES: Blow Counts	REMARKS (Drill Rate, Fluid Loss, Odor, etc.)
5	FILL - SILTY CLAY (CL) -brown -moist -with sand -dark gray				1/18/89	1	1,2,3,4		3, 9, 18	OVA = 0 ppm
10	FILL - ASBESTOS (FIBERGLASS?) -pink and white fibers -very soft					2	1,2,3,4		2, 1, 1	OVA = 9 ppm No Odor
15	SILTY CLAY (CL) -dark gray -moist -very soft -with shells -"Bay Mud"					3	2,3,4		8, 1, 1	OVA = 2 ppm
20						4	2,3,4		2, 3, 3	OVA = 0 ppm
25	Bottom of boring at 21 1/2'									
30										
35										

Woodward-Clyde Consultants PROJECT NAME: Lathrop Property NO. 8810235A

BORING LOCATION	MW-4	ELEVATION AND DATUM	
DRILLING AGENCY	Datum Exploration	DRILLER Jim / Gary	DATE STARTED / DATE FINISHED January 13,1989
DRILLING EQUIPMENT	CME - 75	COMPLETION DEPTH 26.5'	SAMPLER 2"California Modified Type
DRILLING METHOD	8" Hollowstem Augers	DRILL BIT CME Carbide	NO. OF SAMPLES; DIST. N/A; UNDIST. N/A
SIZE AND TYPE OF CASING	2" PVC	WATER LEVEL; FIRST 8 1/2'	COMPL. N/A; 24 HRS. N/A
TYPE OF PERFORATION	0.010" Slotted	FROM 10 TO 25 Ft.	LOGGED BY: Chuck Rambo
SIZE AND TYPE OF PACK	Lonestar #2/12 Monterey Sand	FROM 8 TO 25 Ft.	CHECKED BY: Alan Lattanner
TYPE OF SEAL	NO. 1 Bentonite Pellets	FROM 6 TO 8 Ft.	
	NO. 2 Neat Cement	FROM 0 TO 6 Ft.	

DEPTH (feet)	DESCRIPTION	GRAPHIC LOG: Lithology / Piezometer Installation	Water Content	Piezometer Data	SAMPLES: Drive Number / Sample Number / Recov. (Feet.) / Blow Counts	REMARKS (Drill Rate, Fluid Loss, Odor, etc.)
0	FILL - SANDY CLAY (CL) -black -moist					
	FILL - SILTY CLAY (CL) -with sand -light gray -with debris				1: 1,2,3,4 — 3, 4, 6	
5					2: 3,4 — 6, 8, 7	
	-with roofing shingles					
10			1/18/89		3: 1,2,3,4 — 9, 5, 8	
	FILL - LINOLEUM & TAR PAPER -with asphalt					
15					4: 4 — 50/6"	
20	-with wood and fiberglass shingles				5: 3,4 — 50, 40	
	SILTY CLAY (CL) -dark gray -moist -very soft -with shells -"Bay Mud"					
25					6: 1,2,3,4 — 1, 1, 1	
	Bottom of boring at 27'					
30						
35						

Woodward-Clyde Consultants PROJECT NAME : Lathrop Property NO. 8810235A

BORING LOCATION	MW-5			ELEVATION AND DATUM	
DRILLING AGENCY	Datum Exploration	DRILLER	Jim / Gary	DATE STARTED / DATE FINISHED	January 16,1989
DRILLING EQUIPMENT	CME - 75			COMPLETION DEPTH	25'
DRILLING METHOD	8" Hollowstem Augers	DRILL BIT	CME Carbide	NO. OF SAMPLES / DIST.	N/A
SIZE AND TYPE OF CASING	2" PVC			WATER LEVEL / FIRST	9' to 10'
TYPE OF PERFORATION	0.010" Slotted	FROM 5 TO 25 Ft.		LOGGED BY:	Carl Parten
SIZE AND TYPE OF PACK	Lonestar #2/12 Monterey Sand	FROM 4 TO 25 Ft.		CHECKED BY:	Alan Lattanner
TYPE OF SEAL	NO. 1 Bentonite Pellets	FROM 1 TO 4 Ft.		SAMPLER	2"California Modified Type
	NO. 2 Neat Cement	FROM 0 TO 1 Ft.		UNDIST. / COMPL. / 24 HRS.	N/A / N/A / N/A

DEPTH (feet)	DESCRIPTION	GRAPHIC LOG: Lithology / Piezometer Installation	Water Content	Piezometer Data	SAMPLES: Drive Number / Sample Number / Recov. (Feet.) / Blow Counts	REMARKS (Drill Rate, Fluid Loss, Odor, etc.)
0	FILL - SILTY CLAY (CH) -gray -damp -medium stiff					
5	FILL - CLAYEY SAND (SC) -gray -well sorted -damp -medium dense				1 / 2,3,4 / Blow Counts 8, 6, 7	OVA = 1000+ ppm Slight Sour Odor
	-moist		1/16/89			OVA Readings while drilling 500 - 900 ppm
10	FILL - CLAYEY SAND (SC) -gray -wet -loose -with sandstone fragments to 1"				2 / 4 / Blow Counts 5, 5, 8	No recovery Redrove with Standard Pen. Sampler
15	FILL - CLAYEY SAND (SC) to SANDY CLAY (CL) -the majority of the sample consists of tar paper and roofing scraps				3 / 2,3,4 / Blow Counts 8, 18, 40	OVA = 20 to 30 ppm Hydrocarbon Odor
20	SILTY CLAY (CH) -gray to black -wet -soft -"Bay Mud"				4 / 1,2,3,4 / Blow Counts 15, 15, 1	OVA = 50 to 100 ppm Hydrocarbon Odor
25	Bottom of boring at 25'					
30						
35						

FIELD LOG OF BORING NO. MW-5 SHEET 1 OF 1

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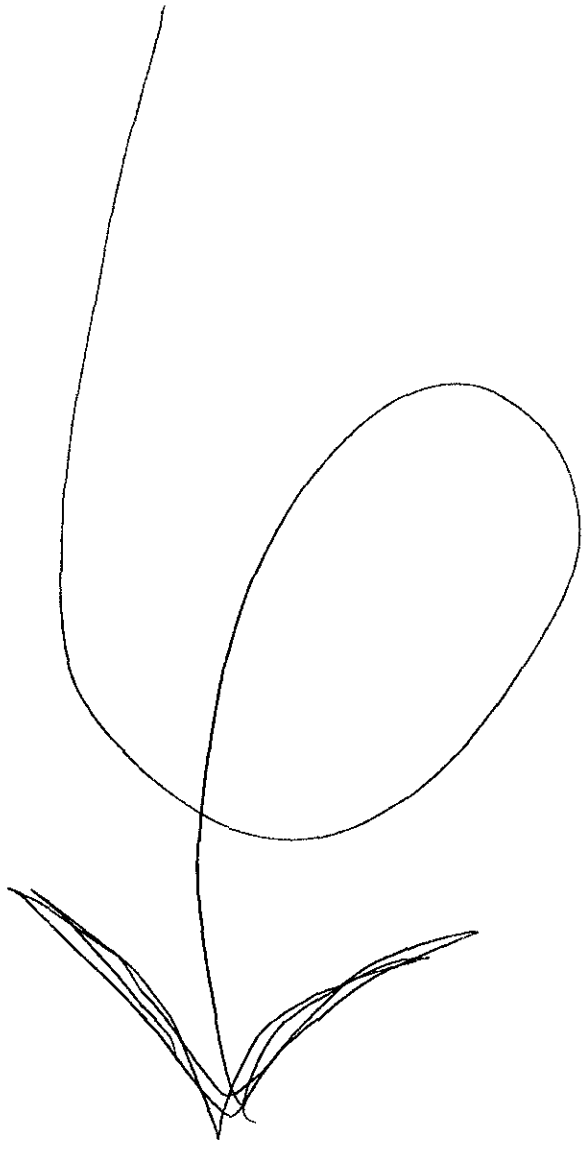

APPENDIX B
SOIL SAMPLES: CHEMICAL ANALYSIS REPORTS

SEQUOIA ANALYTICAL

680 Chesapeake Drive • Redwood City, CA 94063
(415) 364-9600 • FAX (415) 364-9233

Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Matrix Descript:	Soil	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 5030 or 3810/8015/8020	Analyzed: Feb 2, 1989
Attention: Alan LaTanner	First Sample #:	901-2138	Reported: Feb 8, 1989

TOTAL PETROLEUM FUEL HYDROCARBONS with BTEX DISTINCTION (EPA 8015/8020)

Sample Number	Sample Description	Low/Medium B.P. Hydrocarbons mg/kg (ppm)	Benzene mg/kg (ppm)	Toluene mg/kg (ppm)	Ethyl Benzene mg/kg (ppm)	Xylenes mg/kg (ppm)
	Composite					
901-2138	MW1-1-4 to MW1-5-4	1,100	0.14	1.1	5.0	28
901-2139	MW2-1-3 to MW2-5-3	44	0.26	N.D.	0.24	0.96
901-2140	MW3-1-4 to MW3-4-4	N.D.	N.D.	N.D.	N.D.	N.D.
901-2141	MW4-1-4 to MW4-6-4	3.2	N.D.	0.14	N.D.	0.27
901-2142	MW5-1-4 to MW5-4-4	N.D.	N.D.	N.D.	N.D.	N.D.
Detection Limits:		**1.0**	**0.05**	**0.1**	**0.1**	**0.1**

Low to Medium Boiling Point Hydrocarbons are quantitated against a gasoline standard.
Analytes reported as N.D. were not present above the stated limit of detection.

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Arthur G. Burton
Laboratory Director

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Woodward-Clyde Consultants	Client Project ID: #8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Matrix Descript: Soil	Received:	Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method: EPA 3550/8015	Analyzed:	Feb 6, 1989
Attention: Alan LaTanner	First Sample #: 901-2138	Reported:	Feb 6, 1989

TOTAL PETROLEUM FUEL HYDROCARBONS (EPA 8015)

Sample Number	Sample Description Composite	High B.P. Hydrocarbons mg/kg (ppm)
901-2138	MW1-1-4 to MW1-5-4	1,500
901-2139	MW2-1-3 to MW2-5-3	170
901-2140	MW3-1-4 to MW3-4-4	12
901-2141	MW4-1-4 to MW4-6-4	89
901-2142	MW5-1-4 to MW5-4-4	27

Detection Limits:	**1.0**

High Boiling Point Hydrocarbons are quantitated against a diesel fuel standard.
Analytes reported as N.D. were not present above the stated limit of detection.

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Laboratory Director

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Matrix Descript:	Soil	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 413.2 (I.R.)	Extracted: Feb 2, 1989
Attention: Alan LaTanner	First Sample #:	901-2138	Analyzed: Feb 2, 1989
			Reported: Feb 6, 1989

TOTAL RECOVERABLE OIL & GREASE

Sample Number	Sample Description Composite	Oil & Grease mg/kg (ppm)
901-2138	MW1-1-4 to MW1-5-4	9,000
901-2139	MW2-1-3 to MW2-5-3	40,000
901-2140	MW3-1-4 to MW3-4-4	12
901-2141	MW4-1-4 to MW4-6-4	21,000
901-2142	MW5-1-4 to MW5-4-4	11,000

Detection Limits:	**1.0**

Analytes reported as N.D. were not present above the stated limit of detection.

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Arthur G. Burton
Laboratory Director

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SEQUOIA ANALYTICAL

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	MW1-1-4 to MW1-5-4, Composite	Received: Relogged 2/23
Oakland, CA 94607-4041			Extracted: Feb 24, 1989
Attention: Alan LaTanner	Lab Number:	901-2138	Reported: Mar 1, 1989

INORGANIC PERSISTENT AND BIOACCUMULATIVE TOXIC SUBSTANCES

	Soluble Threshold Limit Concentration (Waste Extraction Test)			Total Threshold Limit Concentration		
Analyte	**STLC Max. Limit** (mg/L)	**Detection Limit** (mg/L)	**Analysis Result** (mg/L)	**TTLC Max. Limit** (mg/kg)	**Detection Limit** (mg/kg)	**Analysis Result** (mg/kg)
	D.I. EXTRACT					
Antimony	15	0.1	-	500	1.0	-
Arsenic	5	0.01	-	500	0.1	-
Barium	100	0.02	0.054	10,000	0.2	-
Beryllium	0.75	0.01	-	75	0.1	-
Cadmium	1	0.01	N.D.	100	0.1	-
Chromium (VI)	5	0.005	-	500	0.05	-
Chromium (III)	560	0.005	-	2,500	0.05	-
Cobalt	80	0.05	-	8,000	0.5	-
Copper	25	0.01	0.099	2,500	0.1	-
Lead	5	0.005	0.36	1,000	0.05	-
Mercury	0.2	0.001	N.D.	20	0.01	-
Molybdenum	350	0.05	-	3,500	0.5	-
Nickel	20	0.05	0.053	2,000	0.5	-
Selenium	1	0.005	-	100	0.1	-
Silver	5	0.01	-	500	0.1	-
Thallium	7	0.5	-	700	5.0	-
Vanadium	24	0.05	-	2,400	0.5	-
Zinc	250	0.01	0.64	5,000	0.1	-
Asbestos	-	10	-	10,000	100	-
Fluoride	180	0.1	-	18,000	1.0	-

TTLC results are reported as mg/kg of wet weight. Asbestos results are reported as fibers/g.
Analytes reported as N.D. were not present above the stated limit of detection.

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Arthur G. Burton
Laboratory Director

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Woodward-Clyde Consultants	Client Project ID: #8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript: MW1-1-4 to MW1-5-4 Composite	Received:	Jan 18, 1989
Oakland, CA 94607-4041		Extracted:	Feb 3, 1989
Attention: Alan LaTanner	Lab Number: 901-2138	Reported:	Feb 6, 1989

INORGANIC PERSISTENT AND BIOACCUMULATIVE TOXIC SUBSTANCES

	Soluble Threshold Limit Concentration (Waste Extraction Test)			Total Threshold Limit Concentration		
Analyte	STLC Max. Limit (mg/L)	Detection Limit (mg/L)	Analysis Result (mg/L)	TTLC Max. Limit (mg/kg)	Detection Limit (mg/kg)	Analysis Result (mg/kg)
Antimony	15	0.5	-	500	5.0	N.D.
Arsenic	5	0.01	-	500	0.1	2.2
Barium	100	0.02	3.8	10,000	0.2	210
Beryllium	0.75	0.01	-	75	0.1	0.3
Cadmium	1	0.01	0.054	100	0.1	1.1
Chromium (VI)	5	0.005	-	500	0.05	N.D.
Chromium (III)	560	0.005	-	2,500	0.05	120
Cobalt	80	0.05	-	8,000	0.5	6.7
Copper	25	0.01	0.071	2,500	0.1	40
Lead	5	0.005	27.0	1,000	0.05	550
Mercury	0.2	0.001	0.0013	20	0.01	0.33
Molybdenum	350	0.05	-	3,500	0.5	2.1
Nickel	20	0.05	1.3	2,000	0.5	30
Selenium	1	0.005	-	100	0.1	0.17
Silver	5	0.01	-	500	0.1	0.18
Thallium	7	0.5	-	700	5.0	N.D.
Vanadium	24	0.05	-	2,400	0.5	19
Zinc	250	0.01	3.8	5,000	0.1	550
Asbestos	-	10	-	10,000	100	-
Fluoride	180	0.1	-	18,000	1.0	-

TTLC results are reported as mg/kg of wet weight. Asbestos results are reported as fibers/g.
Analytes reported as N.D. were not present above the stated limit of detection.

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Arthur G. Burton
Laboratory Director

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Woodward-Clyde Consultants	Client Project ID: #8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript: MW2-1-3 to MW2-5-3 Composite	Received:	Jan 18, 1989
Oakland, CA 94607-4041		Extracted:	Feb 3, 1989
Attention: Alan LaTanner	Lab Number: 901-2139	Reported:	Feb 6, 1989

INORGANIC PERSISTENT AND BIOACCUMULATIVE TOXIC SUBSTANCES

	Soluble Threshold Limit Concentration Waste Extraction Test			Total Threshold Limit Concentration		
Analyte	STLC Max. Limit (mg/L)	Detection Limit (mg/L)	Analysis Result (mg/L)	TTLC Max. Limit (mg/kg)	Detection Limit (mg/kg)	Analysis Result (mg/kg)
Antimony	15	0.5	-	500	5.0	N.D.
Arsenic	5	0.01	-	500	0.1	0.96
Barium	100	0.02	3.5	10,000	0.2	160
Beryllium	0.75	0.01	-	75	0.1	0.28
Cadmium	1	0.01	-	100	0.1	0.47
Chromium (VI)	5	0.005	-	500	0.05	N.D.
Chromium (III)	560	0.005	-	2,500	0.05	43
Cobalt	80	0.05	-	8,000	0.5	5.6
Copper	25	0.01	3.5	2,500	0.1	59
Lead	5	0.005	3.4	1,000	0.05	100
Mercury	0.2	0.001	-	20	0.01	0.14
Molybdenum	350	0.05	-	3,500	0.5	0.76
Nickel	20	0.05	0.63	2,000	0.5	36
Selenium	1	0.005	-	100	0.1	0.22
Silver	5	0.01	-	500	0.1	0.15
Thallium	7	0.5	-	700	5.0	N.D.
Vanadium	24	0.05	0.64	2,400	0.5	31
Zinc	250	0.01	20.0	5,000	0.1	670
Asbestos	-	10	-	10,000	100	-
Fluoride	180	0.1	-	18,000	1.0	-

TTLC results are reported as mg/kg of wet weight. Asbestos results are reported as fibers/g.
Analytes reported as N.D. were not present above the stated limit of detection.

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Arthur G. Burton
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Woodward-Clyde Consultants	Client Project ID: #8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript: MW3-1-4 to MW3-4-4 Composite	Received:	Jan 18, 1989
Oakland, CA 94607-4041		Extracted:	Feb 3, 1989
Attention: Alan LaTanner	Lab Number: 901-2140	Reported:	Feb 6, 1989

INORGANIC PERSISTENT AND BIOACCUMULATIVE TOXIC SUBSTANCES

Analyte	Soluble Threshold Limit Concentration (Waste Extraction Test) STLC Max. Limit (mg/L)	Detection Limit (mg/L)	Analysis Result (mg/L)	Total Threshold Limit Concentration TTLC Max. Limit (mg/kg)	Detection Limit (mg/kg)	Analysis Result (mg/kg)
Antimony	15	0.5	-	500	5.0	N.D.
Arsenic	5	0.01	-	500	0.1	4.8
Barium	100	0.02	-	10,000	0.2	43
Beryllium	0.75	0.01	-	75	0.1	0.25
Cadmium	1	0.01	-	100	0.1	0.69
Chromium (VI)	5	0.005	-	500	0.05	N.D.
Chromium (III)	560	0.005	-	2,500	0.05	32
Cobalt	80	0.05	-	8,000	0.5	5.7
Copper	25	0.01	0.95	2,500	0.1	43
Lead	5	0.005	4.0	1,000	0.05	82
Mercury	0.2	0.001	-	20	0.01	0.13
Molybdenum	350	0.05	-	3,500	0.5	0.65
Nickel	20	0.05	0.81	2,000	0.5	22
Selenium	1	0.005	-	100	0.1	0.14
Silver	5	0.01	-	500	0.1	0.44
Thallium	7	0.5	-	700	5.0	N.D.
Vanadium	24	0.05	-	2,400	0.5	21
Zinc	250	0.01	-	5,000	0.1	130
Asbestos	-	10	-	10,000	100	-
Fluoride	180	0.1	-	18,000	1.0	-

TTLC results are reported as mg/kg of wet weight. Asbestos results are reported as fibers/g.
Analytes reported as N.D. were not present above the stated limit of detection.

SEQUOIA ANALYTICAL

Scott Cocan

Arthur G. Burton
Laboratory Director

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Woodward-Clyde Consultants	Client Project ID: #8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript: MW4-1-4 to MW4-6-4 Composite	Received:	Jan 18, 1989
Oakland, CA 94607-4041		Extracted:	Feb 4, 1989
Attention: Alan LaTanner	Lab Number: 901-2141	Reported:	Feb 6, 1989

INORGANIC PERSISTENT AND BIOACCUMULATIVE TOXIC SUBSTANCES

	Soluble Threshold Limit Concentration (Waste Extraction Test)			Total Threshold Limit Concentration		
Analyte	STLC Max. Limit (mg/L)	Detection Limit (mg/L)	Analysis Result (mg/L)	TTLC Max. Limit (mg/kg)	Detection Limit (mg/kg)	Analysis Result (mg/kg)
Antimony	15	0.5	-	500	5.0	N.D.
Arsenic	5	0.01	-	500	0.1	0.69
Barium	100	0.02	-	10,000	0.2	67
Beryllium	0.75	0.01	-	75	0.1	0.15
Cadmium	1	0.01	-	100	0.1	0.45
Chromium (VI)	5	0.005	-	500	0.05	N.D.
Chromium (III)	560	0.005	-	2,500	0.05	27
Cobalt	80	0.05	-	8,000	0.5	3.9
Copper	25	0.01	1.7	2,500	0.1	53
Lead	5	0.005	6.5	1,000	0.05	350
Mercury	0.2	0.001	-	20	0.01	0.16
Molybdenum	350	0.05	-	3,500	0.5	1.3
Nickel	20	0.05	0.57	2,000	0.5	25
Selenium	1	0.005	-	100	0.1	0.33
Silver	5	0.01	-	500	0.1	0.56
Thallium	7	0.5	-	700	5.0	N.D.
Vanadium	24	0.05	0.68	2,400	0.5	30
Zinc	250	0.01	-	5,000	0.1	79
Asbestos	-	10	-	10,000	100	-
Fluoride	180	0.1	-	18,000	1.0	-

TTLC results are reported as mg/kg of wet weight. Asbestos results are reported as fibers/g.
Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID: #8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript: MW5-1-4 to MW5-4-4 Composite	Received:	Jan 18, 1989
Oakland, CA 94607-4041		Extracted:	Feb 3, 1989
Attention: Alan LaTanner	Lab Number: 901-2142	Reported:	Feb 6, 1989

INORGANIC PERSISTENT AND BIOACCUMULATIVE TOXIC SUBSTANCES

	Soluble Threshold Limit Concentration Waste Extraction Test			Total Threshold Limit Concentration		
Analyte	**STLC Max. Limit** (mg/L)	**Detection Limit** (mg/L)	**Analysis Result** (mg/L)	**TTLC Max. Limit** (mg/kg)	**Detection Limit** (mg/kg)	**Analysis Result** (mg/kg)
Antimony	15	0.5	-	500	5.0	N.D.
Arsenic	5	0.01	-	500	0.1	1.1
Barium	100	0.02	-	10,000	0.2	56
Beryllium	0.75	0.01	-	75	0.1	0.15
Cadmium	1	0.01	-	100	0.1	0.34
Chromium (VI)	5	0.005	-	500	0.05	N.D.
Chromium (III)	560	0.005	-	2,500	0.05	25
Cobalt	80	0.05	-	8,000	0.5	7.2
Copper	25	0.01	5.3	2,500	0.1	62
Lead	5	0.005	0.94	1,000	0.05	21
Mercury	0.2	0.001	-	20	0.01	0.13
Molybdenum	350	0.05	-	3,500	0.5	0.83
Nickel	20	0.05	0.96	2,000	0.5	42
Selenium	1	0.005	-	100	0.1	0.19
Silver	5	0.01	-	500	0.1	0.45
Thallium	7	0.5	-	700	5.0	N.D.
Vanadium	24	0.05	0.56	2,400	0.5	56
Zinc	250	0.01	-	5,000	0.1	130
Asbestos	-	10	-	10,000	100	-
Fluoride	180	0.1	-	18,000	1.0	-

TTLC results are reported as mg/kg of wet weight. Asbestos results are reported as fibers/g.
Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW1-1-4 - MW1-5-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8240	Analyzed: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2138	Reported: Feb 2, 1989

VOLATILE ORGANICS by GC/MS (EPA 8240)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Acetone	10,000.0	N.D.
Benzene	2,000.0	N.D.
Bromodichloromethane	2,000.0	N.D.
Bromoform	2,000.0	N.D.
Bromomethane	2,000.0	N.D.
2-Butanone	10,000.0	N.D.
Carbon disulfide	2,000.0	N.D.
Carbon tetrachloride	2,000.0	N.D.
Chlorobenzene	2,000.0	N.D.
Chlorodibromomethane	2,000.0	N.D.
Chloroethane	2,000.0	N.D.
2-Chloroethyl vinyl ether	10,000.0	N.D.
Chloroform	2,000.0	N.D.
Chloromethane	2,000.0	N.D.
1,1-Dichloroethane	2,000.0	N.D.
1,2-Dichloroethane	2,000.0	N.D.
1,1-Dichloroethene	2,000.0	N.D.
Total 1,2-Dichloroethene	2,000.0	N.D.
1,2-Dichloropropane	2,000.0	N.D.
cis 1,3-Dichloropropene	2,000.0	N.D.
trans 1,3-Dichloropropene	2,000.0	N.D.
Ethylbenzene	**2,000.0**	**6,600**
2-Hexanone	10,000.0	N.D.
Methylene chloride	2,000.0	N.D.
4-Methyl-2-pentanone	10,000.0	N.D.
Styrene	2,000.0	N.D.
1,1,2,2-Tetrachloroethane	2,000.0	N.D.
Tetrachloroethene	2,000.0	N.D.
Toluene	**2,000.0**	**7,000**
1,1,1-Trichloroethane	2,000.0	N.D.
1,1,2-Trichloroethane	2,000.0	N.D.
Trichloroethene	2,000.0	N.D.
Trichlorofluoromethane	2,000.0	N.D.
Vinyl acetate	2,000.0	N.D.
Vinyl chloride	2,000.0	N.D.
Total Xylenes	**2,000.0**	**86,000**

Analytes reported as N.D. were not present above the stated limit of detection. Because matrix effects and/or other factors required additional sample dilution, detection limits for this sample have been raised.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW2-1-3 - MW2-5-3	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8240	Analyzed: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2139	Reported: Feb 2, 1989

VOLATILE ORGANICS by GC/MS (EPA 8240)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Acetone	500.0	N.D.
Benzene	100.0	N.D.
Bromodichloromethane	100.0	N.D.
Bromoform	100.0	N.D.
Bromomethane	100.0	N.D.
2-Butanone	500.0	N.D.
Carbon disulfide	100.0	N.D.
Carbon tetrachloride	100.0	N.D.
Chlorobenzene	100.0	N.D.
Chlorodibromomethane	100.0	N.D.
Chloroethane	100.0	N.D.
2-Chloroethyl vinyl ether	500.0	N.D.
Chloroform	100.0	N.D.
Chloromethane	100.0	N.D.
1,1-Dichloroethane	100.0	N.D.
1,2-Dichloroethane	100.0	N.D.
1,1-Dichloroethene	100.0	N.D.
Total 1,2-Dichloroethene	100.0	N.D.
1,2-Dichloropropane	100.0	N.D.
cis 1,3-Dichloropropene	100.0	N.D.
trans 1,3-Dichloropropene	100.0	N.D.
Ethylbenzene	**100.0**	**500**
2-Hexanone	500.0	N.D.
Methylene chloride	100.0	N.D.
4-Methyl-2-pentanone	500.0	N.D.
Styrene	100.0	N.D.
1,1,2,2-Tetrachloroethane	100.0	N.D.
Tetrachloroethene	100.0	N.D.
Toluene	**100.0**	**480**
1,1,1-Trichloroethane	100.0	N.D.
1,1,2-Trichloroethane	100.0	N.D.
Trichloroethene	100.0	N.D.
Trichlorofluoromethane	100.0	N.D.
Vinyl acetate	100.0	N.D.
Vinyl chloride	100.0	N.D.
Total Xylenes	**100.0**	**7,200**

Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW3-1-4 - MW3-4-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8240	Analyzed: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2140	Reported: Feb 2, 1989

VOLATILE ORGANICS by GC/MS (EPA 8240)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Acetone	500.0	N.D.
Benzene	100.0	N.D.
Bromodichloromethane	100.0	N.D.
Bromoform	100.0	N.D.
Bromomethane	100.0	N.D.
2-Butanone	500.0	N.D.
Carbon disulfide	100.0	N.D.
Carbon tetrachloride	100.0	N.D.
Chlorobenzene	100.0	N.D.
Chlorodibromomethane	100.0	N.D.
Chloroethane	100.0	N.D.
2-Chloroethyl vinyl ether	500.0	N.D.
Chloroform	100.0	N.D.
Chloromethane	100.0	N.D.
1,1-Dichloroethane	100.0	N.D.
1,2-Dichloroethane	100.0	N.D.
1,1-Dichloroethene	100.0	N.D.
Total 1,2-Dichloroethene	100.0	N.D.
1,2-Dichloropropane	100.0	N.D.
cis 1,3-Dichloropropene	100.0	N.D.
trans 1,3-Dichloropropene	100.0	N.D.
Ethylbenzene	100.0	N.D.
2-Hexanone	500.0	N.D.
Methylene chloride	100.0	N.D.
4-Methyl-2-pentanone	500.0	N.D.
Styrene	100.0	N.D.
1,1,2,2-Tetrachloroethane	100.0	N.D.
Tetrachloroethene	100.0	N.D.
Toluene	100.0	N.D.
1,1,1-Trichloroethane	100.0	N.D.
1,1,2-Trichloroethane	100.0	N.D.
Trichloroethene	100.0	N.D.
Trichlorofluoromethane	100.0	N.D.
Vinyl acetate	100.0	N.D.
Vinyl chloride	100.0	N.D.
Total Xylenes	100.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW4-1-4 - MW4-6-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8240	Analyzed: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2141	Reported: Feb 2, 1989

VOLATILE ORGANICS by GC/MS (EPA 8240)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Acetone	500.0	N.D.
Benzene	**100.0**	**96**
Bromodichloromethane	100.0	N.D.
Bromoform	100.0	N.D.
Bromomethane	250.0	N.D.
2-Butanone	500.0	N.D.
Carbon disulfide	100.0	N.D.
Carbon tetrachloride	100.0	N.D.
Chlorobenzene	250.0	N.D.
Chlorodibromomethane	100.0	N.D.
Chloroethane	100.0	N.D.
2-Chloroethyl vinyl ether	500.0	N.D.
Chloroform	100.0	N.D.
Chloromethane	250.0	N.D.
1,1-Dichloroethane	100.0	N.D.
1,2-Dichloroethane	100.0	N.D.
1,1-Dichloroethene	100.0	N.D.
Total 1,2-Dichloroethene	100.0	N.D.
1,2-Dichloropropane	100.0	N.D.
cis 1,3-Dichloropropene	100.0	N.D.
trans 1,3-Dichloropropene	100.0	N.D.
Ethylbenzene	**100.0**	**140**
2-Hexanone	500.0	N.D.
Methylene chloride	100.0	N.D.
4-Methyl-2-pentanone	500.0	N.D.
Styrene	100.0	N.D.
1,1,2,2-Tetrachloroethane	100.0	N.D.
Tetrachloroethene	100.0	N.D.
Toluene	**100.0**	**720**
1,1,1-Trichloroethane	100.0	N.D.
1,1,2-Trichloroethane	100.0	N.D.
Trichloroethene	100.0	N.D.
Trichlorofluoromethane	100.0	N.D.
Vinyl acetate	100.0	N.D.
Vinyl chloride	250.0	N.D.
Total Xylenes	**100.0**	**1,600**

Analytes reported as N.D. were not present above the stated limit of detection.

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Please Note:
Some detection limits had to be raised due to foaming of the sample.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW5-1-4 - MW5-4-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8240	Analyzed: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2142	Reported: Feb 2, 1989

VOLATILE ORGANICS by GC/MS (EPA 8240)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Acetone	500.0	N.D.
Benzene	100.0	N.D.
Bromodichloromethane	100.0	N.D.
Bromoform	100.0	N.D.
Bromomethane	100.0	N.D.
2-Butanone	500.0	N.D.
Carbon disulfide	100.0	N.D.
Carbon tetrachloride	100.0	N.D.
Chlorobenzene	100.0	N.D.
Chlorodibromomethane	100.0	N.D.
Chloroethane	100.0	N.D.
2-Chloroethyl vinyl ether	500.0	N.D.
Chloroform	100.0	N.D.
Chloromethane	100.0	N.D.
1,1-Dichloroethane	100.0	N.D.
1,2-Dichloroethane	100.0	N.D.
1,1-Dichloroethene	100.0	N.D.
Total 1,2-Dichloroethene	100.0	N.D.
1,2-Dichloropropane	100.0	N.D.
cis 1,3-Dichloropropene	100.0	N.D.
trans 1,3-Dichloropropene	100.0	N.D.
Ethylbenzene	100.0	N.D.
2-Hexanone	500.0	N.D.
Methylene chloride	100.0	N.D.
4-Methyl-2-pentanone	500.0	N.D.
Styrene	100.0	N.D.
1,1,2,2-Tetrachloroethane	100.0	N.D.
Tetrachloroethene	100.0	N.D.
Toluene	100.0	N.D.
1,1,1-Trichloroethane	100.0	N.D.
1,1,2-Trichloroethane	100.0	N.D.
Trichloroethene	100.0	N.D.
Trichlorofluoromethane	100.0	N.D.
Vinyl acetate	100.0	N.D.
Vinyl chloride	100.0	N.D.
Total Xylenes	100.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW1-1-4 to MW1-5-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8080	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2138	Analyzed: Feb 8, 1989
			Reported: Feb 8, 1989

ORGANOCHLORINE PESTICIDES AND PCB'S (EPA 8080)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Aldrin	50.0	N.D.
alpha-BHC	50.0	N.D.
beta-BHC	50.0	N.D.
sigma-BHC	100.0	N.D.
gamma-BHC (Lindane)	50.0	N.D.
Chlordane	500.0	N.D.
4,4'-DDD	100.0	N.D.
4,4'-DDE	50.0	N.D.
4,4'-DDT	100.0	N.D.
Dieldrin	50.0	N.D.
Endosulfan I	100.0	N.D.
Endosulfan II	50.0	N.D.
Endosulfan sulfate	500.0	N.D.
Endrin	100.0	N.D.
Endrin aldehyde	150.0	N.D.
Heptachlor	50.0	N.D.
Heptachlor expoxide	50.0	N.D.
Methoxychlor	1,500.0	N.D.
Toxaphene	1,750.0	N.D.
PCB-1016	500.0	N.D.
PCB-1221	500.0	N.D.
PCB-1232	500.0	N.D.
PCB-1242	500.0	N.D.
PCB-1248	500.0	N.D.
PCB-1254	500.0	N.D.
PCB-1260	500.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection. Because matrix effects and/or other factors required additional sample dilution, detection limits for this sample have been raised.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW2-1-3 to MW2-5-3	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8080	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2139	Analyzed: Feb 8, 1989
			Reported: Feb 8, 1989

ORGANOCHLORINE PESTICIDES AND PCB'S (EPA 8080)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Aldrin	50.0	N.D.
alpha-BHC	50.0	N.D.
beta-BHC	50.0	N.D.
sigma-BHC	100.0	N.D.
gamma-BHC (Lindane)	50.0	N.D.
Chlordane	500.0	N.D.
4,4'-DDD	100.0	N.D.
4,4'-DDE	50.0	N.D.
4,4'-DDT	100.0	N.D.
Dieldrin	50.0	N.D.
Endosulfan I	100.0	N.D.
Endosulfan II	50.0	N.D.
Endosulfan sulfate	500.0	N.D.
Endrin	100.0	N.D.
Endrin aldehyde	150.0	N.D.
Heptachlor	50.0	N.D.
Heptachlor expoxide	50.0	N.D.
Methoxychlor	1,500.0	N.D.
Toxaphene	1,750.0	N.D.
PCB-1016	500.0	N.D.
PCB-1221	500.0	N.D.
PCB-1232	500.0	N.D.
PCB-1242	500.0	N.D.
PCB-1248	500.0	N.D.
PCB-1254	500.0	N.D.
PCB-1260	500.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection. Because matrix effects and/or other factors required additional sample dilution, detection limits for this sample have been raised.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW3-1-4 to MW3-4-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8080	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2140	Analyzed: Feb 8, 1989
			Reported: Feb 8, 1989

ORGANOCHLORINE PESTICIDES AND PCB'S (EPA 8080)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Aldrin	50.0	N.D.
alpha-BHC	50.0	N.D.
beta-BHC	50.0	N.D.
sigma-BHC	100.0	N.D.
gamma-BHC (Lindane)	50.0	N.D.
Chlordane	500.0	N.D.
4,4'-DDD	100.0	N.D.
4,4'-DDE	50.0	N.D.
4,4'-DDT	100.0	N.D.
Dieldrin	50.0	N.D.
Endosulfan I	100.0	N.D.
Endosulfan II	50.0	N.D.
Endosulfan sulfate	500.0	N.D.
Endrin	100.0	N.D.
Endrin aldehyde	150.0	N.D.
Heptachlor	50.0	N.D.
Heptachlor expoxide	50.0	N.D.
Methoxychlor	1,500.0	N.D.
Toxaphene	1,750.0	N.D.
PCB-1016	500.0	N.D.
PCB-1221	500.0	N.D.
PCB-1232	500.0	N.D.
PCB-1242	500.0	N.D.
PCB-1248	500.0	N.D.
PCB-1254	500.0	N.D.
PCB-1260	500.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection. Because matrix effects and/or other factors required additional sample dilution, detection limits for this sample have been raised.

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Arthur G. Burton
Laboratory Director

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW4-1-4 to MW4-6-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8080	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2141	Analyzed: Feb 8, 1989
			Reported: Feb 8, 1989

ORGANOCHLORINE PESTICIDES AND PCB'S (EPA 8080)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Aldrin	50.0	N.D.
alpha-BHC	50.0	N.D.
beta-BHC	50.0	N.D.
sigma-BHC	100.0	N.D.
gamma-BHC (Lindane)	50.0	N.D.
Chlordane	500.0	N.D.
4,4'-DDD	100.0	N.D.
4,4'-DDE	50.0	N.D.
4,4'-DDT	100.0	N.D.
Dieldrin	50.0	N.D.
Endosulfan I	100.0	N.D.
Endosulfan II	50.0	N.D.
Endosulfan sulfate	500.0	N.D.
Endrin	100.0	N.D.
Endrin aldehyde	150.0	N.D.
Heptachlor	50.0	N.D.
Heptachlor expoxide	50.0	N.D.
Methoxychlor	1,500.0	N.D.
Toxaphene	1,750.0	N.D.
PCB-1016	500.0	N.D.
PCB-1221	500.0	N.D.
PCB-1232	500.0	N.D.
PCB-1242	500.0	N.D.
PCB-1248	500.0	N.D.
PCB-1254	500.0	N.D.
PCB-1260	500.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection. Because matrix effects and/or other factors required additional sample dilution, detection limits for this sample have been raised.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW5-1-4 to MW5-4-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8080	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2142	Analyzed: Feb 8, 1989
			Reported: Feb 8, 1989

ORGANOCHLORINE PESTICIDES AND PCB'S (EPA 8080)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Aldrin	50.0	N.D.
alpha-BHC	50.0	N.D.
beta-BHC	50.0	N.D.
sigma-BHC	100.0	N.D.
gamma-BHC (Lindane)	50.0	N.D.
Chlordane	500.0	N.D.
4,4'-DDD	100.0	N.D.
4,4'-DDE	50.0	N.D.
4,4'-DDT	100.0	N.D.
Dieldrin	50.0	N.D.
Endosulfan I	100.0	N.D.
Endosulfan II	50.0	N.D.
Endosulfan sulfate	500.0	N.D.
Endrin	100.0	N.D.
Endrin aldehyde	150.0	N.D.
Heptachlor	50.0	N.D.
Heptachlor expoxide	50.0	N.D.
Methoxychlor	1,500.0	N.D.
Toxaphene	1,750.0	N.D.
PCB-1016	500.0	N.D.
PCB-1221	500.0	N.D.
PCB-1232	500.0	N.D.
PCB-1242	500.0	N.D.
PCB-1248	500.0	N.D.
PCB-1254	500.0	N.D.
PCB-1260	500.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection. Because matrix effects and/or other factors required additional sample dilution, detection limits for this sample have been raised.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW1-1-4 to MW1-5-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2138	Analyzed: Feb 2, 1989
			Reported: Feb 6, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Acenaphthene	5,000.0	N.D.
Acenaphthylene	5,000.0	N.D.
Aniline	5,000.0	N.D.
Anthracene	5,000.0	N.D.
Benzidine	125,000.0	N.D.
Benzoic Acid	25,000.0	N.D.
Benzo(a)anthracene	5,000.0	N.D.
Benzo(b)fluoranthene	5,000.0	N.D.
Benzo(k)fluoranthene	5,000.0	N.D.
Benzo(g,h,i)perylene	5,000.0	N.D.
Benzo(a)pyrene	5,000.0	N.D.
Benzyl alcohol	5,000.0	N.D.
Bis(2-chloroethyoxy)methane	5,000.0	N.D.
Bis(2-chloroethyl)ether	5,000.0	N.D.
Bis(2-chloroisopropyl)ether	5,000.0	N.D.
Bis(2-ethylhexyl)phthalate	25,000.0	N.D.
4-Bromophenyl ether	5,000.0	N.D.
Butyl benzyl phthalate	5,000.0	N.D.
4-Chloroaniline	5,000.0	N.D.
2-Chloronaphthalene	5,000.0	N.D.
4-Chloro-3-methylphenol	5,000.0	N.D.
2-Chlorophenol	5,000.0	N.D.
4-Chlorophenyl phenyl ether	5,000.0	N.D.
Chrysene	5,000.0	N.D.
Dibenz(a,h)anthracene	5,000.0	N.D.
Dibenzofuran	5,000.0	N.D.
Di-N-butyl phthalate	25,000.0	N.D.
1,3-Dichlorobenzene	5,000.0	N.D.
1,4-Dichlorobenzene	5,000.0	N.D.
1,2-Dichlorobenzene	5,000.0	N.D.
3,3-Dichlorobenzidine	25,000.0	N.D.
2,4-Dichlorophenol	5,000.0	N.D.
Diethyl phthalate	5,000.0	N.D.
2,4-Dimethylphenol	5,000.0	N.D.
Dimethyl phthalate	5,000.0	N.D.
4,6-Dinitro-2-methylphenol	25,000.0	N.D.
2,4-Dinitrophenol	25,000.0	N.D.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW1-1-4 to MW1-5-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2138	Analyzed: Feb 2, 1989
			Reported: Feb 6, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
2,4-Dinitrotoluene	5,000.0	N.D.
2,6-Dinitrotoluene	5,000.0	N.D.
Di-N-octyl phthalate	5,000.0	N.D.
Fluoranthene	**5,000.0**	**8,000**
Fluorene	5,000.0	N.D.
Hexachlorobenzene	5,000.0	N.D.
Hexachlorobutadiene	5,000.0	N.D.
Hexachlorocyclopentadiene	5,000.0	N.D.
Hexachloroethane	5,000.0	N.D.
Indeno(1,2,3-cd)pyrene	5,000.0	N.D.
Isophorone	5,000.0	N.D.
2-Methylnaphthalene	**5,000.0**	**7,300**
2-Methylphenol	5,000.0	N.D.
4-Methylphenol	5,000.0	N.D.
Naphthalene	**5,000.0**	**76,000**
2-Nitroaniline	5,000.0	N.D.
3-Nitroaniline	5,000.0	N.D.
4-Nitroaniline	5,000.0	N.D.
Nitrobenzene	5,000.0	N.D.
2-Nitrophenol	5,000.0	N.D.
4-Nitrophenol	25,000.0	N.D.
N-Nitrosodiphenylamine	5,000.0	N.D.
N-Nitroso-di-N-propylamine	5,000.0	N.D.
Pentachlorophenol	25,000.0	N.D.
Phenathrene	**5,000.0**	**17,000**
Phenol	5,000.0	N.D.
Pyrene	**5,000.0**	**13,000**
1,2,4-Trichlorobenzene	5,000.0	N.D.
2,4,5-Trichlorophenol	5,000.0	N.D.
2,4,6-Trichlorophenol	5,000.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection. Because matrix effects and/or other factors required additional sample dilution, detection limits for this sample have been raised.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW2-1-3 to MW2-5-3	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2139	Analyzed: Feb 2, 1989
			Reported: Feb 6, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Acenaphthene	5,000.0	N.D.
Acenaphthylene	5,000.0	N.D.
Aniline	5,000.0	N.D.
Anthracene	5,000.0	N.D.
Benzidine	125,000.0	N.D.
Benzoic Acid	25,000.0	N.D.
Benzo(a)anthracene	5,000.0	N.D.
Benzo(b)fluoranthene	5,000.0	N.D.
Benzo(k)fluoranthene	5,000.0	N.D.
Benzo(g,h,i)perylene	5,000.0	N.D.
Benzo(a)pyrene	5,000.0	N.D.
Benzyl alcohol	5,000.0	N.D.
Bis(2-chloroethyoxy)methane	5,000.0	N.D.
Bis(2-chloroethyl)ether	5,000.0	N.D.
Bis(2-chloroisopropyl)ether	5,000.0	N.D.
Bis(2-ethylhexyl)phthalate	25,000.0	N.D.
4-Bromophenyl ether	5,000.0	N.D.
Butyl benzyl phthalate	5,000.0	N.D.
4-Chloroaniline	5,000.0	N.D.
2-Chloronaphthalene	5,000.0	N.D.
4-Chloro-3-methylphenol	5,000.0	N.D.
2-Chlorophenol	5,000.0	N.D.
4-Chlorophenyl phenyl ether	5,000.0	N.D.
Chrysene	5,000.0	N.D.
Dibenz(a,h)anthracene	5,000.0	N.D.
Dibenzofuran	5,000.0	N.D.
Di-N-butyl phthalate	25,000.0	N.D.
1,3-Dichlorobenzene	5,000.0	N.D.
1,4-Dichlorobenzene	5,000.0	N.D.
1,2-Dichlorobenzene	5,000.0	N.D.
3,3-Dichlorobenzidine	25,000.0	N.D.
2,4-Dichlorophenol	5,000.0	N.D.
Diethyl phthalate	5,000.0	N.D.
2,4-Dimethylphenol	5,000.0	N.D.
Dimethyl phthalate	5,000.0	N.D.
4,6-Dinitro-2-methylphenol	25,000.0	N.D.
2,4-Dinitrophenol	25,000.0	N.D.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW2-1-3 to MW2-5-3	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2139	Analyzed: Feb 2, 1989
			Reported: Feb 6, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
2,4-Dinitrotoluene	5,000.0	N.D.
2,6-Dinitrotoluene	5,000.0	N.D.
Di-N-octyl phthalate	5,000.0	N.D.
Fluoranthene	5,000.0	N.D.
Fluorene	5,000.0	N.D.
Hexachlorobenzene	5,000.0	N.D.
Hexachlorobutadiene	5,000.0	N.D.
Hexachlorocyclopentadiene	5,000.0	N.D.
Hexachloroethane	5,000.0	N.D.
Indeno(1,2,3-cd)pyrene	5,000.0	N.D.
Isophorone	5,000.0	N.D.
2-Methylnaphthalene	5,000.0	N.D.
2-Methylphenol	5,000.0	N.D.
-Methylphenol	5,000.0	N.D.
Naphthalene	5,000.0	13,000
2-Nitroaniline	5,000.0	N.D.
3-Nitroaniline	5,000.0	N.D.
4-Nitroaniline	5,000.0	N.D.
Nitrobenzene	5,000.0	N.D.
2-Nitrophenol	5,000.0	N.D.
4-Nitrophenol	25,000.0	N.D.
N-Nitrosodiphenylamine	5,000.0	N.D.
N-Nitroso-di-N-propylamine	5,000.0	N.D.
Pentachlorophenol	25,000.0	N.D.
Phenathrene	5,000.0	N.D.
Phenol	5,000.0	N.D.
Pyrene	5,000.0	N.D.
1,2,4-Trichlorobenzene	5,000.0	N.D.
2,4,5-Trichlorophenol	5,000.0	N.D.
2,4,6-Trichlorophenol	5,000.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection. Because matrix effects and/or other factors required additional sample dilution, detection limits for this sample have been raised.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW3-1-4 to MW3-4-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2140	Analyzed: Feb 3, 1989
			Reported: Feb 6, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Acenaphthene	100.0	N.D.
Acenaphthylene	100.0	N.D.
Aniline	100.0	N.D.
Anthracene	100.0	N.D.
Benzidine	2,500.0	N.D.
Benzoic Acid	500.0	N.D.
Benzo(a)anthracene	100.0	130
Benzo(b)fluoranthene	100.0	400
Benzo(k)fluoranthene	100.0	N.D.
Benzo(g,h,i)perylene	100.0	300
Benzo(a)pyrene	100.0	250
Benzyl alcohol	100.0	N.D.
Bis(2-chloroethyoxy)methane	100.0	N.D.
Bis(2-chloroethyl)ether	100.0	N.D.
Bis(2-chloroisopropyl)ether	100.0	N.D.
Bis(2-ethylhexyl)phthalate	500.0	N.D.
4-Bromophenyl ether	100.0	N.D.
Butyl benzyl phthalate	100.0	N.D.
4-Chloroaniline	100.0	N.D.
2-Chloronaphthalene	100.0	N.D.
4-Chloro-3-methylphenol	100.0	N.D.
2-Chlorophenol	100.0	N.D.
4-Chlorophenyl phenyl ether	100.0	N.D.
Chrysene	100.0	120
Dibenz(a,h)anthracene	100.0	N.D.
Dibenzofuran	100.0	N.D.
Di-N-butyl phthalate	500.0	N.D.
1,3-Dichlorobenzene	100.0	N.D.
1,4-Dichlorobenzene	100.0	N.D.
1,2-Dichlorobenzene	100.0	N.D.
3,3-Dichlorobenzidine	500.0	N.D.
2,4-Dichlorophenol	100.0	N.D.
Diethyl phthalate	100.0	N.D.
2,4-Dimethylphenol	100.0	N.D.
Dimethyl phthalate	100.0	N.D.
4,6-Dinitro-2-methylphenol	500.0	N.D.
2,4-Dinitrophenol	500.0	N.D.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW3-1-4 to MW3-4-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2140	Analyzed: Feb 3, 1989
			Reported: Feb 6, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
2,4-Dinitrotoluene	100.0	N.D.
2,6-Dinitrotoluene	100.0	N.D.
Di-N-octyl phthalate	100.0	N.D.
Fluoranthene	100.0	160
Fluorene	100.0	N.D.
Hexachlorobenzene	100.0	N.D.
Hexachlorobutadiene	100.0	N.D.
Hexachlorocyclopentadiene	100.0	N.D.
Hexachloroethane	100.0	N.D.
Indeno(1,2,3-cd)pyrene	100.0	430
Isophorone	100.0	N.D.
2-Methylnaphthalene	100.0	N.D.
2-Methylphenol	100.0	N.D.
4-Methylphenol	100.0	N.D.
Naphthalene	100.0	N.D.
2-Nitroanilline	100.0	N.D.
3-Nitroanilline	100.0	N.D.
4-Nitroanilline	100.0	N.D.
Nitrobenzene	100.0	N.D.
2-Nitrophenol	100.0	N.D.
4-Nitrophenol	500.0	N.D.
N-Nitrosodiphenylamine	100.0	N.D.
N-Nitroso-di-N-propylamine	100.0	N.D.
Pentachlorophenol	500.0	N.D.
Phenathrene	100.0	N.D.
Phenol	100.0	N.D.
Pyrene	100.0	380
1,2,4-Trichlorobenzene	100.0	N.D.
2,4,5-Trichlorophenol	100.0	N.D.
2,4,6-Trichlorophenol	100.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW4-1-4 to MW4-6-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2141	Analyzed: Feb 2, 1989
			Reported: Feb 6, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Acenaphthene	5,000.0	N.D.
Acenaphthylene	5,000.0	N.D.
Aniline	5,000.0	N.D.
Anthracene	5,000.0	N.D.
Benzidine	125,000.0	N.D.
Benzoic Acid	25,000.0	N.D.
Benzo(a)anthracene	5,000.0	N.D.
Benzo(b)fluoranthene	5,000.0	N.D.
Benzo(k)fluoranthene	5,000.0	N.D.
Benzo(g,h,i)perylene	5,000.0	N.D.
Benzo(a)pyrene	5,000.0	N.D.
Benzyl alcohol	5,000.0	N.D.
Bis(2-chloroethyoxy)methane	5,000.0	N.D.
Bis(2-chloroethyl)ether	5,000.0	N.D.
Bis(2-chloroisopropyl)ether	5,000.0	N.D.
Bis(2-ethylhexyl)phthalate	25,000.0	N.D.
4-Bromophenyl ether	5,000.0	N.D.
Butyl benzyl phthalate	5,000.0	N.D.
4-Chloroaniline	5,000.0	N.D.
2-Chloronaphthalene	5,000.0	N.D.
4-Chloro-3-methylphenol	5,000.0	N.D.
2-Chlorophenol	5,000.0	N.D.
4-Chlorophenyl phenyl ether	5,000.0	N.D.
Chrysene	5,000.0	N.D.
Dibenz(a,h)anthracene	5,000.0	N.D.
Dibenzofuran	5,000.0	N.D.
Di-N-butyl phthalate	25,000.0	N.D.
1,3-Dichlorobenzene	5,000.0	N.D.
1,4-Dichlorobenzene	5,000.0	N.D.
1,2-Dichlorobenzene	5,000.0	N.D.
3,3-Dichlorobenzidine	25,000.0	N.D.
2,4-Dichlorophenol	5,000.0	N.D.
Diethyl phthalate	5,000.0	N.D.
2,4-Dimethylphenol	5,000.0	N.D.
Dimethyl phthalate	5,000.0	N.D.
4,6-Dinitro-2-methylphenol	25,000.0	N.D.
2,4-Dinitrophenol	25,000.0	N.D.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW4-1-4 to MW4-6-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2141	Analyzed: Feb 2, 1989
			Reported: Feb 6, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
2,4-Dinitrotoluene	5,000.0	N.D.
2,6-Dinitrotoluene	5,000.0	N.D.
Di-N-octyl phthalate	5,000.0	N.D.
Fluoranthene	5,000.0	N.D.
Fluorene	5,000.0	N.D.
Hexachlorobenzene	5,000.0	N.D.
Hexachlorobutadiene	5,000.0	N.D.
Hexachlorocyclopentadiene	5,000.0	N.D.
Hexachloroethane	5,000.0	N.D.
Indeno(1,2,3-cd)pyrene	5,000.0	N.D.
Isophorone	5,000.0	N.D.
2-Methylnaphthalene	5,000.0	N.D.
2-Methylphenol	5,000.0	N.D.
4-Methylphenol	5,000.0	N.D.
Naphthalene	5,000.0	N.D.
2-Nitroaniline	5,000.0	N.D.
3-Nitroaniline	5,000.0	N.D.
4-Nitroaniline	5,000.0	N.D.
Nitrobenzene	5,000.0	N.D.
2-Nitrophenol	5,000.0	N.D.
4-Nitrophenol	25,000.0	N.D.
N-Nitrosodiphenylamine	5,000.0	N.D.
N-Nitroso-di-N-propylamine	5,000.0	N.D.
Pentachlorophenol	25,000.0	N.D.
Phenathrene	5,000.0	N.D.
Phenol	5,000.0	N.D.
Pyrene	5,000.0	N.D.
1,2,4-Trichlorobenzene	5,000.0	N.D.
2,4,5-Trichlorophenol	5,000.0	N.D.
2,4,6-Trichlorophenol	5,000.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection. Because matrix effects and/or other factors required additional sample dilution, detection limits for this sample have been raised.

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Laboratory Director

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW5-1-4 to MW5-4-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2142	Analyzed: Feb 2, 1989
			Reported: Feb 6, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
Acenaphthene	5,000.0	N.D.
Acenaphthylene	5,000.0	N.D.
Aniline	5,000.0	N.D.
Anthracene	5,000.0	N.D.
Benzidine	125,000.0	N.D.
Benzoic Acid	25,000.0	N.D.
Benzo(a)anthracene	5,000.0	N.D.
Benzo(b)fluoranthene	5,000.0	N.D.
Benzo(k)fluoranthene	5,000.0	N.D.
Benzo(g,h,i)perylene	5,000.0	N.D.
Benzo(a)pyrene	5,000.0	N.D.
Benzyl alcohol	5,000.0	N.D.
Bis(2-chloroethyoxy)methane	5,000.0	N.D.
Bis(2-chloroethyl)ether	5,000.0	N.D.
Bis(2-chloroisopropyl)ether	5,000.0	N.D.
Bis(2-ethylhexyl)phthalate	25,000.0	N.D.
4-Bromophenyl ether	5,000.0	N.D.
Butyl benzyl phthalate	5,000.0	N.D.
4-Chloroaniline	5,000.0	N.D.
2-Chloronaphthalene	5,000.0	N.D.
4-Chloro-3-methylphenol	5,000.0	N.D.
2-Chlorophenol	5,000.0	N.D.
4-Chlorophenyl phenyl ether	5,000.0	N.D.
Chrysene	5,000.0	N.D.
Dibenz(a,h)anthracene	5,000.0	N.D.
Dibenzofuran	5,000.0	N.D.
Di-N-butyl phthalate	25,000.0	N.D.
1,3-Dichlorobenzene	5,000.0	N.D.
1,4-Dichlorobenzene	5,000.0	N.D.
1,2-Dichlorobenzene	5,000.0	N.D.
3,3-Dichlorobenzidine	25,000.0	N.D.
2,4-Dichlorophenol	5,000.0	N.D.
Diethyl phthalate	5,000.0	N.D.
2,4-Dimethylphenol	5,000.0	N.D.
Dimethyl phthalate	5,000.0	N.D.
4,6-Dinitro-2-methylphenol	25,000.0	N.D.
2,4-Dinitrophenol	25,000.0	N.D.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Soil, MW5-1-4 to MW5-4-4	Received: Jan 18, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2142	Analyzed: Feb 2, 1989
			Reported: Feb 6, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/kg	Sample Results ug/kg
2,4-Dinitrotoluene	5,000.0	N.D.
2,6-Dinitrotoluene	5,000.0	N.D.
Di-N-octyl phthalate	5,000.0	N.D.
Fluoranthene	5,000.0	N.D.
Fluorene	5,000.0	N.D.
Hexachlorobenzene	5,000.0	N.D.
Hexachlorobutadiene	5,000.0	N.D.
Hexachlorocyclopentadiene	5,000.0	N.D.
Hexachloroethane	5,000.0	N.D.
Indeno(1,2,3-cd)pyrene	5,000.0	N.D.
Isophorone	5,000.0	N.D.
2-Methylnaphthalene	5,000.0	N.D.
2-Methylphenol	5,000.0	N.D.
[illegible]-Methylphenol	5,000.0	N.D.
Naphthalene	5,000.0	N.D.
2-Nitroaniline	5,000.0	N.D.
3-Nitroaniline	5,000.0	N.D.
4-Nitroaniline	5,000.0	N.D.
Nitrobenzene	5,000.0	N.D.
2-Nitrophenol	5,000.0	N.D.
4-Nitrophenol	25,000.0	N.D.
N-Nitrosodiphenylamine	5,000.0	N.D.
N-Nitroso-di-N-propylamine	5,000.0	N.D.
Pentachlorophenol	25,000.0	N.D.
Phenathrene	5,000.0	N.D.
Phenol	5,000.0	N.D.
Pyrene	5,000.0	N.D.
1,2,4-Trichlorobenzene	5,000.0	N.D.
2,4,5-Trichlorophenol	5,000.0	N.D.
2,4,6-Trichlorophenol	5,000.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection. Because matrix effects and/or other factors required additional sample dilution, detection limits for this sample have been raised.

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Laboratory Director

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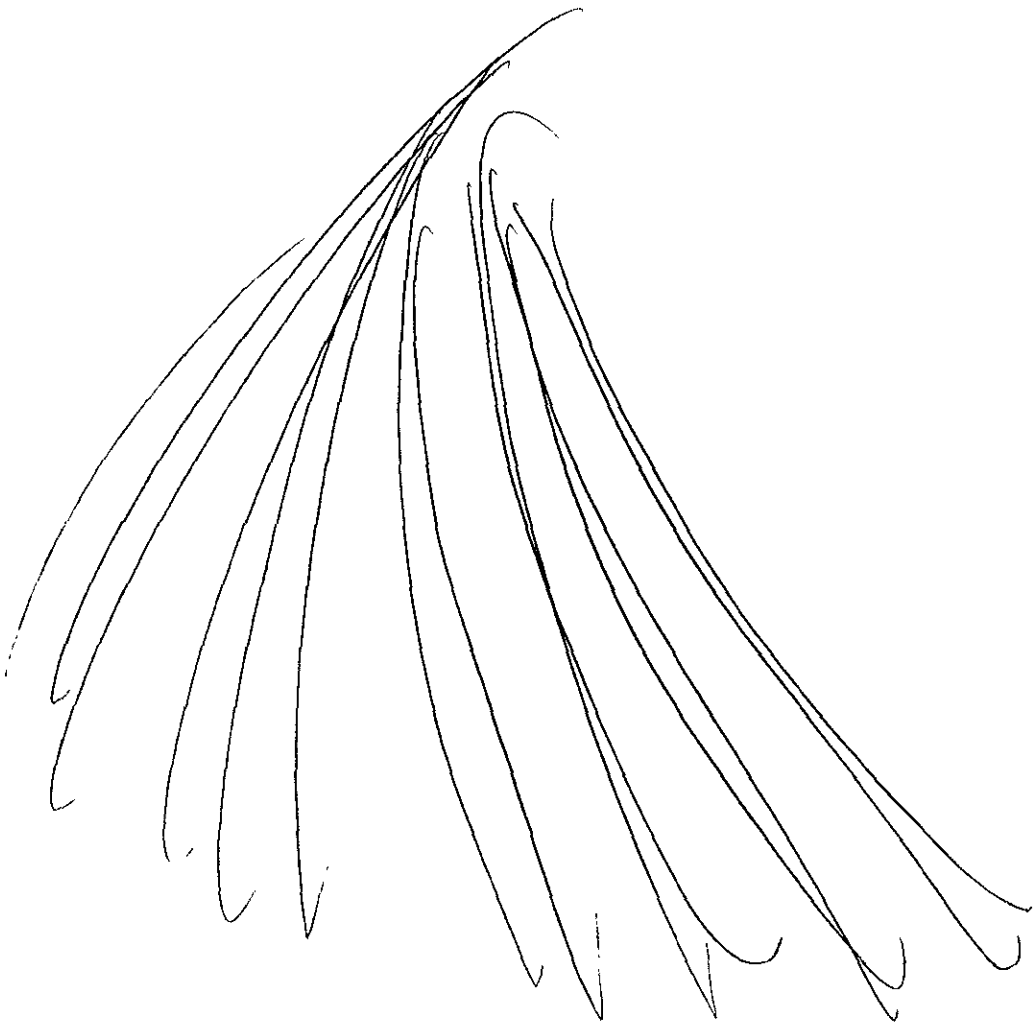

APPENDIX C

WATER SAMPLES: CHEMICAL ANALYSIS REPORTS

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Water	Relogged:	Mar 2, 1989
Oakland, CA 94607-4041	Analysis for:	pH		
Attention: Alan LaTanner	First Sample #:	901-2218	Analyzed:	Mar 2, 1989
			Reported:	Mar 2, 1989

LABORATORY ANALYSIS FOR: pH

Sample Number	Sample Description	Detection Limit mg/L	Sample Result mg/L
901-2218	MW2	N.A.	7.8
901-2219	MW3	N.A.	8.1
901-2220	MW4	N.A.	8.2
901-2221	MW5	N.A.	7.8
901-2222	MW1	N.A.	7.5

Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	1/18-1/19/89
500 12th St., Suite 100	Matrix Descript:	Water	Received:	Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 5030/8015/8020	Analyzed:	Feb 7, 1989
Attention: Alan LaTanner	First Sample #:	901-2218	Reported:	Feb 8, 1989

TOTAL PETROLEUM FUEL HYDROCARBONS with BTEX DISTINCTION (EPA 8015/8020)

Sample Number	Sample Description	Low/Medium B.P. Hydrocarbons ug/L (ppb)	Benzene ug/L (ppb)	Toluene ug/L (ppb)	Ethyl Benzene ug/L (ppb)	Xylenes ug/L (ppb)
901-2218	MW2	67	1.1	0.57	N.D.	0.9
901-2219	MW3	N.D.	N.D.	N.D.	N.D.	0.64
901-2220	MW4	120	0.93	7.9	1.9	6.9
901-2221	MW5	N.D.	N.D.	1.1	N.D.	1.8
901-2222	MW1	2,500	4.0	430	9.0	140
Detection Limits:		**50.0**	**0.5**	**0.5**	**0.5**	**0.5**

Low to Medium Boiling Point Hydrocarbons are quantitated against a gasoline standard.
Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	1/18-1/19/89
500 12th St., Suite 100	Matrix Descript:	Water	Received:	Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 3510/8015	Analyzed:	Feb 2, 1989
Attention: Alan LaTanner	First Sample #:	901-2218	Reported:	Feb 8, 1989

TOTAL PETROLEUM FUEL HYDROCARBONS (EPA 8015)

Sample Number	Sample Description	High B.P. Hydrocarbons ug/L (ppb)
901-2218	MW2	N.D.
901-2219	MW3	540
901-2220	MW4	540
901-2221	MW5	270
901-2222	MW1	290

Detection Limits:	**50.0**

High Boiling Point Hydrocarbons are quantitated against a diesel fuel standard.
Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	1/18-1/19/89
500 12th St., Suite 100	Matrix Descript:	Water	Received:	Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 413.2 (I.R.)	Extracted:	Feb 6, 1989
Attention: Alan LaTanner	First Sample #:	901-2218	Analyzed:	Feb 6, 1989
			Reported:	Feb 8, 1989

TOTAL RECOVERABLE OIL & GREASE

Sample Number	Sample Description	Oil & Grease mg/L (ppm)
901-2218	MW2	N.D.
901-2219	MW3	N.D.
901-2220	MW4	3.5
901-2221	MW5	N.D.
901-2222	MW1	1.4

Detection Limits:	**1.0**

Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	1/18-1/19/89
500 12th St., Suite 100	Sample Descript:	MW1	Received:	Jan 19, 1989
Oakland, CA 94607-4041			Extracted:	Feb 8, 1989
Attention: Alan LaTanner	Lab Number:	901-2222	Reported:	Feb 8, 1989

INORGANIC PERSISTENT AND BIOACCUMULATIVE TOXIC SUBSTANCES

	Soluble Threshold Limit Concentration (Waste Extraction Test)			Total Threshold Limit Concentration		
Analyte	**STLC Max. Limit** (mg/L)	**Detection Limit** (mg/L)	**Analysis Result** (mg/L)	**TTLC Max. Limit** (mg/kg)	**Detection Limit** mg/L	**Analysis Result** mg/L
Antimony	15	0.5	-	500	5.0	N.D.
Arsenic	5	0.01	-	500	0.01	N.D.
Barium	**100**	**0.02**	**-**	**10,000**	**0.2**	**0.31**
Beryllium	0.75	0.01	-	75	0.1	N.D.
Cadmium	1	0.01	-	100	0.1	N.D.
Chromium (VI)	5	0.005	-	500	0.005	N.D.
Chromium (III)	**560**	**0.005**	**-**	**2,500**	**0.05**	**0.15**
Cobalt	80	0.05	-	8,000	0.5	N.D.
Copper	25	0.01	-	2,500	0.1	N.D.
Lead	**5**	**0.005**	**-**	**1,000**	**0.005**	**0.7**
Mercury	0.2	0.001	-	20	0.001	N.D.
Molybdenum	350	0.05	-	3,500	0.5	N.D.
Nickel	20	0.05	-	2,000	0.5	N.D.
Selenium	1	0.005	-	100	0.01	N.D.
Silver	5	0.01	-	500	0.1	N.D.
Thallium	7	0.5	-	700	5.0	N.D.
Vanadium	24	0.05	-	2,400	0.5	N.D.
Zinc	250	0.01	-	5,000	0.1	N.D.
Asbestos	-	10	-	10,000	100	-
Fluoride	180	0.1	-	18,000	1.0	-

TTLC results are reported as mg/kg of wet weight. Asbestos results are reported as fibers/g.
Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	1/18-1/19/89
500 12th St., Suite 100	Sample Descript:	MW2	Received:	Jan 19, 1989
Oakland, CA 94607-4041			Extracted:	Feb 8, 1989
Attention: Alan LaTanner	Lab Number:	901-2218	Reported:	Feb 8, 1989

INORGANIC PERSISTENT AND BIOACCUMULATIVE TOXIC SUBSTANCES

	Soluble Threshold Limit Concentration Waste Extraction Test			Total Threshold Limit Concentration		
Analyte	**STLC Max. Limit** (mg/L)	**Detection Limit** (mg/L)	**Analysis Result** (mg/L)	**TTLC Max. Limit** (mg/kg)	**Detection Limit** mg/L	**Analysis Result** mg/L
Antimony	15	0.5	-	500	5.0	N.D.
Arsenic	5	0.01	-	500	0.01	N.D.
Barium	**100**	**0.02**	**-**	**10,000**	**0.2**	**1.4**
Beryllium	0.75	0.01	-	75	0.1	N.D.
Cadmium	1	0.01	-	100	0.1	N.D.
Chromium (VI)	5	0.005	-	500	0.005	N.D.
Chromium (III)	560	0.005	-	2,500	0.05	N.D.
Cobalt	80	0.05	-	8,000	0.5	N.D.
Copper	25	0.01	-	2,500	0.1	N.D.
Lead	**5**	**0.005**	**-**	**1,000**	**0.005**	**0.2**
Mercury	0.2	0.001	-	20	0.001	N.D.
Molybdenum	350	0.05	-	3,500	0.5	N.D.
Nickel	20	0.05	-	2,000	0.5	N.D.
Selenium	1	0.005	-	100	0.01	N.D.
Silver	5	0.01	-	500	0.1	N.D.
Thallium	7	0.5	-	700	5.0	N.D.
Vanadium	24	0.05	-	2,400	0.5	N.D.
Zinc	250	0.01	-	5,000	0.1	N.D.
Asbestos	-	10	-	10,000	100	-
Fluoride	180	0.1	-	18,000	1.0	-

TTLC results are reported as mg/kg of wet weight. Asbestos results are reported as fibers/g.
Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	1/18-1/19/89
500 12th St., Suite 100	Sample Descript:	MW3	Received:	Jan 19, 1989
Oakland, CA 94607-4041			Extracted:	Feb 8, 1989
Attention: Alan LaTanner	Lab Number:	901-2219	Reported:	Feb 8, 1989

INORGANIC PERSISTENT AND BIOACCUMULATIVE TOXIC SUBSTANCES

	Soluble Threshold Limit Concentration Waste Extraction Test			Total Threshold Limit Concentration		
Analyte	**STLC Max. Limit** (mg/L)	**Detection Limit** (mg/L)	**Analysis Result** (mg/L)	**TTLC Max. Limit** (mg/kg)	**Detection Limit** mg/L	**Analysis Result** mg/L
Antimony	15	0.5	-	500	0.5	N.D.
Arsenic	5	0.01	-	500	0.01	N.D.
Barium	100	0.02	-	10,000	0.2	N.D.
Beryllium	0.75	0.01	-	75	0.01	N.D.
Cadmium	1	0.01	-	100	0.01	N.D.
Chromium (VI)	5	0.005	-	500	0.005	N.D.
Chromium (III)	560	0.005	-	2,500	0.005	N.D.
Cobalt	80	0.05	-	8,000	0.05	N.D.
Copper	25	0.01	-	2,500	0.01	N.D.
Lead	**5**	**0.005**	**-**	**1,000**	**0.005**	**0.050**
Mercury	0.2	0.001	-	20	0.001	N.D.
Molybdenum	350	0.05	-	3,500	0.5	N.D.
Nickel	20	0.05	-	2,000	0.05	N.D.
Selenium	1	0.005	-	100	0.01	N.D.
Silver	5	0.01	-	500	0.01	N.D.
Thallium	7	0.5	-	700	0.5	N.D.
Vanadium	24	0.05	-	2,400	0.5	N.D.
Zinc	**250**	**0.01**	**-**	**5,000**	**0.01**	**0.098**
Asbestos	-	10	-	10,000	100	-
Fluoride	180	0.1	-	18,000	1.0	-

TTLC results are reported as mg/kg of wet weight. Asbestos results are reported as fibers/g.
Analytes reported as N.D. were not present above the stated limit of detection.

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(415) 364-9600 • FAX (415) 364-9233

Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	1/18-1/19/89
500 12th St., Suite 100	Sample Descript:	MW4	Received:	Jan 19, 1989
Oakland, CA 94607-4041			Extracted:	Feb 8, 1989
Attention: Alan LaTanner	Lab Number:	901-2220	Reported:	Feb 8, 1989

INORGANIC PERSISTENT AND BIOACCUMULATIVE TOXIC SUBSTANCES

	Soluble Threshold Limit Concentration Waste Extraction Test			Total Threshold Limit Concentration		
Analyte	**STLC Max. Limit** (mg/L)	**Detection Limit** (mg/L)	**Analysis Result** (mg/L)	**TTLC Max. Limit** (mg/kg)	**Detection Limit** mg/L	**Analysis Result** mg/L
Antimony	15	0.5	-	500	0.5	N.D.
Arsenic	5	0.01	-	500	0.01	N.D.
Barium	**100**	**0.02**	**-**	**10,000**	**0.02**	**0.85**
Beryllium	0.75	0.01	-	75	0.01	N.D.
Cadmium	1	0.01	-	100	0.01	N.D.
Chromium (VI)	5	0.005	-	500	0.005	N.D.
Chromium (III)	560	0.005	-	2,500	0.005	N.D.
Cobalt	80	0.05	-	8,000	0.05	N.D.
Copper	25	0.01	-	2,500	0.01	N.D.
Lead	**5**	**0.005**	**-**	**1,000**	**0.005**	**0.10**
Mercury	0.2	0.001	-	20	0.001	N.D.
Molybdenum	350	0.05	-	3,500	0.05	N.D.
Nickel	**20**	**0.05**	**-**	**2,000**	**0.05**	**0.064**
Selenium	1	0.005	-	100	0.01	N.D.
Silver	5	0.01	-	500	0.01	N.D.
Thallium	7	0.5	-	700	0.5	N.D.
Vanadium	24	0.05	-	2,400	0.05	N.D.
Zinc	**250**	**0.01**	**-**	**5,000**	**0.01**	**0.17**
Asbestos	-	10	-	10,000	100	-
Fluoride	180	0.1	-	18,000	1.0	-

TTLC results are reported as mg/kg of wet weight. Asbestos results are reported as fibers/g.
Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	1/18-1/19/89
500 12th St., Suite 100	Sample Descript:	MW5	Received:	Jan 19, 1989
Oakland, CA 94607-4041			Extracted:	Feb 8, 1989
Attention: Alan LaTanner	Lab Number:	901-2221	Reported:	Feb 8, 1989

INORGANIC PERSISTENT AND BIOACCUMULATIVE TOXIC SUBSTANCES

	Soluble Threshold Limit Concentration (Waste Extraction Test)			Total Threshold Limit Concentration		
Analyte	**STLC Max. Limit** (mg/L)	**Detection Limit** (mg/L)	**Analysis Result** (mg/L)	**TTLC Max. Limit** (mg/kg)	**Detection Limit** mg/L	**Analysis Result** mg/L
Antimony	15	0.5	-	500	0.5	N.D.
Arsenic	**5**	**0.01**	**-**	**500**	**0.01**	**0.037**
Barium	**100**	**0.02**	**-**	**10,000**	**0.02**	**0.74**
Beryllium	0.75	0.01	-	75	0.01	N.D.
Cadmium	1	0.01	-	100	0.01	N.D.
Chromium (VI)	5	0.005	-	500	0.005	N.D.
Chromium (III)	560	0.005	-	2,500	0.005	N.D.
Cobalt	80	0.05	-	8,000	0.05	N.D.
Copper	25	0.01	-	2,500	0.01	N.D.
Lead	**5**	**0.005**	**-**	**1,000**	**0.005**	**0.07**
Mercury	0.2	0.001	-	20	0.001	N.D.
Molybdenum	350	0.05	-	3,500	0.05	N.D.
Nickel	**20**	**0.05**	**-**	**2,000**	**0.05**	**0.078**
Selenium	1	0.005	-	100	0.01	N.D.
Silver	5	0.01	-	500	0.01	N.D.
Thallium	7	0.5	-	700	0.5	N.D.
Vanadium	24	0.05	-	2,400	0.05	N.D.
Zinc	**250**	**0.01**	**-**	**5,000**	**0.01**	**0.076**
Asbestos	-	10	-	10,000	100	-
Fluoride	180	0.1	-	18,000	1.0	-

TTLC results are reported as mg/kg of wet weight. Asbestos results are reported as fibers/g.
Analytes reported as N.D. were not present above the stated limit of detection.

SEQUOIA ANALYTICAL

Arthur G. Burton
Laboratory Director

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680 Chesapeake Drive • Redwood City, CA 94063
(415) 364-9600 • FAX (415) 364-9233

Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	Jan 19, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW1	Received:	Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8240	Analyzed:	Feb 3, 1989
Attention: Alan LaTanner	Lab Number:	901-2222	Reported:	Feb 8, 1989

VOLATILE ORGANICS by GC/MS (EPA 8240)

Analyte	Detection Limit ug/L	Sample Results ug/L
Acetone	50.0	280
Benzene	10.0	N.D.
Bromodichloromethane	10.0	N.D.
Bromoform	10.0	N.D.
Bromomethane	10.0	N.D.
2-Butanone	50.0	55
Carbon disulfide	10.0	N.D.
Carbon tetrachloride	10.0	N.D.
Chlorobenzene	10.0	N.D.
Chlorodibromomethane	10.0	N.D.
Chloroethane	10.0	N.D.
2-Chloroethyl vinyl ether	50.0	N.D.
Chloroform	10.0	N.D.
Chloromethane	10.0	N.D.
1,1-Dichloroethane	10.0	N.D.
1,2-Dichloroethane	10.0	N.D.
1,1-Dichloroethene	10.0	N.D.
Total 1,2-Dichloroethene	10.0	N.D.
1,2-Dichloropropane	10.0	N.D.
cis 1,3-Dichloropropene	10.0	N.D.
trans 1,3-Dichloropropene	10.0	N.D.
Ethylbenzene	10.0	11
2-Hexanone	50.0	2,800
Methylene chloride	10.0	N.D.
4-Methyl-2-pentanone	50.0	N.D.
Styrene	10.0	N.D.
1,1,2,2-Tetrachloroethane	10.0	N.D.
Tetrachloroethene	10.0	N.D.
Toluene	10.0	23
1,1,1-Trichloroethane	10.0	N.D.
1,1,2-Trichloroethane	10.0	N.D.
Trichloroethene	10.0	N.D.
Trichlorofluoromethane	10.0	N.D.
Vinyl acetate	10.0	N.D.
Vinyl chloride	10.0	N.D.
Total Xylenes	10.0	170

Analytes reported as N.D. were not present above the stated limit of detection. Because matrix effects and/or other factors required additional sample dilution, detection limits for this sample have been raised.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW2	Received:	Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8240	Analyzed:	Feb 2, 1989
Attention: Alan LaTanner	Lab Number:	901-2218	Reported:	Feb 8, 1989

VOLATILE ORGANICS by GC/MS (EPA 8240)

Analyte	Detection Limit ug/L	Sample Results ug/L
Acetone	10.0	20
Benzene	2.0	4.9
Bromodichloromethane	2.0	N.D.
Bromoform	2.0	N.D.
Bromomethane	2.0	N.D.
2-Butanone	10.0	N.D.
Carbon disulfide	2.0	N.D.
Carbon tetrachloride	2.0	N.D.
Chlorobenzene	2.0	N.D.
Chlorodibromomethane	2.0	N.D.
Chloroethane	2.0	N.D.
2-Chloroethyl vinyl ether	10.0	N.D.
Chloroform	2.0	N.D.
Chloromethane	2.0	N.D.
1,1-Dichloroethane	2.0	N.D.
1,2-Dichloroethane	2.0	N.D.
1,1-Dichloroethene	2.0	N.D.
Total 1,2-Dichloroethene	2.0	N.D.
1,2-Dichloropropane	2.0	N.D.
cis 1,3-Dichloropropene	2.0	N.D.
trans 1,3-Dichloropropene	2.0	N.D.
Ethylbenzene	2.0	N.D.
2-Hexanone	10.0	N.D.
Methylene chloride	2.0	4.0
4-Methyl-2-pentanone	10.0	N.D.
Styrene	2.0	N.D.
1,1,2,2-Tetrachloroethane	2.0	N.D.
Tetrachloroethene	2.0	N.D.
Toluene	2.0	N.D.
1,1,1-Trichloroethane	2.0	N.D.
1,1,2-Trichloroethane	2.0	N.D.
Trichloroethene	2.0	N.D.
Trichlorofluoromethane	2.0	N.D.
Vinyl acetate	2.0	N.D.
Vinyl chloride	2.0	N.D.
Total Xylenes	2.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW3	Received:	Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8240	Analyzed:	Feb 2, 1989
Attention: Alan LaTanner	Lab Number:	901-2219	Reported:	Feb 8, 1989

VOLATILE ORGANICS by GC/MS (EPA 8240)

Analyte	Detection Limit ug/L	Sample Results ug/L
Acetone	20.0	N.D.
Benzene	4.0	N.D.
Bromodichloromethane	4.0	N.D.
Bromoform	4.0	N.D.
Bromomethane	4.0	N.D.
2-Butanone	20.0	N.D.
Carbon disulfide	4.0	N.D.
Carbon tetrachloride	4.0	N.D.
Chlorobenzene	4.0	N.D.
Chlorodibromomethane	4.0	N.D.
Chloroethane	4.0	N.D.
2-Chloroethyl vinyl ether	20.0	N.D.
Chloroform	4.0	N.D.
Chloromethane	4.0	N.D.
1,1-Dichloroethane	4.0	N.D.
1,2-Dichloroethane	4.0	N.D.
1,1-Dichloroethene	4.0	N.D.
Total 1,2-Dichloroethene	4.0	N.D.
1,2-Dichloropropane	4.0	N.D.
cis 1,3-Dichloropropene	4.0	N.D.
trans 1,3-Dichloropropene	4.0	N.D.
Ethylbenzene	4.0	N.D.
2-Hexanone	20.0	N.D.
Methylene chloride	4.0	360
4-Methyl-2-pentanone	20.0	N.D.
Styrene	4.0	N.D.
1,1,2,2-Tetrachloroethane	4.0	N.D.
Tetrachloroethene	4.0	N.D.
Toluene	4.0	N.D.
1,1,1-Trichloroethane	4.0	N.D.
1,1,2-Trichloroethane	4.0	N.D.
Trichloroethene	4.0	N.D.
Trichlorofluoromethane	4.0	N.D.
Vinyl acetate	4.0	N.D.
Vinyl chloride	4.0	N.D.
Total Xylenes	4.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection. Because matrix effects and/or other factors required additional sample dilution, detection limits for this sample have been raised.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW4	Received:	Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8240	Analyzed:	Feb 2, 1989
Attention: Alan LaTanner	Lab Number:	901-2220	Reported:	Feb 8, 1989

VOLATILE ORGANICS by GC/MS (EPA 8240)

Analyte	Detection Limit ug/L	Sample Results ug/L
Acetone	10.0	24
Benzene	2.0	3.7
Bromodichloromethane	2.0	N.D.
Bromoform	2.0	N.D.
Bromomethane	2.0	N.D.
2-Butanone	10.0	N.D.
Carbon disulfide	2.0	N.D.
Carbon tetrachloride	2.0	N.D.
Chlorobenzene	2.0	N.D.
Chlorodibromomethane	2.0	N.D.
Chloroethane	2.0	N.D.
2-Chloroethyl vinyl ether	10.0	N.D.
Chloroform	2.0	N.D.
Chloromethane	2.0	N.D.
1,1-Dichloroethane	2.0	N.D.
1,2-Dichloroethane	2.0	N.D.
1,1-Dichloroethene	2.0	N.D.
Total 1,2-Dichloroethene	2.0	N.D.
1,2-Dichloropropane	2.0	N.D.
cis 1,3-Dichloropropene	2.0	N.D.
trans 1,3-Dichloropropene	2.0	N.D.
Ethylbenzene	2.0	N.D.
2-Hexanone	10.0	N.D.
Methylene chloride	2.0	5.4
4-Methyl-2-pentanone	10.0	N.D.
Styrene	2.0	N.D.
1,1,2,2-Tetrachloroethane	2.0	N.D.
Tetrachloroethene	2.0	N.D.
Toluene	2.0	9.6
1,1,1-Trichloroethane	2.0	N.D.
1,1,2-Trichloroethane	2.0	N.D.
Trichloroethene	2.0	N.D.
Trichlorofluoromethane	2.0	N.D.
Vinyl acetate	2.0	N.D.
Vinyl chloride	2.0	N.D.
Total Xylenes	2.0	9.6

Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW5	Received:	Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8240	Analyzed:	Feb 2, 1989
Attention: Alan LaTanner	Lab Number:	901-2221	Reported:	Feb 8, 1989

VOLATILE ORGANICS by GC/MS (EPA 8240)

Analyte	Detection Limit ug/L	Sample Results ug/L
Acetone	10.0	28
Benzene	2.0	N.D.
Bromodichloromethane	2.0	N.D.
Bromoform	2.0	N.D.
Bromomethane	2.0	N.D.
2-Butanone	10.0	N.D.
Carbon disulfide	2.0	N.D.
Carbon tetrachloride	2.0	N.D.
Chlorobenzene	2.0	N.D.
Chlorodibromomethane	2.0	N.D.
Chloroethane	2.0	N.D.
2-Chloroethyl vinyl ether	10.0	N.D.
Chloroform	2.0	N.D.
Chloromethane	2.0	N.D.
1,1-Dichloroethane	2.0	N.D.
1,2-Dichloroethane	2.0	N.D.
1,1-Dichloroethene	2.0	N.D.
Total 1,2-Dichloroethene	2.0	N.D.
1,2-Dichloropropane	2.0	N.D.
cis 1,3-Dichloropropene	2.0	N.D.
trans 1,3-Dichloropropene	2.0	N.D.
Ethylbenzene	2.0	N.D.
2-Hexanone	10.0	N.D.
Methylene chloride	2.0	3.4
4-Methyl-2-pentanone	10.0	N.D.
Styrene	2.0	N.D.
1,1,2,2-Tetrachloroethane	2.0	N.D.
Tetrachloroethene	2.0	N.D.
Toluene	2.0	N.D.
1,1,1-Trichloroethane	2.0	N.D.
1,1,2-Trichloroethane	2.0	N.D.
Trichloroethene	2.0	N.D.
Trichlorofluoromethane	2.0	N.D.
Vinyl acetate	2.0	N.D.
Vinyl chloride	2.0	N.D.
Total Xylenes	2.0	2.3

Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	8810235A	Sampled: Jan 19, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW1	Received: Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2222	Analyzed: Feb 3, 1989
			Reported: Feb 8, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/L	Sample Results ug/L
Acenaphthene	2.0	N.D.
Acenaphthylene	2.0	N.D.
Aniline	2.0	N.D.
Anthracene	2.0	N.D.
Benzidine	50.0	N.D.
Benzoic Acid	10.0	510
Benzo(a)anthracene	2.0	N.D.
Benzo(b)fluoranthene	2.0	N.D.
Benzo(k)fluoranthene	2.0	N.D.
Benzo(g,h,i)perylene	2.0	N.D.
Benzo(a)pyrene	2.0	N.D.
Benzyl alcohol	2.0	6.0
Bis(2-chloroethyoxy)methane	2.0	N.D.
Bis(2-chloroethyl)ether	2.0	N.D.
Bis(2-chloroisopropyl)ether	2.0	N.D.
Bis(2-ethylhexyl)phthalate	10.0	N.D.
4-Bromophenyl ether	2.0	N.D.
Butyl benzyl phthalate	2.0	N.D.
4-Chloroaniline	2.0	N.D.
2-Chloronaphthalene	2.0	N.D.
4-Chloro-3-methylphenol	2.0	N.D.
2-Chlorophenol	2.0	N.D.
4-Chlorophenyl phenyl ether	2.0	N.D.
Chrysene	2.0	N.D.
Dibenz(a,h)anthracene	2.0	N.D.
Dibenzofuran	2.0	N.D.
Di-N-butyl phthalate	10.0	N.D.
1,3-Dichlorobenzene	2.0	N.D.
1,4-Dichlorobenzene	2.0	N.D.
1,2-Dichlorobenzene	2.0	N.D.
3,3-Dichlorobenzidine	10.0	N.D.
2,4-Dichlorophenol	2.0	N.D.
Diethyl phthalate	2.0	N.D.
2,4-Dimethylphenol	2.0	76
Dimethyl phthalate	2.0	N.D.
4,6-Dinitro-2-methylphenol	10.0	N.D.
2,4-Dinitrophenol	10.0	N.D.

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Woodward-Clyde Consultants	Client Project ID:	8810235A	Sampled: Jan 19, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW1	Received: Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2222	Analyzed: Feb 3, 1989
			Reported: Feb 8, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/L	Sample Results ug/L
2,4-Dinitrotoluene	2.0	N.D.
2,6-Dinitrotoluene	2.0	N.D.
Di-N-octyl phthalate	2.0	N.D.
Fluoranthene	2.0	N.D.
Fluorene	2.0	N.D.
Hexachlorobenzene	2.0	N.D.
Hexachlorobutadiene	2.0	N.D.
Hexachlorocyclopentadiene	2.0	N.D.
Hexachloroethane	2.0	N.D.
Indeno(1,2,3-cd)pyrene	2.0	N.D.
Isophorone	2.0	N.D.
2-Methylnaphthalene	2.0	N.D.
2-Methylphenol	2.0	32
4-Methylphenol	2.0	110
Naphthalene	2.0	59
2-Nitroaniline	2.0	N.D.
3-Nitroaniline	2.0	N.D.
4-Nitroaniline	2.0	N.D.
Nitrobenzene	2.0	N.D.
2-Nitrophenol	2.0	N.D.
4-Nitrophenol	10.0	N.D.
N-Nitrosodiphenylamine	2.0	N.D.
N-Nitroso-di-N-propylamine	2.0	N.D.
Pentachlorophenol	10.0	N.D.
Phenathrene	2.0	N.D.
Phenol	2.0	78
Pyrene	2.0	N.D.
1,2,4-Trichlorobenzene	2.0	N.D.
2,4,5-Trichlorophenol	2.0	N.D.
2,4,6-Trichlorophenol	2.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW2	Received:	Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted:	Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2218	Analyzed:	Feb 3, 1989
			Reported:	Feb 8, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/L	Sample Results ug/L
Acenaphthene	2.0	N.D.
Acenaphthylene	2.0	N.D.
Aniline	2.0	N.D.
Anthracene	2.0	N.D.
Benzidine	50.0	N.D.
Benzoic Acid	10.0	N.D.
Benzo(a)anthracene	2.0	N.D.
Benzo(b)fluoranthene	2.0	N.D.
Benzo(k)fluoranthene	2.0	N.D.
Benzo(g,h,i)perylene	2.0	N.D.
Benzo(a)pyrene	2.0	N.D.
Benzyl alcohol	2.0	N.D.
Bis(2-chloroethyoxy)methane	2.0	N.D.
Bis(2-chloroethyl)ether	2.0	N.D.
Bis(2-chloroisopropyl)ether	2.0	N.D.
Bis(2-ethylhexyl)phthalate	10.0	N.D.
4-Bromophenyl ether	2.0	N.D.
Butyl benzyl phthalate	2.0	N.D.
4-Chloroaniline	2.0	N.D.
2-Chloronaphthalene	2.0	N.D.
4-Chloro-3-methylphenol	2.0	N.D.
2-Chlorophenol	2.0	N.D.
4-Chlorophenyl phenyl ether	2.0	N.D.
Chrysene	2.0	N.D.
Dibenz(a,h)anthracene	2.0	N.D.
Dibenzofuran	2.0	N.D.
Di-N-butyl phthalate	10.0	N.D.
1,3-Dichlorobenzene	2.0	N.D.
1,4-Dichlorobenzene	2.0	N.D.
1,2-Dichlorobenzene	2.0	N.D.
3,3-Dichlorobenzidine	10.0	N.D.
2,4-Dichlorophenol	2.0	N.D.
Diethyl phthalate	2.0	N.D.
2,4-Dimethylphenol	2.0	N.D.
Dimethyl phthalate	2.0	N.D.
4,6-Dinitro-2-methylphenol	10.0	N.D.
2,4-Dinitrophenol	10.0	N.D.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW2	Received:	Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted:	Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2218	Analyzed:	Feb 3, 1989
			Reported:	Feb 8, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/L	Sample Results ug/L
2,4-Dinitrotoluene	2.0	N.D.
2,6-Dinitrotoluene	2.0	N.D.
Di-N-octyl phthalate	2.0	N.D.
Fluoranthene	2.0	N.D.
Fluorene	2.0	N.D.
Hexachlorobenzene	2.0	N.D.
Hexachlorobutadiene	2.0	N.D.
Hexachlorocyclopentadiene	2.0	N.D.
Hexachloroethane	2.0	N.D.
Indeno(1,2,3-cd)pyrene	2.0	N.D.
Isophorone	2.0	N.D.
2-Methylnaphthalene	2.0	N.D.
2-Methylphenol	2.0	N.D.
4-Methylphenol	2.0	N.D.
Naphthalene	2.0	N.D.
2-Nitroaniline	2.0	N.D.
3-Nitroaniline	2.0	N.D.
4-Nitroaniline	2.0	N.D.
Nitrobenzene	2.0	N.D.
2-Nitrophenol	2.0	N.D.
4-Nitrophenol	10.0	N.D.
N-Nitrosodiphenylamine	2.0	N.D.
N-Nitroso-di-N-propylamine	2.0	N.D.
Pentachlorophenol	10.0	N.D.
Phenathrene	2.0	N.D.
Phenol	2.0	N.D.
Pyrene	2.0	N.D.
1,2,4-Trichlorobenzene	2.0	N.D.
2,4,5-Trichlorophenol	2.0	N.D.
2,4,6-Trichlorophenol	2.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW3	Received:	Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted:	Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2219	Analyzed:	Feb 3, 1989
			Reported:	Feb 8, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/L	Sample Results ug/L
Acenaphthene	2.0	N.D.
Acenaphthylene	2.0	N.D.
Aniline	2.0	N.D.
Anthracene	2.0	N.D.
Benzidine	50.0	N.D.
Benzoic Acid	10.0	N.D.
Benzo(a)anthracene	2.0	N.D.
Benzo(b)fluoranthene	2.0	N.D.
Benzo(k)fluoranthene	2.0	N.D.
Benzo(g,h,i)perylene	2.0	N.D.
Benzo(a)pyrene	2.0	N.D.
Benzyl alcohol	2.0	N.D.
Bis(2-chloroethyoxy)methane	2.0	N.D.
Bis(2-chloroethyl)ether	2.0	N.D.
Bis(2-chloroisopropyl)ether	2.0	N.D.
Bis(2-ethylhexyl)phthalate	10.0	N.D.
4-Bromophenyl ether	2.0	N.D.
Butyl benzyl phthalate	2.0	N.D.
4-Chloroaniline	2.0	N.D.
2-Chloronaphthalene	2.0	N.D.
4-Chloro-3-methylphenol	2.0	N.D.
2-Chlorophenol	2.0	N.D.
4-Chlorophenyl phenyl ether	2.0	N.D.
Chrysene	2.0	N.D.
Dibenz(a,h)anthracene	2.0	N.D.
Dibenzofuran	2.0	N.D.
Di-N-butyl phthalate	10.0	N.D.
1,3-Dichlorobenzene	2.0	N.D.
1,4-Dichlorobenzene	2.0	N.D.
1,2-Dichlorobenzene	2.0	N.D.
3,3-Dichlorobenzidine	10.0	N.D.
2,4-Dichlorophenol	2.0	N.D.
Diethyl phthalate	2.0	N.D.
2,4-Dimethylphenol	2.0	N.D.
Dimethyl phthalate	2.0	N.D.
4,6-Dinitro-2-methylphenol	10.0	N.D.
2,4-Dinitrophenol	10.0	N.D.

SEQUOIA ANALYTICAL

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW3	Received:	Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted:	Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2219	Analyzed:	Feb 3, 1989
			Reported:	Feb 8, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/L	Sample Results ug/L
2,4-Dinitrotoluene	2.0	N.D.
2,6-Dinitrotoluene	2.0	N.D.
Di-N-octyl phthalate	2.0	N.D.
Fluoranthene	2.0	N.D.
Fluorene	2.0	N.D.
Hexachlorobenzene	2.0	N.D.
Hexachlorobutadiene	2.0	N.D.
Hexachlorocyclopentadiene	2.0	N.D.
Hexachloroethane	2.0	N.D.
Indeno(1,2,3-cd)pyrene	2.0	N.D.
Isophorone	2.0	N.D.
2-Methylnaphthalene	2.0	N.D.
2-Methylphenol	2.0	N.D.
4-Methylphenol	2.0	N.D.
Naphthalene	2.0	N.D.
2-Nitroaniline	2.0	N.D.
3-Nitroaniline	2.0	N.D.
4-Nitroaniline	2.0	N.D.
Nitrobenzene	2.0	N.D.
2-Nitrophenol	2.0	N.D.
4-Nitrophenol	10.0	N.D.
N-Nitrosodiphenylamine	2.0	N.D.
N-Nitroso-di-N-propylamine	2.0	N.D.
Pentachlorophenol	10.0	N.D.
Phenathrene	2.0	N.D.
Phenol	2.0	N.D.
Pyrene	2.0	N.D.
1,2,4-Trichlorobenzene	2.0	N.D.
2,4,5-Trichlorophenol	2.0	N.D.
2,4,6-Trichlorophenol	2.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection.

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Arthur G. Burton
Laboratory Director

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Woodward-Clyde Consultants	Client Project ID:	8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW4	Received: Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2220	Analyzed: Feb 3, 1989
			Reported: Feb 8, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/L	Sample Results ug/L
Acenaphthene	2.0	3.0
Acenaphthylene	2.0	N.D.
Aniline	2.0	N.D.
Anthracene	2.0	N.D.
Benzidine	50.0	N.D.
Benzoic Acid	10.0	N.D.
Benzo(a)anthracene	2.0	N.D.
Benzo(b)fluoranthene	2.0	N.D.
Benzo(k)fluoranthene	2.0	N.D.
Benzo(g,h,i)perylene	2.0	N.D.
Benzo(a)pyrene	2.0	N.D.
Benzyl alcohol	2.0	N.D.
Bis(2-chloroethyoxy)methane	2.0	N.D.
Bis(2-chloroethyl)ether	2.0	N.D.
Bis(2-chloroisopropyl)ether	2.0	N.D.
Bis(2-ethylhexyl)phthalate	10.0	N.D.
4-Bromophenyl ether	2.0	N.D.
Butyl benzyl phthalate	2.0	N.D.
4-Chloroaniline	2.0	N.D.
2-Chloronaphthalene	2.0	N.D.
4-Chloro-3-methylphenol	2.0	N.D.
2-Chlorophenol	2.0	N.D.
4-Chlorophenyl phenyl ether	2.0	N.D.
Chrysene	2.0	N.D.
Dibenz(a,h)anthracene	2.0	N.D.
Dibenzofuran	2.0	N.D.
Di-N-butyl phthalate	10.0	N.D.
1,3-Dichlorobenzene	2.0	N.D.
1,4-Dichlorobenzene	2.0	N.D.
1,2-Dichlorobenzene	2.0	N.D.
3,3-Dichlorobenzidine	10.0	N.D.
2,4-Dichlorophenol	2.0	N.D.
Diethyl phthalate	2.0	3.0
2,4-Dimethylphenol	2.0	N.D.
Dimethyl phthalate	2.0	N.D.
4,6-Dinitro-2-methylphenol	10.0	N.D.
2,4-Dinitrophenol	10.0	N.D.

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Woodward-Clyde Consultants	Client Project ID:	8810235A	Sampled: Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW4	Received: Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted: Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2220	Analyzed: Feb 3, 1989
			Reported: Feb 8, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/L	Sample Results ug/L
2,4-Dinitrotoluene	2.0	N.D.
2,6-Dinitrotoluene	2.0	N.D.
Di-N-octyl phthalate	2.0	N.D.
Fluoranthene	2.0	N.D.
Fluorene	2.0	3.0
Hexachlorobenzene	2.0	N.D.
Hexachlorobutadiene	2.0	N.D.
Hexachlorocyclopentadiene	2.0	N.D.
Hexachloroethane	2.0	N.D.
Indeno(1,2,3-cd)pyrene	2.0	N.D.
Isophorone	2.0	N.D.
2-Methylnaphthalene	2.0	9.0
2-Methylphenol	2.0	N.D.
4-Methylphenol	2.0	N.D.
Naphthalene	2.0	49
2-Nitroaniline	2.0	N.D.
3-Nitroaniline	2.0	N.D.
4-Nitroaniline	2.0	N.D.
Nitrobenzene	2.0	N.D.
2-Nitrophenol	2.0	N.D.
4-Nitrophenol	10.0	N.D.
N-Nitrosodiphenylamine	2.0	N.D.
N-Nitroso-di-N-propylamine	2.0	N.D.
Pentachlorophenol	10.0	N.D.
Phenathrene	2.0	4.0
Phenol	2.0	4.0
Pyrene	2.0	N.D.
1,2,4-Trichlorobenzene	2.0	N.D.
2,4,5-Trichlorophenol	2.0	N.D.
2,4,6-Trichlorophenol	2.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW5	Received:	Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted:	Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2221	Analyzed:	Feb 3, 1989
			Reported:	Feb 8, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/L	Sample Results ug/L
Acenaphthene	2.0	N.D.
Acenaphthylene	2.0	N.D.
Aniline	2.0	N.D.
Anthracene	2.0	N.D.
Benzidine	50.0	N.D.
Benzoic Acid	10.0	N.D.
Benzo(a)anthracene	2.0	N.D.
Benzo(b)fluoranthene	2.0	N.D.
Benzo(k)fluoranthene	2.0	N.D.
Benzo(g,h,i)perylene	2.0	N.D.
Benzo(a)pyrene	2.0	N.D.
Benzyl alcohol	2.0	N.D.
Bis(2-chloroethyoxy)methane	2.0	N.D.
Bis(2-chloroethyl)ether	2.0	N.D.
Bis(2-chloroisopropyl)ether	2.0	N.D.
Bis(2-ethylhexyl)phthalate	10.0	N.D.
4-Bromophenyl ether	2.0	N.D.
Butyl benzyl phthalate	2.0	N.D.
4-Chloroaniline	2.0	N.D.
2-Chloronaphthalene	2.0	N.D.
4-Chloro-3-methylphenol	2.0	N.D.
2-Chlorophenol	2.0	N.D.
4-Chlorophenyl phenyl ether	2.0	N.D.
Chrysene	2.0	N.D.
Dibenz(a,h)anthracene	2.0	N.D.
Dibenzofuran	2.0	N.D.
Di-N-butyl phthalate	10.0	N.D.
1,3-Dichlorobenzene	2.0	N.D.
1,4-Dichlorobenzene	2.0	N.D.
1,2-Dichlorobenzene	2.0	N.D.
3,3-Dichlorobenzidine	10.0	N.D.
2,4-Dichlorophenol	2.0	N.D.
Diethyl phthalate	2.0	N.D.
2,4-Dimethylphenol	2.0	N.D.
Dimethyl phthalate	2.0	N.D.
4,6-Dinitro-2-methylphenol	10.0	N.D.
2,4-Dinitrophenol	10.0	N.D.

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Woodward-Clyde Consultants	Client Project ID:	#8810235A	Sampled:	Jan 18, 1989
500 12th St., Suite 100	Sample Descript:	Water, MW5	Received:	Jan 19, 1989
Oakland, CA 94607-4041	Analysis Method:	EPA 8270	Extracted:	Feb 1, 1989
Attention: Alan LaTanner	Lab Number:	901-2221	Analyzed:	Feb 3, 1989
			Reported:	Feb 8, 1989

SEMI-VOLATILE ORGANICS by GC/MS (EPA 8270)

Analyte	Detection Limit ug/L	Sample Results ug/L
2,4-Dinitrotoluene	2.0	N.D.
2,6-Dinitrotoluene	2.0	N.D.
Di-N-octyl phthalate	2.0	N.D.
Fluoranthene	2.0	N.D.
Fluorene	2.0	N.D.
Hexachlorobenzene	2.0	N.D.
Hexachlorobutadiene	2.0	N.D.
Hexachlorocyclopentadiene	2.0	N.D.
Hexachloroethane	2.0	N.D.
Indeno(1,2,3-cd)pyrene	2.0	N.D.
Isophorone	2.0	N.D.
2-Methylnaphthalene	2.0	N.D.
2-Methylphenol	2.0	N.D.
4-Methylphenol	2.0	N.D.
Naphthalene	2.0	N.D.
2-Nitroaniline	2.0	N.D.
3-Nitroaniline	2.0	N.D.
4-Nitroaniline	2.0	N.D.
Nitrobenzene	2.0	N.D.
2-Nitrophenol	2.0	N.D.
4-Nitrophenol	10.0	N.D.
N-Nitrosodiphenylamine	2.0	N.D.
N-Nitroso-di-N-propylamine	2.0	N.D.
Pentachlorophenol	10.0	N.D.
Phenathrene	2.0	N.D.
Phenol	2.0	N.D.
Pyrene	2.0	N.D.
1,2,4-Trichlorobenzene	2.0	N.D.
2,4,5-Trichlorophenol	2.0	N.D.
2,4,6-Trichlorophenol	2.0	N.D.

Analytes reported as N.D. were not present above the stated limit of detection.

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