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REPORT REQUESTING CERTIFICATION OF COMPLETION OF UPLAND CAP INSTALLATION FORMER UNITED HECKATHORN FACILITY RICHMOND, CALIFORNIA

SEPTEMBER 16, 1999

Prepared for:

Levin-Richmond Terminal Corporation
402 Wright Avenue, Richmond, California 94804

Prepared by:

PES Environmental, Inc.
Engineering & Environmental Services

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Engineering & Environmental Services

A Report Prepared for:

Levin-Richmond Terminal Corporation
402 Wright Avenue
Richmond, California 94804

REPORT REQUESTING CERTIFICATION OF COMPLETION OF UPLAND CAP INSTALLATION FORMER UNITED HECKATHORN FACILITY RICHMOND, CALIFORNIA

SEPTEMBER 16, 1999

By:

William W. Mast, R.G.
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PES Environmental, Inc.
Engineering & Environmental Services

September 16, 1999

486.0103.021

United States Environmental Protection Agency
MS SFD-7-3
75 Hawthorne Street, 9th Floor
San Francisco, California 94105

Attention: Mr. Dick Vesperman

TRANSMITTAL
REPORT REQUESTING CERTIFICATION OF
COMPLETION OF UPLAND CAP INSTALLATION
FORMER UNITED HECKATHORN FACILITY
RICHMOND, CALIFORNIA

Dear Mr. Vesperman:

Enclosed please find the *Report Requesting Certification Of Completion Of Upland Cap Installation, Former United Heckathorn Facility, Richmond, California*, dated September 16, 1999. PES Environmental, Inc. has prepared this report on behalf of Levin Richmond Terminal Corporation (LRTC) to document that the remedial action has been completed in full satisfaction of the requirements of the U.S. Environmental Protection Agency Consent Decree, dated April 22, 1996. As required by the Consent Decree, this report contains a summary of the field activities performed during construction of the cap, including as-built drawings of the cap and drainage system.

We trust that this is the information that you require at this time. If you have any questions or require additional information, please call.

Yours very truly,

PES ENVIRONMENTAL, INC.

William W. Mast, R.G.
Associate Engineer

William F. Frizzell, P.E.
Principal Engineer

Attachment

cc: Mike McCoy - LRTC
Robert Feather - Department of Toxic Substances Control
Keith Howard, Esq. - Cooper, White & Cooper

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1.0 INTRODUCTION

This report has been prepared by PES Environmental, Inc. (PES) on behalf of Levin-Richmond Terminal Corporation (LRTC) to document the completion of installation of the upland cap at the United Heckathorn NPL Site (Site), located at 402 Wright Avenue, Richmond, California (Plate 1). This document has been prepared to comply with the U.S. Environmental Protection Agency (EPA) Consent Decree (CD), dated April 22, 1996, and the Statement of Work (SOW), dated September 28, 1995. The overall project approach and scope of the cap installation activities generally followed the strategy presented in the following PES documents:

- Final Remedial Design Work Plan, Upland Cap Remedial Design and Remedial Action, Former United Heckathorn Facility, Richmond, California, dated September 24, 1997;
- Preliminary Design Submittal, Upland Cap, Former United Heckathorn Facility, Richmond, California, dated October 3, 1997; and
- Project Update Documentation, Former United Heckathorn Facility, Richmond, California, dated June 30, 1998.

This report presents a brief overview of the site background, a description of the cap and surface drainage features as-constructed, and modifications to the work plan as necessary to meet site conditions.

2.0 BACKGROUND INFORMATION

2.1 Site Description

The United Heckathorn Site is located on the northern 4.5 acres of LRTC's 12-acre property at 402 Wright Avenue, in Richmond, California. The Site is bounded by Cutting Boulevard on the north, South 4th Street on the east, the southern portion of LRTC on the south, and the Lauritzen Channel on the west. To the east across Wright Avenue, is SimsMetal America (metal recycling). Time Oil is located on the southerly portion of LRTC's eastern property boundary.

Prior to capping activities, the upland area of the Site was relatively level, with surface elevations ranging from approximately 7 to 11 feet Mean Sea Level (MSL). Much of the ground surface was covered with asphalt paving, gravel, or soil. In some areas, building slabs and foundations of some of the former United Heckathorn buildings extended above the ground surface.

Several sets of railroad tracks and a train scale are present at the Site. The tracks enter at the northeast corner of the Site and branch out just north of the train scale. The eastern branch further splits into one line that runs offsite to cross South 4th Street and two lines that run along the eastern property line to a railroad hopper building. The western branch of tracks runs adjacent to the top of the embankment for approximately 150 feet, then is supported on piles over the remainder of the shoreline.

The embankment of the Lauritzen Channel, along the west boundary of the Site consists primarily of rubble and sandy gravel fill over Bay Mud in the northern portion of the site. The embankment slope is generally 1:1 or steeper. The central and southern portions of the embankment have been reinforced with steel and/or timber retaining walls.

2.2 Site History

The site was initially developed by dredging and filling operations prior to 1927. During World War II, ship building operations occupied much of the site and surrounding properties. Following the war, the shipyard and supporting structures were demolished. From about 1947 to 1966, the Site was used by several operators, among them United Heckathorn, to formulate and package pesticides. Historical documents indicate that 95% of United Heckathorn's operations entailed processing DDT. Pesticide processing ended in approximately 1966 and between that time and 1970, the buildings at the site were demolished and cleared from the site. In the 1970s, the site was apparently used primarily for bulk materials storage and handling. In 1981, Levin Metals Corporation purchased the property and has been operating the site as Levin Richmond Terminal Corporation since that time as a bulk shipping facility.

In 1980, the United Heckathorn site was inspected by the California Department of Health Services. Soil samples collected during the inspection were found to contain chlorinated pesticides and metals, leading to designation of site as a State Superfund site in March 1982. The site was placed on the CERCLA National Priorities List (NPL) in March 1990 by the EPA, which took over as lead agency in August 1990.

Between 1982 and 1993, several interim response actions were conducted to remove contaminated soil, asphalt, and concrete in the upland and embankment areas of the site. These actions resulted in the excavation and disposal offsite of over 3,100 cubic yards of pesticide-affected soil. During late 1996 and early 1997, remediation of the sediments within the Lauritzen Channel was performed by dredging to remove affected sediments. The south portion of the former United Heckathorn facility was used during this time as a staging area for handling, drying and processing dredge sediments as part of the Lauritzen Channel remediation.

LRTC currently operates the site as a shipping terminal. The primary activities includes transferring bulk materials such as mineral ores and metallurgical coke from ships to short-term storage stockpiles, which are in turn transferred to railcars for shipment offsite. Also,

scrap metal is loaded from trucks onto ships for transport overseas. Heavy equipment (e.g., front-end loaders and conveyors) is widely used at the site in day to day operations.

Stockpiling of bulk products such as bauxite and metallurgical coke, to heights of 30 feet, is routine at the site.

2.3 Site Lithology

Previous investigations at the Site indicated that sandy gravel fill material extends to a depth of approximately 8 feet (Levine-Fricke, 1990). The fill contains occasional concrete blocks and wood timbers. Underlying the fill is a soft to medium stiff clay to silty clay identified as Bay Mud. Discontinuous silty sand lenses and peat beds were observed at various depths across the site. Groundwater was generally encountered at depths of 6 to 9 feet.

2.4 Distribution of Pesticides in Upland Soil

The primary contaminants of concern in the upland area are DDT and dieldrin. These, and other pesticides, were typically found in shallow soil composed of fill material and were rarely found at elevated concentrations beneath the fill/Bay Mud interface. Removal actions performed between 1990 and 1993 have resulted in the excavation and offsite disposal of more than 3,100 cubic yards of pesticide-affected upland soil. DDT and dieldrin remain in localized areas of upland soil at mean concentrations of 64 and 5.7 milligrams per kilogram (mg/kg), respectively (EPA, 1995). As discussed below, these soils have been capped as part of the final remedy.

3.0 SUMMARY OF UPLAND CAPPING PROGRAM

As outlined in the Record of Decision (ROD; EPA, 1994), the selected remedy for the upland area of the site was capping. Capping will reduce the potential for future pesticide contamination in the marine environment by containing contaminated soil and preventing erosion. The former United Heckathorn facility boundary is shown on Plate 2.

Installation of the cap consisted of addressing three specific areas: (1) site grading to promote surface runoff to collection points; (2) installation of a drainage system to collect surface runoff, including best management practices for storm water pollution prevention, followed by discharge of off to the Lauritzen Channel; and (3) construction of a reinforced concrete cap or gravel cap. The specific tasks performed as part of the upland capping program, as well as the technical approach, are described below.

3.1 Contractor Health and Safety

LRTC retained DECON Environmental, Inc. (DECON) of Hayward, California as the remediation earthwork contractor and R. Bernt & Sons of Woodacre, California as the concrete contractor. Additional concrete construction services for Interceptor 5 and the locomotive inspection pit were provided by PRIMECON of Pacheco, California. On behalf of LRTC, PES prepared a health and safety plan (HASP) that addressed hazard identification and mitigation, safe work practices, and emergency response procedures for the remediation project (PES, 1998a). EPA reviewed and provided verbal approval of the HASP on July 2, 1998.

3.2 Construction and Sampling Activities

Construction activities associated with installation of the upland cap were performed between July 1998 and July 1999. Daily progress reports are presented in Appendix A. These activities consisted of:

- Site preparation including removal of vegetation, debris, and asphaltic concrete and reinforced concrete from areas shown on the design drawings (PES, 1998b);
- Grading of the site to achieve design surface elevations, and placement and compaction of excess soil at the north end of the facility;
- Air monitoring to evaluate potential airborne dust containing pesticides;
- Installation of drop inlets, piping, storm drain interceptors (settling basins), and outfalls to the Lauritzen Channel;
- Construction of a locomotive inspection pit;
- Excavation of an underground storage tank (UST) discovered during grading, over excavation of adjacent soil, and backfilling the UST excavation;
- Off-site management of soil and debris from the tank excavation and other selected areas that could not be relocated on site;
- Discharge of groundwater to the sanitary sewer from dewatering associated with excavations during the project; and
- Construction of the reinforced concrete cap (in areas to be used for material stockpiling by LRTC) and geotextile fabric and gravel cap (in low traffic areas).

3.2.1 Site Preparation

DECON removed asphaltic concrete and reinforced concrete from various areas prior to grading the site. Excavated material was stockpiled and grab samples collected for analysis of pesticides using EPA Test Method 8080. One composite sample (615AS1) was analyzed by the project laboratory (Table 1). No pesticides were detected at or above the laboratory reporting limit and the stockpile was transported offsite for recycling at Specialty Crushing in Emeryville, California. The analytical laboratory report and chain-of-custody record are presented in Appendix B.

3.2.2 Grading & Soil Placement

The primary control on the grading design was the requirement to maintain existing rail lines at their current elevations. The long narrow shape of the property, the relatively flat topography of the site, and the need to maintain working surfaces to a maximum grade of less than 5 percent also placed limitations on the grading design of the site. The primary objectives of the grading design were to: (1) minimize/eliminate overland flow to the Lauritzen Channel; (2) maintain existing rail line elevations; and (3) maintain workable surfaces for LRTC operations.

Prior to capping the site, grading was performed to promote drainage to surface swales and catch basins. Grading activities initially began at the north end of the site to prepare the soil placement area (see below). To allow installation of the cap (see Section 3.2.7) to proceed simultaneously, grading and surface preparation work then proceeded from the south end of the former United Heckathorn facility to the north.

Grading of near surface soil consisted of an onsite mass balance of soil to minimize the need for offsite disposal. Using a target threshold concentration of 100 mg/kg on-site relocation of acceptable excess soil was spread at the north end of the facility in 6-inch lifts and compacted using a bulldozer and sheepsfoot roller compactor. Field density testing on representative lifts of soil was performed by a PES field geologist using ASTM Method D 1557-91. Testing locations and results are presented in Appendix C. The results of the density testing confirmed that the soil met the relative compaction requirement (90 percent of the maximum dry density) specified in the technical specifications (PES, 1998b). Maximum elevation of the rough grade of the soil placement area was approximately 14.0 feet MSL.

On the basis of visual observations during grading activities, soil that potentially contained elevated residual pesticide concentrations was segregated into stockpiles and covered. PES collected grab samples of these stockpiles for laboratory compositing and analysis of pesticides using EPA Test Method 8080. Samples were analyzed at K-Prime of Santa Rosa, California. The laboratory is California-certified for the analyses performed. Results are summarized in Table 1; laboratory analytical reports and chain-of-custody forms are presented in Appendix B. Stockpiles with total pesticides concentrations less than 100 mg/kg were incorporated into the onsite filling program. Stockpiles with concentrations exceeding

100 mg/kg were placed in rail cars for off site disposal at East Carbon Development Corporation (ECDC) site, located in East Carbon, Utah. Disposal manifests are presented in Appendix D.

3.2.3 Air Monitoring

Air monitoring was conducted at the site during all grading and excavation activities. The purpose of the monitoring was to verify the absence of airborne pesticide exposure for onsite construction workers, and nearby offsite residents and workers. Both personal and area samples were collected to evaluate levels of airborne pesticides. Personal samples were obtained by placing the sampling equipment on or near the excavation equipment. Area samples were collected at downwind locations. Wind direction was determined using a temporary meteorological station provided by K-Prime; the station operated during this phase of field activities.

Samples were collected by a PES field engineer or geologist. An "Escort" low volume air pump manufactured by MSA with an adsorbent cartridge was used for the air monitoring. Air was pumped through the cartridge at 2 to 3 liters per minute for 8 hours each day. At the end of each day, the cartridge was disconnected, placed in a zip-lock plastic bag, labeled, and transported to the project laboratory following chain-of-custody protocol.

The cartridges were analyzed at K-Prime of Santa Rosa, California. The laboratory is California-certified for the analyses performed. Seventy samples were analyzed for pesticides in air using EPA Test Method 8080. The results of the analyses showed that the cartridges did not contain pesticide-bearing particulates at concentrations at or above the laboratory reporting limit (Table 2). Copies of the laboratory reports and chain-of-custody records are included in Appendix E. The laboratory reporting limits were below the respective Threshold Limit Value - Time Weighted Averages (TLV-TWA) established by American Conference of Government Industrial Hygienists (ACGIH) for DDT (1.0 milligrams per cubic meter [mg/m^3]) and dieldrin (0.25 mg/m^3).

3.2.4 Storm Drain System

An improved drainage system was constructed to collect runoff from the capped surface and minimize ponding and flooding. Because of the relatively flat topography and the relatively long and narrow shape of the site, five primary drainage areas were developed across the former United Heckathorn site. Twenty-eight new drop inlets (catch basins) were installed to collect surface runoff (Plate 3). The drop inlets are connected to piping which transmits the runoff to sediment interceptors. One interceptor was installed for each of the five drainage areas. The interceptors are designed to allow a residence time of 5 minutes during the 24-hour 10-year design storm event. This residence time is used as a design standard for storm water pollution prevention measures. In addition, LRTC employs other sediment control measures such as sweeping of the surface and filtration around drop inlets to minimizing off-site runoff of sediments from the site. The new drainage system has been incorporated into LRTC's

Storm Water Pollution Prevention Plan and Storm Water Monitoring Plan, as required under the State of California General Permit for industrial sites.

Piping and Drop Inlet Installation

Soil excavated from the piping alignments and drop inlet locations was placed at the north end of the facility, as described above in Section 3.2.2. Piping consisted of corrugated, high density polyethylene (HDPE) pipe ranging in size from 12- to 18-inch diameter. Pre-cast drop inlets were acquired from Santa Rosa Cast Products Company of Santa Rosa, California, with dimensions based on preliminary project grades and elevations (PES, 1997b). Covers on the drop inlets are cast iron, traffic rated grates.

Prior to pipe and drop inlet installation, rough grade elevations of the excavation bottom were field verified by DECON. Bedding material consisting of a 6-inch layer of pea gravel was placed in the excavation bottom. Drop inlets and pipe were then installed at the locations shown on Plate 3. A minimum 6-inch layer of gravel was placed on the sides and top of the pipe. Pipe and drop inlets were then backfilled with a 2-sack sand-cement slurry to the rough grade elevation.

Interceptor Fabrication and Installation

The locations of Interceptors 1 through 5 are shown on Plate 3. R. Bernt & Sons constructed Interceptors 1 through 4 at LRTC's Parr Canal materials storage area, approximately 750 feet east of the former United Heckathorn facility. The interceptors were composed of 7-sack minimum concrete, with steel reinforcement in accordance with the design plans. R. Bernt & Sons and PES collected concrete samples to verify that the 28-day compressive strength met the design criteria of 4,000 pound per square inch (psi). Concrete samples were submitted to Kleinfelder of Santa Rosa, California for testing using ASTM C39. The average 28-day compressive strength for the interceptor concrete was 6,460 psi. Results are summarized in Table 3 and lab reports are presented in Appendix F.

Soil excavated for Interceptors 1, 3, and 4 was placed at the north end of the facility, as described above in Section 3.2.2. At Interceptor 2, potential pesticide material was observed in the sidewall of the excavation. Grab samples collected in this area in May and August 1998 confirmed the presence of pesticides (Table 4). As a result, additional excavation was performed. Plastic sheeting was placed both beneath and on top of stockpiles pending chemical characterization. Based on concurrence with the EPA, over excavation was terminated based on visual inspection and all excavated areas were backfilled with a 2-sack cement slurry when the interceptor was installed.

Because of the proximity to the Lauritzen Channel, the excavation for Interceptor 2 flooded with water repeatedly as a result of high tidal stages. Approximately 1,300 gallons of water were pumped from the excavation over several days into portable tanks at the site. Water samples from the portable tanks were analyzed for pesticides using EPA Test Method 8080, total petroleum

hydrocarbons quantified as diesel using EPA Test Method 8015 modified, and CAM 17 metals. Results are summarized in Table 5; laboratory reports and chain-of-custody forms are presented in Appendix G. On the basis of the analytical results, LRTC applied to the City of Richmond for approval to dispose of the water to the City's sanitary sewer system. A copy of the Waste Water Permit Application submitted to the City is presented in Appendix H. The City verbally approved the application and the water was discharged to the sewer in February 1999.

Prior to installing the interceptors, a bed of pea gravel, followed by 2-sack sand-cement slurry, was placed on the excavation bottom to attain finished rough grade. Interceptors 1 through 4 were transported from the Parr Canal site to the former United Heckathorn facility and installed in the prepared excavations on August 20, 1998, using a 125-ton crane provided by Reliable Crane & Rigging of Petaluma, California. The HDPE piping was installed and the space surrounding the interceptors and piping backfilled with a 2-sack sand-cement slurry.

Interceptor 5 is located outside of the former United Heckathorn facility limits. R. Bernt & Sons initially constructed Interceptor 5 and associated piping prior to the rainy season in October 1997. However, due to concerns with the piping alignment and design details as-constructed, this interceptor was abandoned in place, piping was removed, and a new Interceptor 5 and associated piping was constructed in the location shown on Plate 3.

Because of the significantly larger size, PRIME CON constructed Interceptor 5 in place in June and July 1999. Specifications for Interceptor 5 were presented in an addendum to the project technical specifications (ANWest, 1999). To alleviate potential issues regarding perched water in the vicinity of Interceptor 5, sheet piles were driven to approximately 12 feet below ground surface (bgs) to surround the excavation area. The soil inside the sheet pile wall was then excavated, no dewatering of the excavation was required. No visual evidence of pesticides or other contaminants was observed during excavation and the soil was disposed offsite at Redwood Landfill in Novato, California. Following completion of Interceptor 5 construction, the sheet piles were removed and the space surrounding the interceptor and piping was backfilled with a 2-sack sand-cement slurry.

Because of the low elevation (2.99 feet MSL) of the invert of the outfall pipe from Interceptor 4, a Tide-Flex check valve was installed on this outfall pipe to prevent tidal inflow. Outfalls from Interceptors 1, 2, 3, and 5 are anticipated to be submerged only infrequently and consequently do not require check valves.

3.2.5 Locomotive Inspection Pit

A locomotive inspection pit, not initially included in the design plans, was constructed in the north central portion of the site, to replace the historical inspection area near the west edge of the site (Plate 3). Excavated soil from the pit excavation was placed at the north end of the site. PRIMECON fabricated the pit according to the AN West's design specifications (PES, 1998b). Similar to Interceptor 5, the inspection pit was constructed in place using reinforced concrete on a bed of 2-sack sand-cement slurry.

The inspection pit has removable cover plates to minimize accumulation of rain and prevent accidental falls when not in use. Although the inspection pit is not tied into the storm drain system, a small sump in the center of the floor will facilitate removal of rainwater and other liquids that may accumulate. LRTC will transfer such liquids into storage containers, process the liquids using an oil separator (located at the central maintenance shop), and dispose of the liquids according to previously approved disposal requirements.

3.2.6 Underground Storage Tank Removal

During grading activities, a 1,100-gallon underground storage tank (UST) was encountered on August 26, 1998, in the central portion of the former United Heckathorn facility, adjacent to the intersection of two sets of railroad tracks (Plate 3). The top of the UST was located approximately 4 feet bgs and was surrounded by a sand backfill. The tank contained approximately 110 gallons of dark liquid that appeared to be a petroleum hydrocarbon.

One sample of the liquid (UST-1) was collected using a new, disposable plastic bailer. Sample containers were labeled and immediately placed in a chilled, thermally insulated cooler for delivery under chain-of-custody protocol to the K-Prime, Inc. (K-Prime), a State-certified laboratory located in Santa Rosa, California. K-Prime analyzed the samples for volatile organic compounds (VOCs) using EPA Test Method 8260, for pesticides using EPA Test Method 8080, and for total petroleum hydrocarbons quantified as gasoline and diesel using EPA Test Method 8015 modified. Due to the presence of both liquid and sludge phases in the sample bottles, the liquid and sludge phases were analyzed separately. Analytical results of the UST sample are summarized in Table 4; laboratory reports and chain-of-custody forms are presented in Appendix I.

The City of Richmond Fire Department (RFD) and the Contra Costa County Environmental Health Division (CCCEHD) were notified of the UST on August 27, 1998. At the time of notification, permit applications for removal of the UST were filed with both agencies.

On August 28, 1998, the tank contents were vacuumed out by DECON and contained in two 55-gallon steel drums at the site. A Uniform Hazardous Waste Manifest for liquid and sludge removed from the tank is included in Appendix D. The interior of the tank was then triple rinsed with a hot pressure wash to remove residual liquid. Liquid generated during tank rinsing was also vacuumed out and contained in a 1,000-gallon temporary storage tank at the site. In accordance with RFD requirements, approximately 100 pounds of dry ice was placed into the UST to reduce the concentration of potentially explosive gases to below five percent of the lower explosive limit (LEL) before the UST was accessed. The UST atmosphere was sampled with a combustible gas detector to confirm that the tank atmosphere was below 5 percent of the LEL. These operations were performed under the supervision of PES with oversight provided by a RFD inspector. Additionally, representatives of CCCEHD and EPA were present.

Following confirmation that the UST atmosphere was below 5 percent of the LEL, and with RFD approval, over burden and backfill material surrounding the UST were excavated using a Case

580B-SL Backhoe. Soil encountered below approximately the midline of the UST appeared to be affected by previous releases of the UST contents.

Excavation spoils that appeared to be affected with petroleum hydrocarbons were segregated and placed on plastic sheeting pending analytical characterization. The UST was removed from the excavation by DECON using a backhoe. Inspection of the UST following removal revealed numerous small holes up to 2-millimeter diameter. The UST was placed on a flat bed truck and transported under Uniform Hazardous Waste Manifest by Erickson, Inc. to their Richmond facility. A copy of the Uniform Hazardous Waste Manifest is included in Appendix D.

At the request of the CCCEHD, two soil samples were collected from the bottom of the former UST excavation at a depth of approximately 8 feet bgs (approximately two feet below the bottom of the UST). The samples were collected in 2-inch diameter 6-inch long stainless steel sample tubes. After sample collection, the tubes were immediately covered with Teflon-lined end caps and sealed with silicon tape. The soil samples were labeled and placed in a chilled, thermally insulated cooler for delivery under chain-of-custody protocol to K-Prime. Prior to chemical analysis, the two samples were combined into a single composite sample (UST-E/UST-W). The composite sample was analyzed for VOCs using EPA Test Method 8260, for pesticides using EPA Test Method 8080, and for total petroleum hydrocarbons quantified as gasoline using EPA Test Method 8015 modified. Analytical results of the bottom excavation samples are summarized in Table 4; laboratory reports and chain-of-custody forms are presented in Appendix I.

Following removal of the UST, the former tank location was over excavated to remove all visibly affected soil. Approximately 250 cubic yards of soil were excavated from the vicinity of the former UST and stockpiled. Plastic sheeting was placed both beneath and on top of stockpiles pending chemical characterization. Based on concurrence with the EPA, over excavation in the vicinity of the former UST was terminated based on visual inspection and all excavated areas were backfilled with a 2-sack cement slurry.

Six soil and debris samples were collected from the stockpiled soil generated during over excavation of the former UST location. The samples were collected in 2-inch diameter by 6-inch long stainless steel sample tubes, covered with Teflon-lined end caps and sealed with silicon tape. The soil samples were labeled and immediately placed in a chilled, thermally insulated cooler for delivery under chain-of-custody protocol to K-Prime. Prior to chemical analysis, three subsets of the six soil samples were combined into three composite samples (STP-1A/B comp, STP-1C/D comp, and STP-2A/B comp). The composite samples were each analyzed using EPA Test Method 8260 for VOCs, EPA Test Method 8080 for pesticides, EPA Test Method 8015 modified for total petroleum hydrocarbons quantified as gasoline and diesel and EPA Test Method 7000 Series for lead. Analytical results of the stockpile samples are summarized in Table 4; laboratory reports and chain-of-custody forms are presented in Appendix I. Based on the analytical results, the soil was transported off site in rail cars to ECDC for disposal.

3.2.7 Capping Activities

As described above, installation of the cap followed completion of grading, and generally proceeded from the south end of the facility to the north end. Details of the cap installation are provided below.

Concrete Cap

Reinforced concrete was used to cap the site in high-traffic and materials stockpiling areas (Plate 3). R. Bernt & Sons constructed the concrete cap between July and December 1998 according to the design specifications (PES, 1998b). The cap was composed of 7-sack minimum concrete with steel wire reinforcement overlying a prepared and compacted subgrade. The thickness of the concrete ranged from 6 to 14 inches. In some areas, the concrete overlies asphaltic concrete pavement or concrete building foundations. The reinforcing steel in the concrete consists of a double layer of 6-inch by 6-inch W4.5XW4.5 steel welded wire fabric (WWF) over the asphalt pavement and a double layer of 4-inch by 4-inch W4.5XW4.5 WWF over portions of the site that were not previously paved. The welded wire fabric was supported above the rough grade and overlapped for splicing during successive days of concrete pouring.

The surface was sloped uniformly to drain surface runoff. Over a portion of the cap, the surface slopes toward the center of the cap. Surface water in these areas is captured in shallow swales that direct the water to drop inlets. Over the rest of the cap, the surface slopes toward the outside edge of the cap. In these areas, a 7- to 12-inch high concrete curb was added at the edge of the concrete slab to ensure that surface runoff remains on the concrete slab and enters drop inlets around the perimeter of the cap.

To verify that the concrete 28-day compressive strength met the design criteria of 4,000 psi, R. Bernt & Sons and PES collected concrete samples at an average of one sample per 100 cubic yards of concrete. Concrete samples were submitted to Kleinfelder of Santa Rosa, California for testing using ASTM C39. The average 28-day compressive strength for the concrete was 5,330 psi. Results are summarized in Table 6 and lab reports are presented in Appendix J.

Gravel Cap

A gravel and geotextile fabric cap was used in low traffic areas (Plate 3). A geotextile fabric was placed on a prepared subgrade of soil and was covered with a minimum of 6 inches of imported clean gravel.

DECON installed this type of cap along the northern margin of the Lauritzen Channel. Additionally, the gravel cap was placed as part of the track ballast along many of the segments of rail lines at the facility.

4.0 CONCLUSIONS

Installation of the upland capping system at the former United Heckathorn facility was conducted between July 1998 and July 1999. The field activities were performed and the cap installed in general accordance with the final remedial design work plan, the preliminary design submittal, and the updated technical specifications prepared for the project (PES, 1997a,b, 1998a,b; ANWest 1999).

During the cap installation, selected soil that was determined to be unsuitable for on-site relocation were properly characterized, manifested, and removed for off-site disposal. A formerly unknown UST was encountered and satisfactorily excavated, along with affected soil, under the oversight of EPA, RFD, and the CCCEHD. Air monitoring during the project documented that there were no detectable releases of pesticides from the facility and no measurable exposure to on site workers.

The concrete and gravel cap system was successfully constructed to reduce the potential for release of pesticide-affected soil from the site. Any modifications from the initially approved plans and specifications were implemented to meet field conditions and/or LRTC's operational needs and do not compromise the ability of the constructed final remedy to prevent erosion of residual pesticides from the site. All modifications were discussed with and approved by EPA prior to implementation. Long-term monitoring and maintenance of the cap and drainage system will be performed in accordance with the *Revised Draft Operations and Maintenance Plan, Upland Capping System, Former United Heckathorn Site, Richmond, California* dated March 9, 1999.

5.0 CERTIFICATION OF COMPLETION

To the best of my knowledge, after thorough investigation, I certify that the information contained in or accompanying this submission is true, accurate and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Levin Richmond Terminal Inc.

Mike May - Project Coordinator
Name/Title

9/16/99
Date

6.0 REFERENCES

ANWest, 1999. *Technical Specifications for Levin Richmond Terminal Corporation, Area E, Interceptor No. 5*. March.

PES Environmental, Inc. (PES), 1997a. *Final Remedial Design Work Plan, Upland Cap Remedial Design and Remedial Action, Former United Heckathorn Facility, Richmond, California*. September 24.

_____, 1997b. *Preliminary Design Submittal, Upland Cap, Revised Former United Heckathorn Facility, Richmond, California*. October 3.

_____, 1998a. *Health and Safety Plan, Upland Cap Remediation Project, Former Unite Heckathorn Facility, Richmond, California*. May 29.

_____, 1998b. *Project Update Documentation, Former United Heckathorn Facility, Richmond, California*. June 30.

TABLES

Table 1. Summary of Analytical Results for Stockpiled Material*
Upland Capping Project
Former United Heckathorn Facility
Richmond, California

Sample Number	Date Sampled	Sample Description	4,4'-DDE (mg/kg)	4,4'-DDD (mg/kg)	4,4'-DDT (mg/kg)	Dieldrin (mg/kg)	Endrin (mg/kg)
Soil Stockpiles							
GS-7 (Composite)	6/25/98	Stockpile from Initial Area C Excavation	8.35	<2	84.5	5.72	20.7
SPB-1,2 (Composite)	11/13/98	Older Area B Stockpile	<50	216	537	<50	<50
SPC-1,2 (Composite)	11/13/98	Older Area C Stockpile	<5	14.4	23	<5	<5
SPD-1,2 (Composite)	11/13/98	Older Area D Stockpile	<25	43.1	77.4	<25	<25
B1, B2, B3, B4 (Composite)	1/15/99	Newer Area B Stockpile	2.27	6.19	7.5	<2	<2
C1, C2, C3, C4 (Composite)	1/15/99	Newer Area C Stockpile	6.79	19.3	24.3	<5	<5
Asphalt Stockpile							
615AS1	6/15/98	Asphalt stockpile in Area A	<0.5	<0.5	<0.5	<0.5	<0.5

Notes:
* = All stockpiled material will have been disposed offsite by completion of project.
mg/kg = Milligrams per kilogram.
<50 = Not detected at or above the laboratory reporting limit indicated.
Samples analyzed using EPA Test Method 8080; all other method analytes not detected at or above laboratory reporting limits.

Table 2. Summary of Analytical Results for Air Monitoring
Upland Capping Project
Former United Heckathorn Facility
Richmond, California

Date Sampled	Sample Number	Result	Sample Number	Result	Sample Number	Result	Sample Number	Result
5/18/98	3755-518	ND	10716-518	ND	3740-518	ND	3756-518	ND
5/21/98	10991-521	ND	3740-521	ND	3756-521	ND	--	--
7/9/98	10994-79	ND	3775-79	ND	10991-79	ND	--	--
7/15/98	10994-715	ND	3775-715	ND	10991-715	ND	--	--
7/16/98	10994-716	ND	10991-716	ND	--	--	--	--
7/17/98	10715-717	ND	10994-717	ND	10991-717	ND	--	--
7/20/98	10991-720	ND	10715-720	ND	10994-720	ND	--	--
7/21/98	10715-721	ND	10994-721	ND	--	--	--	--
7/24/98	10991-724	ND	10994-724	ND	10715-724	ND	--	--
7/27/98	10994-727	ND	10715-727	ND	10991-727	ND	--	--
7/29/98	10715-729	ND	10991-729	ND	10994-729	ND	--	--
7/31/98	10715-731	ND	10991-731	ND	--	--	--	--
8/3/98	10715-83	ND	10994-83	ND	--	--	--	--
8/4/98	10994-84	ND	10991-84	ND	--	--	--	--
8/5/98	10715-85	ND	10991-85	ND	--	--	--	--
8/6/98	10994-86	ND	10715-86	ND	10991-86	ND	--	--
8/7/98	10991-87	ND	10994-87	ND	10715-87	ND	--	--
8/12/98	10715-812	ND	10991-812	ND	--	--	--	--
8/13/98	10715-813	ND	10994-813	ND	--	--	--	--
8/25/98	10991-825	ND	10994-825	ND	--	--	--	--
8/28/98	10991-828	ND	10994-828	ND	--	--	--	--
8/31/98	10991-831	ND	10994-831	ND	--	--	--	--
9/1/98	10991-91	ND	10994-91	ND	--	--	--	--
9/2/98	10991-92	ND	10994-92	ND	--	--	--	--
9/3/98	10991-93	ND	10994-93	ND	--	--	--	--
9/8/98	10991-98	ND	10994-98	ND	--	--	--	--
9/11/98	10991-911	ND	10994-911	ND	--	--	--	--
9/14/98	10991-914	ND	10994-914	ND	--	--	--	--
9/15/98	10991-915	ND	10994-915	ND	--	--	--	--

Notes:
ND = Not detected at or above the laboratory reporting limit. Reporting limit varies; see analytical laboratory report for details.
-- = Not sampled.

Table 3. Summary of Concrete Compressive Strength Results
For Storm Drain Interceptors
Upland Capping Project
Former United Heckathorn Facility
Richmond, California

Structure	Date Sampled	Kleinfelder Rpt. #	Sample Number	Age (days)	Compressive Strength (psi)
Interceptor A	6/19/98	2	2713	28-Day Average	6930
	6/19/98	3	2714	28-Day Average	6270
Interceptor B	6/25/98	4	2727	28-Day Average	6740
	6/25/98	5	2726	28-Day Average	6170
Interceptor C	7/1/98	6	2789	28-Day Average	6720
	7/1/98	7	2790	28-Day Average	6540
Interceptor D	7/7/98	8	2797	28-Day Average	5870
				Mean 28-Day Average	**6,460**

Notes:
psi = pounds per square inch.

Table 4. Summary of Analytical Results for Miscellaneous Solid and Liquid Samples
Upland Capping Project
Former United Heckathorn Facility
Richmond, California

Sample Number	Date Sampled	Sample Description	Sample Depth (feet)	EPA 8080 D-BHC	Aldrin	4,4'-DDE	Dieldrin	Endrin	4,4'-DDD	4,4'-DDT	TCLP Endrin	EPA 8015 TPH-G	TPH-D	EPA 8260 c-1,2-DCE	Benzene	Toluene	1,1,2-TCA	PCE	CB	Ethyl benzene	Xylene (m+p)	Xylene (o)	IPB	N-PB	1,3,5-TMB	1,2,4-TMB	1,3-DCB	4-IPT	1,4-DCB	N-BB	1,2-DCB	1,2,4-TCB	HCBD	Naph-thalene	1,2,3-TCB	EPA 7420 Lead
Solid Samples				(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(µg/L)	(mg/kg)	(mg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(µg/kg)	(mg/kg)
980521-G1	5/21/98	Powder material near former cement storage	0.0	<1.0	<1.0	3.58	1.12	4.04	<1.0	8.86	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
980521-G2	5/21/98	Powder material on ground surface adjacent to excavation	0.0	<5.0	<5.0	8.18	<5.0	23.4	<5.0	122.6	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
980521-G3	5/21/98	Lens of white material on eastern face of excavation	2.5	<1.0	<1.0	4.56	1.55	4.52	<1.0	9.52	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
980521-G4	5/21/98	Sand backfill adjacent to pipeline on western face of excavation	3.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	2.27	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
980521-G5	5/21/98	Lens of white material on eastern face of excavation	2.5	<5.0	<5.0	7.18	<5.0	14.3	<5.0	42.6	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
980521-G6	5/21/98	Soil with white material on floor of excavation	6.0	<5.0	<5.0	8.22	<5.0	12.3	<5.0	63.2	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
EX2-SP2 (COMP A)	8/5/98	Composite sample of stockpiled soil excavated at Area C interceptor	--	<0.1	2.0	0.984	1.54	5.98	1.02	2.18	--	3.73	144	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	210	951	414	<5.0	<5.0	30.4	65.0	<5.0	20.8	<5.0	13.3	33.8	<5.0	25.0	2,290	<5.0	--
EX2-SP2 (COMP B)	8/5/98	Composite sample of stockpiled soil excavated at Area C interceptor	--	<0.5	<0.5	3.44	0.59	9.8	<2.5	15.0	--	1.21	<10.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	23.9	153	82.4	<5.0	<5.0	8.38	17.4	<5.0	<5.0	<5.0	<5.0	6.75	<5.0	7.75	1,550	<5.0	--
EX-1-SS1	8/18/98	Soil with white material on floor of Area C interceptor excavation	--	<2,500	<2,500	<2,500	<2,500	21,800	<12,500	67,000	--	--	--	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	7.63	<5.0	<5.0	<5.0	--
CS-1	8/26/98	Composite sample of stockpiled concrete debris	--	<10.0	28.7	105	21.9	<20.0	<20.0	<20.0	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
CS-2	8/26/98	Composite sample of stockpiled concrete debris	--	<0.05	<0.05	0.315	<0.10	0.74	<0.10	1.58	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--
UST-E/UST-W	9/2/98	Soil sample from bottom of UST excavation	--	<0.005	<0.005	<0.010	<0.010	<0.010	<0.010	<0.010	--	6.91	<10.0	15.5	337	23.4	44.1	<5.0	6.75	111	47.0	11.8	15.5	<5.0	<5.0	61.9	<5.0	6.88	<5.0	16.6	<5.0	<5.0	<5.0	<5.0	<5.0	--
STP-1A/B COMP.	9/3/98	Composite sample of stockpiled soil from UST excavation	--	<0.50	<0.50	1.31	4.82	13.8	5.22	6.56	10.2	7.73	35.9	<5.0	<5.0	<5.0	<5.0	8.63	<5.0	152	141	126	13.5	16.1	19.3	86.1	<5.0	19.6	<5.0	12.6	<5.0	8.75	27.0	<5.0	6.63	45.3
STP-1C/D COMP.	9/3/98	Composite sample of stockpiled soil from UST excavation	--	<0.05	0.0791	0.393	0.768	2.00	0.291	0.634	5.7	115	32.6	11.9	92	76	<5.0	32	260	3,675	20,000	8,288	1,775	979	758	1,738	13.3	<5.0	185	99.3	323	46.1	125	<5.0	22.9	39.6
STP-2A/B COMP.	9/3/98	Composite sample of stockpiled concrete debris from UST excavation	--	<0.05	0.72	0.85	1.19	2.52	1.21	2.79	24.7	<1.0	41.7	7.0	<5.0	<5.0	<5.0	8.13	<5.0	171	848	353	11.0	<5.0	<5.0	14.9	<5.0	<5.0	<5.0	<5.0	11.0	<5.0	14.3	<5.0	<5.0	40.4
Liquid Samples				(mg/L)	(mg/L)	(mg/L)	(mg/L)	(mg/L)	(mg/L)	(mg/L)	--	(mg/L)	(mg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	(µg/L)	--
EX-2-WS	7/31/98	Grab water sample from Area C interceptor excavation	--	<0.020	1.080	0.474	0.439	1.69	0.231	0.638	--	10.7	40.7	25.2	<20.0	<20.0	<20.0	<20.0	25.6	828	2,900	1,204	<20.0	<20.0	<20.0	30.4	<20.0	<20.0	<20.0	<20.0	34.4	<20.0	<20.0	69.2	<20.0	--
UST-1	8/26/98	UST Contents	--	0.868	0.236	0.384	0.280	1.57	<0.10	1.63	--	178	680	<200	7,080	17,600	<200	<200	<200	432	12,400	5,480	<200	<200	1,240	4,720	<200	<200	<200	260	<200	<200	<200	1,480	<200	--
Petroleum Product Sample				(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	--	(mg/L)	(mg/L)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	(mg/kg)	--
UST-1	8/26/98	UST Contents	--	467	149	226	184	761	<40.0	751	--	512,000	303,000	<400	1,496	14,000	<400	<400	<400	1,120	30,400	12,000	<400	<400	6,000	21,600	<400	720	<400	1,840	<400	<400	<400	4,160	<400	--

Notes:

mg/kg = Milligrams per kilogram.
ug/kg = Micrograms per kilogram.
mg/L = Milligrams per liter.
ug/L = Micrograms per liter.
<1.0 = Not detected at or above the laboratory reporting limit indicated.
-- = Not analyzed or not applicable.

c-1,2-DCE = cis-1,2-Dichloroethene.
1,1,2-TCA = 1,1,2-Trichloroethane.
D-BHC = D-Benzene hexachloride.
TCLP = Toxicity characteristic leaching procedure.
TPH-G = Total petroleum hydrocarbons quantified as gasoline.
TPH-D = Total petroleum hydrocarbons quantified as diesel.
PCE = Tetrachloroethene.
CB = Chlorobenzene.

1,3-DCB = 1,3-Dichlorobenzene.
4-IPT = 4-Isopropyltoluene.
IPB = Isopropylbenzene.
N-PB = N-Propylbenzene.
1,3,5-TMB = 1,3,5-Trimethylbenzene.
1,2,4-TMB = 1,2,4-Trimethylbenzene.
1,4-DCB = 1,4-Dichlorobenzene.
N-BB = N-Butylbenzene.

1,2-DCB = 1,2-Dichlorobenzene.
1,2,4-TCB = 1,2,4-Trichlorobenzene.
HCBD = Hexachlorobutadiene.
1,2,3-TCB = 1,2,3-Trichlorobenzene.

Table 5. Summary of Analytical Results for Water in Portable Tanks*
Upland Capping Project
Former United Heckathorn Facility
Richmond, California

Sample Location	Sample Number	Date Sampled	TPH-D (mg/L)	Heptachlor Epoxide (µg/L)	Dieldrin (µg/L)	Endrin (µg/L)	4,4'-DDD (µg/L)	4,4'-DDT (µg/L)	Zinc (µg/L)
Portable Tank 1	PT-1	8/21/98	0.29	<0.50	4.75	5.75	3.30	2.79	--
	7474-1208	12/8/98	--	--	--	--	--	--	26.2
Portable Tank 2	PT-2	8/21/98	<0.05	0.53	3.83	5.10	3.75	2.03	--
	7473-1208	12/8/98	--	--	--	--	--	--	26.2

Notes:
* = All water has been disposed offsite.
TPH-D = Total petroleum hydrocarbons quantified as diesel.
mg/L = Milligrams per liter.
µg/L = Micrograms per liter.
<0.50 = Not detected at or above the laboratory reporting limit indicated.
-- = Not analyzed or not applicable.

Table 6. Summary of Concrete Compressive Strength Results
For Concrete Cap
Upland Capping Project
Former United Heckathorn Facility
Richmond, California

Drainage Area	Date Sampled	Kleinfelder Report No.	Sample Number	Age (days)	Compressive Strength (psi)
Area D	8/10/98	11	2958	28-Day Avg.	5180
Area D	8/12/98	12	2959	28-Day Avg.	5550
Area D	8/12/98	13	2960	28-Day Avg.	5520
Area D	8/18/98	14	3011	28-Day Avg.	5440
Area D	8/20/98	15	3027	28-Day Avg.	5380
Area D	8/20/98	16	3028	28-Day Avg.	5360
Area D	8/25/98	17	3029	28-Day Avg.	5530
Area D	8/26/98	18	3047	28-Day Avg.	5450
Area D	8/26/98	19	3048	28-Day Avg.	5800
Area D	9/1/98	23	3106	28-Day Avg.	5330
Area D	9/3/98	22	3105	28-Day Avg.	5130
Area D	9/9/98	20	3103	28-Day Avg.	5800
Area D	9/9/98	21	3104	28-Day Avg.	5480
Area D	9/11/98	26	3133	28-Day Avg.	5510
Area D	9/11/98	27	3134	28-Day Avg.	5070
Area D	9/15/98	24	3123	28-Day Avg.	5570
Area D	9/16/98	25	3124	28-Day Avg.	4290
Area D	9/22/98	28	3241	28-Day Avg.	5000
Area D	9/22/98	29	3242	28-Day Avg.	4700
Area C	10/1/98	30	3267	28-Day Avg.	5590
Area C	10/6/98	32	3280	28-Day Avg.	5380
Area C	9/28/98	31	3268	28-Day Avg.	5500
Area B	10/13/98	33	3352	28-Day Avg.	5570
Area B	10/15/98	34	3378	28-Day Avg.	5350
Area B	10/20/98	39	3535	28-Day Avg.	4870
Area B	10/20/98	40	3536	28-Day Avg.	4890
Area B	10/22/98	35	3423	28-Day Avg.	5610
Area B	10/22/98	36	3424	28-Day Avg.	5550
Area A	10/27/98	37	3487	28-Day Avg.	5600
Area A	10/29/98	38	3488	28-Day Avg.	5220

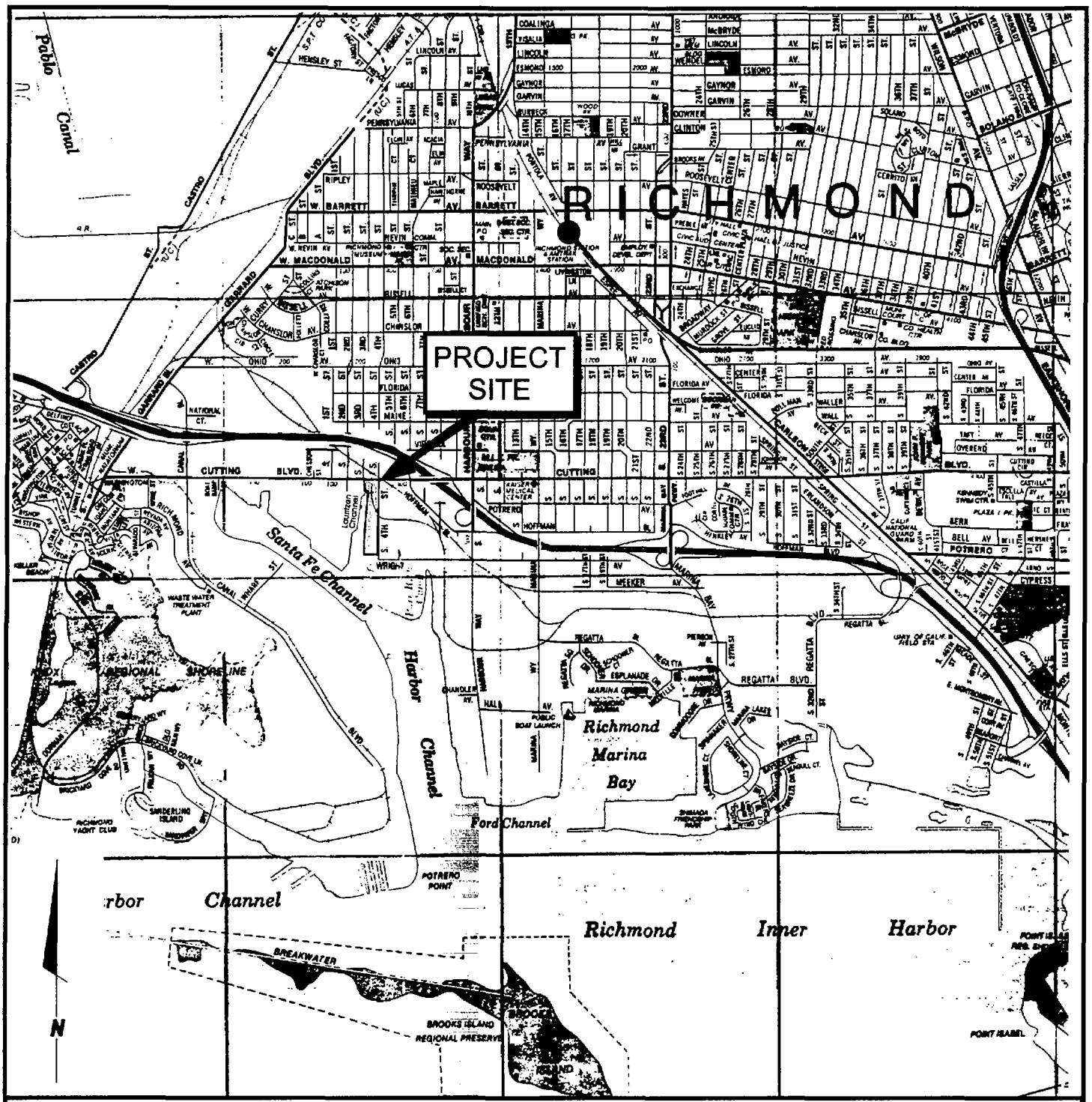
Table 6. Summary of Concrete Compressive Strength Results
For Concrete Cap
Upland Capping Project
Former United Heckathorn Facility
Richmond, California

Drainage Area	Date Sampled	Kleinfelder Report No.	Sample Number	Age (days)	Compressive Strength (psi)
Area A	11/3/98	42	3585	28-Day Avg.	4940
Area A	11/4/98	41	3537	28-Day Avg.	4750
Area A	11/5/98	43	3586	28-Day Avg.	4870
Area A	11/5/98	44	3587	28-Day Avg.	4200
Area A	11/11/98	45	3589	28-Day Avg.	6070
Area A	11/11/98	46	3590	28-Day Avg.	5780
Area A	11/13/98	47	3603	28-Day Avg.	5810
Area A	11/13/98	48	3604	28-Day Avg.	5840
				Mean 28-Day Average	**5,330**

Notes:
psi = pounds per square inch.

TABLES

ILLUSTRATIONS



0 2000 4000

Scale in Feet

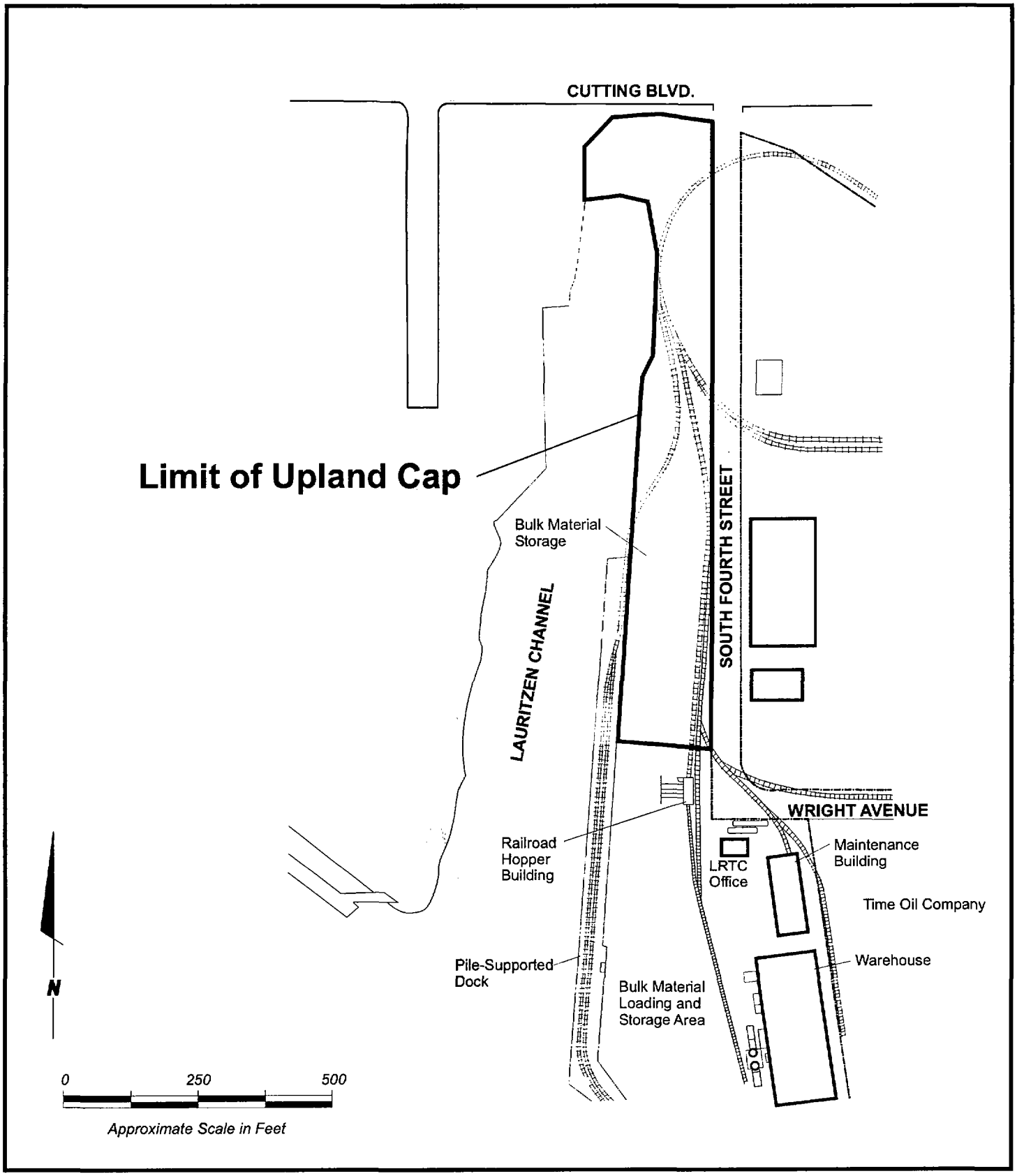
Ref: California State Automobile Association Map; Richmond, Ca.; 4/94

PES Environmental, Inc.
Engineering & Environmental Services

Site Location Map
Upland Cap Installation Report
Former United Heckathorn Facility
Richmond, California

PLATE 1

JOB NUMBER	DRAWING NUMBER	REVIEWED BY	DATE
486.0103.021	4860103021_V1.CDR		9/99



PES Environmental, Inc.
Engineering & Environmental Services

Site Plan
Upland Cap Installation Report
Former United Heckathorn Facility
Richmond, California

PLATE
2

486.0103.021	4860103021_s1.CDR		9/99
JOB NUMBER	DRAWING NUMBER	REVIEWED BY	DATE

PARTIALLY SCANNED OVERSIZE ITEM(S)

See document # 2092385
for partially scanned image(s).

For complete hardcopy version of the oversize document contact the Region IX Superfund Records Center at (415) 536-2000

DJS

PES DAILY FIELD REPORT: 21 August 1998

Work Performed, Decon

(1) Clean out interceptor inlets to accommodate inlet and discharge piping.
(2) Install inlet piping from interceptors to adjacent catch basins.
(3) Load stockpiled soil from interceptor 1 where suspect material was observed into roll-off bin for offsite management.
(4) Continue grading N/W corner of area D to final elevations.
(5) Break additional concrete obstructions in area D which obstruct final elevation.
(6) Pour additional 2 sack slurry to set interceptor 1.

Work Performed, Bernt & Sons

(1) Relocated stockpiled wire mats which are obstacles to upcoming pours
(2) Set wire mats and form boards in preparation of next pour.
(3) Continued removing form boards from previous pour.

Sampling/Testing Performed

(1) Air Monitoring: see air monitoring sample location map and air monitoring forms for air monitoring locations and sampling information..

Unexpected Field Conditions/Comments

None

Questions/Comments Dick Vesperman

(1) Spoke with Mr. Vesperman by phone to apprise him of days activities.

DJS

PES DAILY FIELD REPORT: 24 August 1998

Work Performed, Decon

(1) Continue to place, spread and compact stockpiled soil in area A. Tom Lions (PES Geotech) identified wood and concrete debris is soil being spread. Decon removed prior to placement and compaction.
(2) Break and remove concrete obstructions along swale in area D.
(3) Continue to remove rails and ties in area of proposed rail inspection pit.
(4) Started grading activities in area C.

Work Performed, Bernt & Sons

(1) Completed placing mats and installing form boards in southwestern portion of area D for pour scheduled 8/25/99.
(2) Inspected elevations of form boards with Bernt foreman to confirm cap design elevations will be met.

Sampling/Testing Performed

None

Unexpected Field Conditions/Comments

John Cockle (LRTC rail foreman) has raised concern that proposed cap design does not comply with PUC regulations with respect to rail clearance. LRTC will review regulations to determine whether design is not in compliance.

Questions/Comments Dick Vesperman

(1) Informed Mr. Vesperman of potential conflict with PUC regulations. Told him I would keep him apprised.
.

DJS

PES DAILY FIELD REPORT: 25 August 1998

Work Performed, Decon

(1) Continue to place, spread and compact stockpiled soil in area A.
(2) Continue to break and remove concrete obstructions along swale in area D.
(3) Transport inspection pit excavation spoils to area A.
(4) Started grading activities in area C.

Work Performed, Bernt & Sons

(1) Bernt & Sons poured approximately 150 yards in central portion of area D.

Sampling/Testing Performed

(1) Performed slump test and collected three cylinders for concrete strength testing.
(2) Collected sample of white caulking material observed in area C as per request of Dick Vesperman (see comments below).

Unexpected Field Conditions/Comments

Questions/Comments Dick Vesperman

Mr Vesperman observed a suspicious white material in rocky backfill material in Area C.
As per his request I collected a sample to submit for chemical analysis. Pending results, area has been controlled with caution tape.

DJS

PES DAILY FIELD REPORT: 26 August 1998

Work Performed, Decon

(1) Continue to place, spread and compact stockpiled soil in area A.
(2) Removed two abandoned pipelines (probably old water lines) to accommodate discharge outfall for interceptor 2 (area C).
(3) Poured additional slurry around interceptor 1 (area D) to secure influent/effluent piping.
(4) Completed excavating inspection pit, finished bottom with drain rock.
(5) Began exposing top of UST encountered between tracks in area C. See discussion below.

Work Performed, Bernt & Sons

(1) Removed forms from 8/25 pour.
(2) Started placing forms and mats for next pour.

Sampling/Testing Performed

(1) Collected sample of tank contents. Appears to be two phases, water with dissolve constituents and petroleum hydrocarbon floating on top.
(2)

Unexpected Field Conditions/Comments

(1) Encountered UST between tracks in area C. Exposed top to identify dimensions. Unable to expose western limit of tank due to undermining rails. Arrangements will have to be made to shut down rail and remove ties to continue exposing tank and prepare to remove it.
(2) Meeting with LRTC, PES, Decon and AN-West to discuss PUC Regulations and impact to proposed cap design.

Questions/Comments Dick Vesperman

Informed Mr. Vesperman that a UST was encountered.
Mr Vesperman indicated there is no need to analyze caulking sample collected 8/25. He submitted for analysis at EPA laboratory. Result was less than 1 ppm pesticides.

DJS

PES DAILY FIELD REPORT: 27 August 1998

Work Performed, Decon

(1) Perform test excavations to determine whether UST is west of rails.
(2) Grading bottom of inspection pit to correct elevation.
(3) Continue installing discharge piping for interceptors
(4) Remove fill material placed for crane footings during interceptor placement.
(5) Continue to spread and compact soil place in area A.

Work Performed, Bernt & Sons

(1) Bernt and Sons poured approximately 130 yards of concrete in northwestern portion of area D.

Sampling/Testing Performed

Performed slump test and collected 3 cylinders for concrete strength testing.

Unexpected Field Conditions/Comments

(1) Contacted Paul Andrews with CCCDHS to arrange for tank removal permitting and schedule county oversight for removal. Paul Andrews will be onsite at 11:00.
(2) Scheduled City of Richmond Fire Department (inspector Pando) to be onsite at 11:00 to provide tank removal oversight. Completed RFD tank removal permitting.

Questions/Comments Dick Vesperman

(1) Spoke to Mr. Vesperman by phone concerning schedule for tank removal. He asked if appropriate permitting had been obtained. Informed him that both County Health and CRFD permitting had been obtained.
.

DJS

PES DAILY FIELD REPORT: 28 August 1998

Work Performed, Decon

(1) Transferred contents of tank by vac truck into 1000-gallon poly tank. Approximately 120 gallons of liquid transferred. (LEL 100 %)
(2) Performed single rinse of tank in-place with hot pressure wash (LEL 2%).
(3) Excavation around tank completed. Backfill from midline of tank and below appears significantly impacted by petroleum hydrocarbons.
(4) Under both county, fire and EPA oversight, tank is lifted from excavation and placed on flatbed for disposal as hazardous waste.
(5) Tank excavation is extended to remove visually impacted material.
(6) Soils on west side of rails which are impacted from former UST excavated to approximately ten ft bgs and approximately 25 feet west of rails. Approximately 200 cubic yards of affected soil excavated from vicinity of former tank and stockpiled on asphalt in area D. Plastic tarp has been placed beneath and on top of stockpiles.

Work Performed, Bernt & Sons

(1) Bernt and Sons poured approximately 120 yards of concrete in western portion of area D.

Sampling/Testing Performed

Air Monitoring: see air monitoring sample location map and air monitoring forms for air monitoring locations and sampling information
Slump test performed, three cylinders collected for strength test.
Two soil samples collected from bottom of tank excavation by the request of CCCEH. Samples to be analyzed for 8080, 8260, TPHg, TPHd and total lead.

Unexpected Field Conditions/Comments

(1) Further enlargement of tank excavation to chase affected soil will undermine rail spurs that surround former tank excavation. Affected soils appear to extend both east and west of former tank location.
(2) Test pit exploration west of rails indicates affected soil extents to interceptor No. 3 in area C.

Questions/Comments Dick Vesperman

(1) Mr. Vesperman requested that we continue removing affected soil and extending excavations without concern for shutting down LRTC rail line. I have suggested that we perform test pit explorations to determine whether continued soil is prudent.
.

755

PES DAILY FIELD REPORT: 1 September 1998

Work Performed, Decon

(1) Continue to excavate visibly affected soil between tracks near former UST location. Clean overburden segregated from affected soil.
(2) Perform test pits east of tracks toward 4th street to determine extent of affected soil.
(3) Continue to spread and compact soil placed in area A.
(4) Affected soil removed from vicinity of former tank location added to contained stockpiles located in area D.

Work Performed, Bernt & Sons

(1) Bernt placing forms and mats for pour scheduled in north west portion of area D.

Sampling/Testing Performed

Air Monitoring: see air monitoring sample location map and air monitoring forms for air monitoring locations and sampling information

Unexpected Field Conditions/Comments

Questions/Comments Dick Vesperman

(1) Mr. Vesperman visited site. Permission to backfill test pits in between rails with 2 sack slurry. Would like us to continue exploratory trenching to characterize limits of affected soil.
.

DS 5

PES DAILY FIELD REPORT: 2 September 1998

Work Performed, Decon

(1) Grade area B and transport spoils to area A.
(2) Connect discharge outfall to interceptor 4 in area A.
(3) Continue to spread and compact soil place in area A.

Work Performed, Bernt & Sons

(1) Ron Bernt poured approximately 130 cubic yards of concrete along western portion of area D.

Sampling/Testing Performed

(1) Air Monitoring: see air monitoring sample location map and air monitoring forms for air monitoring locations and sampling information
(2) Tom Lions performed a slump test and collected three cylinders for compressive strength test. Slump result was 4".

Unexpected Field Conditions/Comments

(1) Former UST excavation and over excavation west of rail partially backfilled with 2-sack slurry. Concrete from mid yard stockpile was place in excavations in lifts as aggregate. Dick Vesperman concurred with burying concrete onsite based on analytical results of approx. 2 ppm total pesticides.
(2) Have begun speaking with Decon and Fred Bouret at Allwaste concerning offsite management of wastes generated during implementation of corrective action.

Questions/Comments Dick Vesperman

(1) Uncomfortable with geotextile/gravel cap in 100' x 8' strip adjacent to rail between end of dock and interceptor # 1. Wants us to defend/address.
(2) Wants us to address interceptor invert outfall elevations compared to high tides.

DJS

PES DAILY FIELD REPORT: 3 September 1998

Work Performed, Decon

(1) Perform exploratory trenching east of former tank excavation. Trenching northeast and southeast had no visual/odor evidence of being affected by hydrocarbons. Trenching directly east at fence line continued to display evidence of being impacted by petroleum hydrocarbons.
(2) Connect discharge outfall to interceptor 4 in area A.
(3) Continue to spread and compact soil place in area A.

Work Performed, Bernt & Sons

(1) Ron Bernt poured approximately 130 cubic yards of concrete along northern portion of area D.

Sampling/Testing Performed

(1) Air Monitoring: see air monitoring sample location map and air monitoring forms for air monitoring locations and sampling information
(2) Performed a slump test and collected three cylinders for compressive strength test. Slump result was 5".
(3) Collected waste characterization samples from 2 soil stockpiles (former tank excavation and exploratory trenching) located on asphalt at northern portion of area D.

Unexpected Field Conditions/Comments

(1) Exploratory trenching adjacent to fenceline will be extended ~15 feet south and 1-2 into bay mud then backfilled with 2 sack slurry.
(2)

Questions/Comments Dick Vesperman

(1) Informed Mr. Vesperman that we would supply table summarizing interceptor discharge invert elevations. Table to include MHHW, MHW and max HW
(2) Ask LRTC what they intend to do with track alon canal to former maintenance pit.

DJS

PES DAILY FIELD REPORT: 4 September 1998

Work Performed, Decon

(1) Continue to spread and compact soil in area A
(2) Place and compact soil above slurry at interceptor 3 in area C to bring to final grade below proposed cap.

Work Performed, Bernt & Sons

(1) Removed forms from 9/3 pour.
(2) Started placing forms and mats for next pour.

Sampling/Testing Performed

(1) No sampling performed.

Unexpected Field Conditions/Comments

(1) Attended meeting with LRTC, AN-West, Decon and Ron Bernt to discuss and review revisions to plans.

Questions/Comments Dick Vesperman

(1) Spoke to Mr. Vesperman by phone and informed him of the days activities.

DSS

PES DAILY FIELD REPORT: 8 September 1998

Work Performed, Decon

(1) Continue grading area B and transporting spoils to area A to spread and compact.
(2) Extend exploratory trench east of former tank excavation adjacent to fence line. Following inspecting exploratory trenching by Dick Vesperman, we are given approval to backfill with 2 sack slurry.
(3) Performed exploratory trenching along proposed roadway to determine extent of subsurface concrete. Concrete is extensive and would require a significant effort to remove to meet final elevations of revised plans submitted by LRTC.

Work Performed, Bernt & Sons

(1) Completed placing forms and mats for pour scheduled 9/9/98
(2) Inspected elevations of form boards with Bernt foreman to confirm cap design elevations will be met.

Sampling/Testing Performed

(1) No sampling performed.

Unexpected Field Conditions/Comments

(1) Met with Richard Lindsay at site to show him conflict of meeting spec's of revised plans near proposed roadway with respect to concrete obstructions. Richard was unable to offer much guidance.

Questions/Comments Dick Vesperman

none

Additional Comments

(1) Over excavated material in vicinity of former UST to remove visually impacted soils (see site map for location and dimensions of excavation). Material stockpiled on asphalt at north end of area D. Approximately 150 cubic yards of soils have been remove during tank excavation, and over excavation in former tank area and area adjacent to tank area west of rail. Extended excavation to limits of rails. Slightly affected soils observed along western side wall adjacent to tracks, north eastern corner and southwestern corner.
(2) Excavated an exploratory trench south east of former tank excavation. Excavation was performed to a depth of approximately 7.5' bgs. No impacted materials were encountered (see site map for trenching location, dimensions and orientation). Excavated an exploratory trench east of north eastern corner of former tank excavation (approximately 6' east, see site map for trenching location). Impacted soils encountered approximately 6' - 7' bgs.

DJS

PES DAILY FIELD REPORT: 9 September 1998

Work Performed, Decon

(1) Continued to grade Area B, relocate soils to Area A;
(2) Complete grading/compaction near inspection pit; and
(3) Continued to grade and compact soils relocated to Area A.

Work Performed, Bernt & Sons

Poured approximately 300 cubic yards of concrete in western portion of area D

Sampling/Testing Performed

Slump test: 6"
2 sets of three cylinders collected for strength test.

Unexpected Field Conditions

Questions/Comments Dick Vesperman

None

DJS

PES DAILY FIELD REPORT: 10 September 1998

Work Performed, Decon

(1) Completed grading Area B to final grade elevations;
(2) Extend trenching near fence line east of UST excavation. Trenching depth approximately 7' bgs (6" to 12" into bay mud). No affected soils encountered. Trenching backfilled with 2 sack cement slurry;
(3) UST contents transferred from Decon's poly tank to 2 55-gallon drums; and
(4) Placed final lift of 2 sack slurry around interceptor No. 4 (Area A).

Work Performed, Bernt & Sons

Sampling/Testing Performed

(1) Air monitoring, see air monitoring map for sampling locations.
(2) Compaction testing in Area A by Tom Lions
.

Unexpected Field Conditions

Met with Richard Lindsay regarding modifications to swale and grade elevations in Areas C/D to avoid removing large concrete foundations and additional soil which would require relocation to Area A.

Questions/Comments Dick Vesperman

None

DJS

PES DAILY FIELD REPORT: 11 September 1998

Work Performed, Decon

(1) Continue to grade Area C;
(2) Continue to grade and compact relocated soils at Area A.

Work Performed, Bernt & Sons

Sampling/Testing Performed

(1) No sampling performed.
(2) Tom Lions transported 4 sets of concrete cylinders to Klienfelder for testing.

Unexpected Field Conditions/Comments

(1) Several large concrete foundations observed in area C north of tracks. Evaluating modifications to grade elevations in that area to avoid removal.
(2) Letter of waste acceptance received from ECDC for soil and concrete waste streams. Mike McCoy will have 4 gondola rail cars onsite Monday to begin loading out waste.

Questions/Comments Dick Vesperman

None

DJS

PES DAILY FIELD REPORT: 14 September 1998

Work Performed, Decon

(1) Began loading soil and concrete stockpiles into gondola rail cars for transport to ECDC;
(2) Continued grading in northern portion of Area D/southern portion of Area C;
(3) Sawcut edge of concrete pad in south east corner of Area D
(4) Continue to grade and compact soils relocated to Area A.

Work Performed, Bernt & Sons

(1) Installed form boards and placed steel mats in two areas to be poured in northern portion of area D.

Sampling/Testing Performed

Air monitoring, see air monitoring map for sampling locations.

Unexpected Field Conditions/Comments

(1) To avoid removal of additional soil and several large concrete foundations in portion of Area C, north of tracks, Jason of Decon and I have made a field decision to raise the finished grade in that area approximately 6". Minor impact is anticipated.
(2) High point in Area A appears to be approximately 14 feet msl. Will work with Jason to evaluate modifications to grading in that area reduce height.

Questions/Comments Dick Vesperman

Informed Dick of proposed meeting Tuesday, 9/15/98 to address outstanding issues. Meeting is scheduled for 14:00.

PSS

PES DAILY FIELD REPORT: 15 September 1998

Work Performed, Decon

(1) Completed loading contaminated soil and concrete into gondola rail cars. Approximately 420 tons loaded into 5 cars;
(2) Two additional DI's and associated trenching installed in southern portion of area D;
(3) Continued grading and compaction of relocated soils in area A; and
(4) Removed rail east of new locomotive maintenance pit.

Work Performed, Bernt & Sons

(1) Poured approximately 28 cubic yards (900 square ft.) of concrete adjacent to interceptor
No. 1;
(2) Formed and placed steel for approximately 5,000 square foot pour in eastern portion of Area D.

Sampling/Testing Performed

Concrete Slump: 6"
Collected 3 cylinders for compressive strength test

Unexpected Field Conditions

none

Questions/Comments Dick Vesperman

none

DJS

PES DAILY FIELD REPORT: 16 September 1998

Work Performed, Decon

(1) Loaded soil and drain rock excavated from interceptor No. 1, where buffed, white colored powder was observed into gondola rail car for transport to ECDC;
(2) Continued grading in northern portion of Area D/southern portion of Area C;
(3) Sawcut edge of concrete pad in south east corner of Area D;
(5) Continue to grade and compact soils relocated to Area A; and
(6) completed storm sewer piping for additional DI in northern portion of Area D

Work Performed, Bernt & Sons

(1) Poured approximately 130 cubic yards of concrete (approx. 5,000 square feet) in north east portion of Area D.

Sampling/Testing Performed

Air monitoring, see air monitoring map for sampling locations.
Slump test: 8"
Three cylinders collected for strength test.

Unexpected Field Conditions/Comments

Due to undefined boundary in many areas adjacent to canal, it makes sense to place a 2' to 3' buffer of geotextile/gravel between riprap and/or seawall and the edge of the rolled curb.

Questions/Comments Dick Vesperman

Apprised Mr. Vesperman of status of todays activities.

PES Environmental, Inc.
Engineering & Environmental Services

Daily Progress Report
Levin-Richmond Terminal
Upland Cap Installation

Work Performed:

- CONTINUE GRADING IN AREAS B & C
- POUR SMALL VOLUME CONCRETE IN TRIANGULAR AREA NEAR RR SWITCH IN AREA F
- EVALUATE TIE IN OF DI #4 W/ TRENCH GRATE (TO BE INSTALLED)
- MEET W/ DICK VESPERMAN IN FIELD (½-HOUR). TOPICS: ① PROGRESS IN REVIEW, THEN TO EPA; ② EMBANKMENT LETTER DOMINO; ③ AREA 4 INTERCEPTOR VALVE; ④ DICK GIVES OK TO DISCONTINUE AIR MONITORING.

~~Equipment Used~~:

Personnel:

PES: WILL MAST
DECON: JASON & CREW
R. BERNT: RON, DAVE, & CREW

Unexpected Field Conditions Encountered:

- CONCRETE FOUNDATION AT NORTH END AREA D WHERE DRAINAGE SWALE NEEDS TO RUN. PRESENTLY TOO HIGH TO ~~GET~~ POUR 5-IN. THICK CONCRETE.

Impact To Completion Schedule:

- DECON JACK-HAMMERS CONCRETE & TORCH CUTS REBAR. NO SCHEDULE IMPACT.

Recorder's Initials: WM

Date: 9-18-98

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PES Environmental, Inc.
Engineering & Environmental Services

Daily Progress Report
Levin-Richmond Terminal
Upland Cap Installation

Work Performed:

- CONTINUE EXCAVATION/GRADING IN AREAS B & C
- LOAD & HAUL OUT ASPHALT
- ADD'L MINOR JACKHAMMER WORK (AREA B)

Equipment Used:

Personnel:

PES: WILL WAST
DEION: JASON & CREW

Unexpected Field Conditions Encountered:

- NONE
- WWM BEGAN DISCUSSION W/ CITY OF RICHMOND RE: POTETIAL FOR BATCH DISCHARGE PERMIT OF WATER IN BAKER TANKS

Impact To Completion Schedule:

Recorder's Initials: WWM

Date: 9.21.98

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PES Environmental, Inc.
Engineering & Environmental Services

Daily Progress Report
Levin-Richmond Terminal
Upland Cap Installation

Work Performed:

- CONTINUE FINAL GRADING IN AREA C
- POUR CONCRETE AT NORTH END AREA D - 2 AREAS
- DISASSEMBLE/DEMOB METEORLOGICAL STATION
- SOIL PLACEMENT/COMPACTION @ AREA A (MINOR)

Equipment Used:

Personnel:

PES - WWM
DECON - JASON & CREW
KPRIME - NELS
R. BERNT & CREW

Unexpected Field Conditions Encountered:

NONE

Impact To Completion Schedule:

Recorder's Initials: WWM

Date: 9-22-98

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PES Environmental, Inc.
Engineering & Environmental Services

Daily Progress Report
Levin-Richmond Terminal
Upland Cap Installation

Work Performed:

- GRADING AREA C BETWEEN TRAIN SCALE & BYPASS
- MOVING/PLACING CONCRETE FORMS @ NORTH END AREA D
- ROLLING, CLEANUP @ AREA A
- EVAL. GRADING & DRAINAGE NR. SCRAP HAUL ROAD

Equipment Used:

Personnel:

PES: WWM
PECON: JASON & CREW
R. BERNT & DAVE

Unexpected Field Conditions Encountered:

AREA C EMBANKMENT - OPEN HOLE W/ LOOSE MATERIAL
AREA A - RAMP TO PAD & RR CROSSING TO AREA B
AREA D - MAIN GATE SCRAP HAUL ROAD

Impact To Completion Schedule:

AREA C: LRTC TO PLACE "SEA WALL" BEFORE 1.1.99
AREA A: KEEP DRAINAGE TO DI #16 NEAR RR GATE;
ADDITIONAL SOIL NEEDS ROLLING TO FORM RAMP
AREA D: PLAN TO USE 4-SACK CEMENT INSTEAD OF BALLAST;
LRTC TO REWORK RR TRACKS BEFORE CONCRETE POURING

Recorder's Initials: WWM

Date: 9.23.98

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PES Environmental, Inc.
Engineering & Environmental Services

Daily Progress Report
Levin-Richmond Terminal
Upland Cap Installation

Work Performed:

- POUR CONCRETE SWALE ON EAST SIDE AREA B
- REVIEW FUTURE POUR AREAS AT: ① WEST SIDE AREA D (WEST ½ OF SWALE), ② AREA C - TWO AREAS TO FILL IN NR. TRAIN SCALE
- SITE REVIEW / SCHEDULE DISCUSSION W/ DICK VESPERMAN & MIKE McCOY. D.V. GIVES OK TO USE NON-HAZ. MAT. TRAINED CONCRETE WORKERS (~½ HR. MTG.)

Equipment Used:

Personnel:

PES - WWM
R. BERNT & CREW

Unexpected Field Conditions Encountered:

POSSIBLE ADDITIONAL DELAYS FROM TRACK MAINTENANCE & SLOW PROGRESS OF CONCRETE POURING

Impact To Completion Schedule:

CANNOT QUANTIFY

Recorder's Initials: WWM

Date: 10-13-99

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PES Environmental, Inc.
Engineering & Environmental Services

Daily Progress Report
Levin-Richmond Terminal
Upland Cap Installation

Work Performed:

- POUR CONCRETE ON WEST SIDE AREA B

Equipment Used:

Personnel:

PES - W. MAST
L. BERNT & CREW

Unexpected Field Conditions Encountered:

- REDUCE RR INSPECTION PIT FROM 50 FT LONG TO 30 FT.

Impact To Completion Schedule:

- AWARD RR INSPECTION PIT CONTRACT NEXT WEEK, BEGIN WORK FOLLOWING WEEK

Recorder's Initials: WWM

Date: 10 15-98

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PES Environmental, Inc.
Engineering & Environmental Services

Daily Progress Report
Levin-Richmond Terminal
Upland Cap Installation

Work Performed:

- POURING CONCRETE IN SOUTH CENTRAL PORTION OF AREA B
- INSPECT AREA A - DEBRIS NOW GONE
- RR INSPECTION PIT & - SLURRY FLOOR POURED ALREADY, CONSTRUCTING & STEEL REBAR FOR SIDE POURS

Equipment Used:

Personnel:

PES - WWM
R. BERNT & CREW
PRIME CON

Unexpected Field Conditions Encountered:

- NEED TO COMPACT & SOUTH SLOPE OF AREA A PAD WHERE DISMANTLING WORK WAS DONE

Impact To Completion Schedule:

- NONE. COMPACTION & FIELD TESTING TO BE DONE BEFORE CONCRETE READY TO GO DOWN

Recorder's Initials: WWM

Date: 10-20-98

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PES Environmental, Inc.
Engineering & Environmental Services

Daily Progress Report
Levin-Richmond Terminal
Upland Cap Installation

Work Performed:

- POURING CONCRETE IN NORTH CENTRAL PORTION OF AREA B

Equipment Used:

Personnel:

PES - WWM
R. BERNT & CREW

Unexpected Field Conditions Encountered:

Impact To Completion Schedule:

Recorder's Initials: WWM

Date: 10-22-98

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APPENDIX A

DAILY PROGRESS REPORTS

PES Environmental, Inc.
Engineering & Environmental Services

Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

Mob'd Equipment Onto Site; Prepared Decontamination Area; Confirmed Trench Alignments; Checked Control Elevations

Equipment Used:

Personnel:

PES: DON SEYMOUR
DECON: Jason; Augie; Adman; Clemente

Unexpected Field Conditions Encountered:

Concrete Pad At North End of Site Will Have To Be Saw Cut To Accomodate Trenching For Storm Sewer Installation.

Impact To Completion Schedule:

Concrete

Recorder's Initials: DJS

Date: 7 JULY, 1998

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PES Environmental, Inc.
Engineering & Environmental Services

Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

Finished Clearing North End of Site, Moved Drop Inlets To North End of Site Staked Locations For Drop Inlet Box locations, MARKED TRENCHING LINES IN AREA A

Equipment Used:

580 CASE Extendahoe

Personnel:

PES: DON SEYMOUR
DECON: JASON; Aussie; Adrian; Clemente
Kister, Savio & Rei (Surveyors)

Unexpected Field Conditions Encountered:

CONCRETE Pad At North End of Site Will Have To Be Saw Cut To Accomodate Storm Sewer Trenching. DROP INLETS IN AREA A WILL REQUIRE MODIFICATION DUE TO INVERT/RIM ELEVATION CHANGES IN AN-WEST CONSTRUCTION PLANS

Impact To Completion Schedule:

CONCRETE PAD - 2-4 HOURS
DROP INLET BOXES - 8 HOURS

Recorder's Initials: DJS

Date: 8 JULY, 98

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Levine Richmond Terminal
Upland Cap Installation

Work Performed:

(1) REMOVED SECTION OF CONCRETE PAD, (2) REMOVED 4-6 INCH LAYER OF ASPHALT OVERLYING TRENCHING ALIGNMENT; (3) COMPLETED EXCAVATIONS FOR DRAINAGE INLETS 17, 18, 19 & 20; (4) COMPLETED STORM SEWER PIPE TRENCHING IN AREA A (APPROX. 200 FEET)

Equipment Used:

CASE 580 BACKHOE
WET CONCRETE SAW

Personnel:

PES: DON SEYMOUR
DECON: JASON, AUGGIE, CLEMENTE
CONCRETE SAW CUTTER

Unexpected Field Conditions Encountered:

4-6-INCH ASPHALT LAYER 6 to 8-INCHES BELOW GROUND SURFACE UNDERLYING TRENCH ALIGNMENT

Impact To Completion Schedule:

1 to 2 HOURS

Recorder's Initials: DJS

Date: 9 JULY 98

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Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

(1) PLACED BEDDING IN AREA A TRENCHING; (2) SAW CUT D.I. BOXES 17 & 18. TO MODIFY FOR NEW TRENCHING ALIGNMENT; (3) SET DI BOXS 17, 18 & 19; (4) SET STORM DRAIN PIPING BETWEEN D.I. BOXES 17 & 19; (5) PLACED 6" LAYER OF GRAVEL OVER PIPING BETWEEN D.I. BOXES 17 & 18.

Equipment Used:

CASE 580 BACKHOE
TRASH PUMP

Personnel:

PES: DON SEYMOUR
DECON: JASON, AUGGIE, ADRIAN, CLEMENTE
OSBORNES: ROB OSBORNE (CONCRETE CORER)

Unexpected Field Conditions Encountered:

INFILTRATION OF PERCHED GROUNDWATER FROM SIDEWALLS INTO STORM DRAIN TRENCHING. REMOVED APPROXIMATELY 130 GALLONS W/TRASH PUMP & PLACED INTO 3 - 55 GALLON DRUMS. WATER WILL BE TRANSFERED TO 1000 GALLON POLY TANK FOR FUTURE MANAGEMENT.

Impact To Completion Schedule:

1 TO 2 HOURS

Recorder's Initials: DJS

Date: 10 JULY 1998

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Upland Cap Installation

Work Performed:

PLACED + FILLED AREA AROUND D.I. #20. SET PIPING + BACKFILLED. POURED 2-SACK SAND SLURRY AROUND D.I. BOXES 20, 19 + 18. MAPPED AREA TO EXCAVATE FOR D.I. BOX #0. POURED 2-SACK SAND SLURRY AROUND D.I. #17 and ALONG TOP OF TRENCHES BETWEEN 17, 18, 19 and 20.

Equipment Used:

CASE 580 BACKHOE

Personnel:

PES - SAUL HERMANAS
DECON: JASON, ANNIE, CLEMENTE, ADRIAN
SUGAR CITY - SAND SLURRY DELIVERY.

Unexpected Field Conditions Encountered:

D.I. BOX AT NORTHWEST END OF AREA "E" FILLED COMPLETELY WITH SEDIMENT.

Impact To Completion Schedule:

SPENT 1 1/2 HOURS HAND-DIGGING SEDIMENT OUT OF D.I. BOX IN AREA "E". NOT COMPLETED - WILL NEED TO CONTINUE.

Recorder's Initials: SVG

Date: 7.13.98

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Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

Continued Cleaning out Drainage Basin Adjacent to Interceptor in Area E, Began Removing Asphalt in Area D. (~ 70 yd³), Exposed Buried Pipe Stub to Drainage Basin O

Equipment Used:

580 Case Backhoe
7 yd Dump Truck
Portable Generator

Personnel:

PES: Don Seymour
Decon: Jason, Auggie, DAriane, Clemente

Unexpected Field Conditions Encountered:

(1) Pump out Water Draining into Drainage Box OO
(2) Elevation of Pipe Stub to Drainage Box ~ 1' higher Than Spec'd Elv.
(3) Delay Relocating Trailer from Area D
(4) DRAINAGE Basin OO not Connected to Interceptor

Impact To Completion Schedule:

(1) Pump out WATER / ADDITIONAL SEDIMENT REMOVAL 1-2 HOURS
(2) 1-3 DAYS
(3) 2 HOURS
(4) 1 DAY

Recorder's Initials: DJS

Date: 7-14-98

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Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

Equipment Used:

Case 580 Backhoe
7 yd³ Dump
Wet Concrete Saw
Portable Generator

Personnel:

PES: Don Seymour
Decon: Jason, Auggie, ADrian, Clemente
Osborne Saw Cutting: Rob Osborne

Unexpected Field Conditions Encountered:

Impact To Completion Schedule:

Recorder's Initials: DJS

Date: 7-15-98

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Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

- Excavated trench from DI # 10 to DI # 11 for storm drain placement
- Removed asphalt road & portion of asphalt berm overlying storm drain alignment between DI # 11 & DI # 0
- Swept asphalt roadway to prep for sawcutting tomorrow

Equipment Used:

Case 580 backhoe
7 yd³ end dump
Loader (~1 hour)

Personnel:

PES: Marcus Totta
Decon: Jason, Auggie, Adriane, Clemente

Unexpected Field Conditions Encountered:

(1) Encountered ~30 linear feet of concrete foundation in trench from DI # 11 to DI # 0
(2) Asphalt ~12 to 15 inches thick in area of berm

Impact To Completion Schedule:

(1) 6 to 8 hours
(2) ~1 hour

Recorder's Initials: MJ

Date: 7/16/98

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Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

- SAW CUT ASPHALT IN AREA D TO PREPARE FOR REMOVAL
- TRENCHING FOR DI #10 to #0 IS APPROX 85% COMPLETE
- REMOVAL OF CONCRETE OBSTRUCTION IN TRENCHING ALIGNMENT BETWEEN DI'S 10 & 11 ~50% COMPLETE
- SAWCUT BOX 0 TO MODIFY INVERT ELEV. OF INLET & OUTLET

Equipment Used:

CASE 580 BACKHOE
JOHN DEERE 710 W/ BREAKER
WET CONCRETE SAW
FRONT-END LOADER, 7 yd END-DUMP

Personnel:

PES: DON SEYMOUR; WILL MAST
DECON: JASON; AUGGIE; ADRIAN; CLEMENTE
OSBORNE'S SAW CUTTING; ROB OSBORNE

Unexpected Field Conditions Encountered:

RELOCATED DI #10 ~30' SOUTH TO AVOID CONCRETE OBSTRUCTIONS

Impact To Completion Schedule:

AVOIDED 2-3 DAY DELAY

Recorder's Initials: DJS

Date: 7/17/98

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Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

* COMPLETED REMOVING CONCRETE OBSTRUCTIONS IN TRENCHING BETWEEN DI # 10 & 11
* COMPLETED TRENCHING AND DI EXCAVATIONS, AREA D BETWEEN DI's 10 & 9
* BEDDED; SET PIPE & DI's 10, 11 & 9 & BACKFILLED W/ 6" OF PEA GRAVEL
* COMPLETED SAW CUTTING ASPHALT IN AREAS D & F

Equipment Used:

710 JOHN DEER W/ BREAKER
580 CASE SUPERL BACKHOE
FRONT-END LOADER
7yd³ END DUMP

Personnel:

PES: DON SEYMOUR
DECON: JASON; AUGGIE; ADRIAN; CLEMENTE; MITCH; AND
OSBORNE'S SAW CUTTING; ROB OSBORNE

Unexpected Field Conditions Encountered:

Impact To Completion Schedule:

Recorder's Initials: DJS

Date: 7/20/98

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Levine Richmond Terminal
Upland Cap Installation

Work Performed:

* BEGAN REMOVING ASPHALT IN AREA F * CONTINUED REMOVING CONCRETE OBSTRUCTIO IN TRENCHING BISECTING AREA D
* BACKFILLED TRENCH 0 → 10 W/ 2 SACK SLURRY
* ~~BEGAN~~ EXCAVATED HOLE FOR DI # 4, BEGAN TRENCHING TO TIE IN BOX

Equipment Used:

CASE 580 SUPER L
JOHN DEERE 710 W/ BREAKER
FRONT END LOADER
'7 yd³ END DUMP

Personnel:

PES: DON SEYMOUR
DICON: JASON, AUGUS, ADRIAN, MITCH, CLEMENTE, VINCE

Unexpected Field Conditions Encountered:

(1) CONCRETE OBSTRUCTION IN TRENCHING FROM DI # 4 TO TIE IN BOX LOCATED ~ 10'-NORTH OF TIE-IN BOX. AREA TO BE REMOVED IS ~ 10 FEET LONG × 1' WIDE × 1.5 FEET DEEP

Impact To Completion Schedule:

(1) 3 HOURS

Recorder's Initials: DJS

Date: 7/21/98

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Upland Cap Installation

Work Performed:

* Completed trenching & Excavation for DI #4 + SET DI #4 & BEDDED Trenching, SET Pipe to Tie-in and Backfilled w/ Pea gravel
* Completed Trenching for line DI #8 to DI #9, Set Box #8, Bedded trenching, Set 120' of Pipe

Equipment Used:

John Deere 710 w/ Breaker
Case 580 super L
Front-End Loader
Tyd End-Dump
Mobbed onto site John Deere Excavator

Personnel:

PES: Don Seymour
Decon: Jason, Auggie, Adrian, Clemente, Vince & Bill

* Sugar City, 25 TONS OF PEA GRAVEL

Unexpected Field Conditions Encountered:

(1) Encountered Concrete wall ~ 1' EAST OF DI #9 LOCATION

Impact To Completion Schedule:

(1) ~ 3 HOURS

Recorder's Initials: DJS

Date: 7/22/98

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Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

* SET BOX 9, COMPLETED TRENCHING BETWEEN 8 & 9 (REMOVED SECTION OF RETAINING WALL OBSTRUCTING PIPING INTO #9, LAID PIPING BETWEEN #8 & #9; BACK FILLED W/ 6" OF PEA GRAVEL, BACK FILLED TO GRADE W/ 2 SACK SLURRY. BACK FILLED BOX #4 & TRENCHING TO TIE-IN W/ 2 SACK SLURRY TO GRADE. SLURRIED STUB EXCAVATION NEAR BOX 0

Equipment Used:

CASE 580 SUPER L
JOHN DEERE 710
FRONT-END LOADER

Personnel:

PES: DON SEYMOUR
DECON: JASON; Auggie; Adrian; CLEMENTE; & VINCE
SUGAR CITY, 3 TRUCKS (27 yds) 2 SACK SLURRY

Unexpected Field Conditions Encountered:

Impact To Completion Schedule:

Recorder's Initials: DJS

Date: 23 JULY 98

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Upland Cap Installation

Work Performed:

(1) COMPLETED ~ 80 FT OF TRENCHING IN AREA F (2) COMPLETED EXCAVATIONS FOR DES #7 & #6 (3) EXPOSED PIPELINE FOR TIE IN TO BOX O

Equipment Used:

CASE 580 SUPER L
JOHN DEERE 710 W/ BREAKER
7 yd³ END-DUMP

Personnel:

PES: DON SEYMOUR
DECON: AUGGIE; ADRIAN; CLEMENTE; VINCE
SUGAR CITY: 9yd³ 2 SACK SLURRY

Unexpected Field Conditions Encountered:

(1) ASSISTED RON BERNT W/ JOHN DEERE 710 TO EXPOSE PIPE STUB AT BOX O
(2) ENCOUNTERED WATER LINES ~ 20 FEET SOUTH OF BOX #7 LOCATION

Impact To Completion Schedule:

(1) 1.5 HOURS
(2) RELOCATED BOX #7 APPROXIMATELY 20 FEET SOUTH TO AVOID WATER LINES - NO IMPACT TO SCHEDULE

Recorder's Initials: DJS

Date: 24 JUL 1 98

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Upland Cap Installation

RANGED THICKNESS BETWEEN 6" - 20"

Work Performed:

(1) REMOVED AND STOCK PILED ~ ~~6000~~ 3000-4000 ft² OF ASPHALT IN AREAS D & F (2) COMPLETED ~ 150 ft OF TRENCHING IN AREA F (3) INSTALLED DI'S #7 & #6 (4) BEDDED TRENCHING AND INSTALLED PIPE BETWEEN DI'S #7 & #6

Equipment Used:

JOHN DEERE EXCAVATOR, FRONT-END LOADER, CASE 580 SUPER C BACK HOE, JOHN DEERE 710 w/ BREAKER, 7 yd³ END-DUMP

Personnel:

PES: DON SEYMOUR
DECON: JASON, AUGGIE, ADRIAN, VINCE, CLEMENTE, MITCH & ISSAC
CU UTILITY SURVEYS: KIETH WILLIAMS, JIM (12:40 - 15:30)

Unexpected Field Conditions Encountered:

(1) 4" PIPELINE INTERSECTING AREA F TRENCHING ~ 50' SOUTH OF DI #6, ~30" bgs

Impact To Completion Schedule:

(1) NONE - REQUIRED UTILITY LOCATOR & PG&E TO IDENTIFY

Recorder's Initials: DJS

Date: 27 JULY 98

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Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

(1) COMPLETED TRENCHING FROM DI #5 TO #2 (2) EXCAVATION FOR DI'S #2 & #3 (3) TRENCHING UNDER TRACKS FROM DI #3 TO #2 (4) ASPHALT REMOVAL IN AREA D

Equipment Used:

JOHN DEERE EXCAVATOR, FRONT-END LOADER, CASE 580 SUPER L JOHN DEERE 710, 7yd³ END DUMP

Personnel:

PES: DON SEYMOUR
DECON: JASON, AUGGIE, ADRIAN, CLEMENTE, MITCH, ISSAC & SCOTT

Unexpected Field Conditions Encountered:

Impact To Completion Schedule:

Recorder's Initials: DJS

Date: 28 JULY 98

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7/29/98

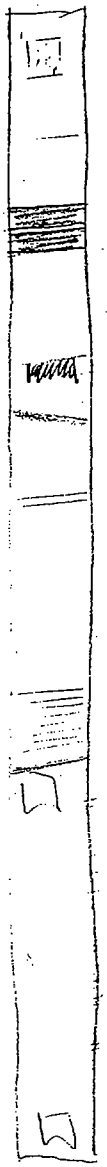
9:30 Area A excavation ok

9:45 fired-up PID, walked site ~0ppm

10:00 Mike McMurry onsite

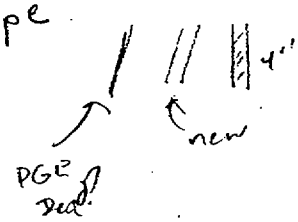
10:30 Excavation Clean-up @ Area A completed

10:45 Truck onsite, remove asphalt



11:00 Pipes encountered approx 6' from southern drop-in point

11:15 another pipe ~ 3" lower than 4" drain mystery pipe



= will drill hole in mystery pipe

11:30 Lunch

12:20 Onsite

12:35 Asphalt Removal / Proceeding

12:45 Mystery Pipe drilling begins

12:50 Hole, nothing present?

13:30 Blade not big enough to cut pipe.., getting new saw

14:00 Pipe section removed, will cap w/ concrete

1430 Cement Caps installed

1500 backfilling w/ P-gravel

1530 Decision to remove 2 more ties

1600 stopped air monitoring

22-141 50 SHEETS
22-142 100 SHEETS
22-144 200 SHEETS
AMPAD

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Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

(1) COMPLETED AREA F TRENCHING, (2) BEDDED AREA F TRENCHING WITH PEA GRAVEL, (3) INSTALLED AREA F STORM SEWER PIPING (95%) (4) BACK FILLED TRENCHING W/ PEA GRAVEL (5) MODIFIED "CUTOUTS" IN BOXES 3, 2 & 1 (6) INSTALLED BOXES 5, 3, 2 & 1 (7) BEGAN CLEANUP OF EXCAVATION FOR INTERCEPTOR BOX (8) LOADED OUT 8 TRUCKS OF ASPHALT (9) PICKED UP & DELIVERED 200 FT 15" HDPE

Equipment Used:

CASE 580 SUPER L
JOHN DEERE EXCAVATOR
FRONT-END LOADER
7 yd³ END DUMP
COMPRESSOR & JACK-HAMMER

Personnel:

PES: DONSEYMOUR
DRCON: JASON, AUGUSTE, ADRIAN, MITCH, CLEMENTE, ISSAK and

Unexpected Field Conditions Encountered:

UPGRADED 12" HDPE BETWEEN BOXES 2 & 1 TO 15" (120 FEET)
REQUIRED AN ADDITIONAL 100 FEET OF 15" HDPE FOR PIPING SPECS IN AREA (BETWEEN BOXES)

Impact To Completion Schedule:

NONE
200' 15" HDPE AT 7.55/FOOT
12 × 15" HDPE COUPLINGS AT 8.65/COUPLING
~~DELA~~ PICK-UP/DELIVERY - FLAT BED - DRIVER

Recorder's Initials: DJS

Date: 7-30-98

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Work Performed:

(1) COMPLETE LAYING PIPE, BACKFILLING W/ 6" OF PEA GRAVEL AND BACK FILLING W/ 2 SACK SLURRY ALL TRENCHING AND DI'S IN AREA F (2) CONTINUED LOADING OUT ASPHALT (3) CONTINUED EXCAVATION FOR INTERCEPTOR # ___

Equipment Used:

CASE 580 SUPER L
JOHN DEERE EXCAVATOR
FRONT-END LOADER
7 yd³ END-DUMP

Personnel:

PES: DON SEYMOUR
DICON: JASON, AUGGIE, ADRIAN, CLEMENTE, MITCH, ISSACK, RAND

Unexpected Field Conditions Encountered:

(1) ENCOUNTER HYDRO CARBON AFFECTED WATER IN EXCAVATION FOR INTERCEPTOR ___

Impact To Completion Schedule:

(1) UNKNOWN

Recorder's Initials: DJS

Date: 7-31-96

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Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

(1) TRENCHED, BEDDED, INSTALLED HDPE & BACKFILLED W/ PEA GRAVEL AND SLURRY FROM DI # 15 TO RAIL TRACKS (2) TRENCHED, BEDDED, INSTALLED HDPE AND BACKFILLED W/ SLURRY & PEA GRAVEL APPROXIMATELY 50 PERCENT OF PIPING BETWEEN DI # 16 AND INTERCEPTOR (3) INSTALLED DI'S # 16 & 15
(4) BEGAN GRADING AREA A

Equipment Used:

580 SUPER L
JOHN DEERE, EXCAVATOR
WATER TRUCK, COMPACTOR, 7 yd³ END DUMP

Personnel:

PES: DON SEYMOUR
DECON: JASON, AUGGIE, ADRIAN, CLEMENTE, ISSAIK, MITCH, RANDY

Unexpected Field Conditions Encountered:

(1) EXCAVATION FOR INTERCEPTOR # 3 FILLED W/ APPROXIMATE 5,000 TO 7,000 GALLONS OF WATER. PUMPED FROM EXCAVATION AND USED AS DUST CONTROL IN AREA A
(2) WATER WHICH ENTERED EXCAVATION # 2 CONTAINS CONCENTRATI OF XYLENES & SEVERAL PESTICIDES

Impact To Completion Schedule:

(1) ~ 3 HOURS
(2) UNKNOWN

Recorder's Initials: DJS

Date: 8-4-98

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Levine Richmond Terminal
Upland Cap Installation

Work Performed:

(1) COMPLETED TRENCHING FOR LINE 15-15A (2) SET DI # 15A (3) COMPLETED PIPING FROM DI # 16 TO 15A (4) BEDDED INTERCEPTOR # 3 W/ DRAIN ROCK

Equipment Used:

CASE 580 SUPER L, JOHN DEERE EXCAVATOR, FRONT-END LOADER, 7 yd³ END DUMP; COMPACTOR, WATER TRUCK

Personnel:

PES: DON SEYMOUR
DECON: JASON; AUGGIE; ADRIAN; MITCH; CLEMENTE; ISSACK

Unexpected Field Conditions Encountered:

(1) EXCAVATION FOR INTERCEPTOR # 3 HAS FILLED AGAIN W/ APPROXIMATELY 7,000 GALLONS OF WATER. USE AS DUST CONTROL IN AREA A AND/OR DISCHARGE TO CANAL
(2) REMOVED CONCRETE OBSTRUCTION INTERFERING W/ INSTALLATION OF DI # 15A

Impact To Completion Schedule:

Recorder's Initials: PJS

Date: 8-5-98

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Levine Richmond Terminal
Upland Cap Installation

Work Performed:

(1) REMOVE TIES TO TRENCH & INSTALL PIPING TO DI # 15A (2) CONTINUE GRADING & COMPACTING AREA A (3) COMPLETE PIPING BETWEEN DI'S 15 & 15A (4) COMPLETED BACKFILLING TRENCHING AND DIS 15 & 15A W/ 2 SACK SLURRY; (5) REMOVE GRAVEL CHANNEL AFFECTED W/ PETROLEUM HYDROCARBON AT INTERCEPTOR # 2, AND PLUG W/ 2 SACK SLURRY

Equipment Used:

CASE 580 SUPER L; DUMP TRUCK; LOADER; DEERE 710 W/ BREAK; EXCAVATOR; COMPACTOR; WATER TRUCK

Personnel:

PES: DON SEYMOUR
DECON: JASON; AUGGIE, ADRIAN; CLEMENTE; MITCH; ISSACK

Unexpected Field Conditions Encountered:

Impact To Completion Schedule:

Recorder's Initials: DJS

Date: 6 AUGUST

PES Environmental, Inc.
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Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

(1) COMPLETED EXCAVATION OF INTERCEPTOR #2 TO FINAL DEPTH AND BEDDED W/ 2-SACK SLURRY; (2) RON POURED APPROXIMATELY 300 ft/d³ OF CONCRETE AT THE SOUTHERN MID PORTION OF YARD

Equipment Used:

CASE 580 SUPER L; DUMP TRUCK; LOADER; DEERE 710 W/ BREAKER EXCAVATOR; WATER TRUCK; COMPACTOR

CONCRETE PUMP TRUCK

Personnel:

PES: DON SEYMOUR
DECON: JASON; AUGGIE; ADRIAN; CLEMENTE; MITCH; ISSACK
BERNT & SONS: RON; DAVE; RB; RICHARD

Unexpected Field Conditions Encountered:

Impact To Completion Schedule:

Recorder's Initials: DJS

Date: August 10, 98

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10 AUGUST 98

* GRAVEL LENS EXPOSED ON WESTERN FACE OF INTERCEPTOR EXCAVATION # 2. IDENTICAL DIMENSIONS AND ALIGNMENT AS LENS ENCOUNTERED AT EASTERN SIDE WALL. WESTERN FACE OF EXCAVATION IS APPROXIMATELY 10 FEET FROM CANAL SHORE LINE.

* COMPLETED EXCAVATING SPOILS FROM INTERCEPTOR LOCATION # 2. STRONG HYDROCARBON ODOR OBSERVED. ALL EXCAVATED MATERIAL STOCKPILED ON PLASTIC TARP AND COVERED (~300 yd³). DARK, OILY LIQUID & SHEEN OBSERVED AT BOTTOM OF EXCAVATION. DUE TO THE POTENTIAL PRESENCE OF RESIDUAL AFFECTED SOIL, 6"-8" OF 4-SACK SLURRY WAS POURED INTO BOTTOM OF EXCAVATION IN PLACE OF DRAIN ROCK. DRAIN ROCK WILL BE USED TO BRING EXCAVATION BOTTOM UP TO KINAC ELEVATION

* RON BERNT POURED APPROX. 300 yd³ OF CONCRETE. REMINDED HIM SEVERAL TIMES THAT SPECS FOR CURING MUST BE FOLLOWED; AND SUBMITTED ACCEPTED (ACI) METHODS.

* AT 15:00 OBSERVED THAT SURFACE OF CONCRETE POUR WAS DRYING IN AREAS AND WAS NOT BEING KEPT ADEQUATELY WET. RON WAS TRYING TO KEEP APPROXIMATELY 12,000 ft² WET W/ A SINGLE 3/4" GARDEN HOSE. I SUGGESTED A MORE AGGRESSIVE METHOD SUCH AS SPRINKLERS. RON STATED HE COULD MANAGE IT W/ THE SINGLE HOSE. SPOKE W/ MIKE McCOY EXPLAINING MY CONCERNS AND REVIEWED WHAT THE CURING SPEC'S WERE.

TOTALIZERS ONSITE WELLS
75 FLOW METER
E.12

10 AUGUST 98 (CONT)

* PERFORMED SLUMP TEST AND COLLECTED 3 CYLINDERS TO SUBMIT FOR STRENGTH TEST

SLUMP TEST

TIME 11:15

SLUMP 5"

LOAD #16

AMBIENT TEMP ~ 82°

PES Environmental, Inc.
Engineering & Environmental Services

Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

(1) EXPOSED DRAIN PIPE AT SOUTHWEST CORNER OF AREA D FOR TIE-IN TO AREA E INTERCEPTOR (2) SCRAPE AND GRADE ROAD WAY IN AREA D (3) R-BERNT SPENT ENTIRE DAY TRYING TO KEEP 8/10 POUR DAMP AS SPEC'D (UNSUCCESSFULLY)

Equipment Used:

580 SUPER L ; DUMP TRUCK ; LOADER ; B-HOE W/ BREAKER EXCAVATOR ; WATER TRUCK

CO.

Personnel:

PES : DON SEYMOUR
DECON: JASON ; AUGUSTE : ADRIAN ; CLEMENTE ; MITCH ; ISSACE
BERNT : RON ; DAVE ; RB

Unexpected Field Conditions Encountered:

Impact To Completion Schedule:

Recorder's Initials: DJS

Date: 11 AUGUST 96

1682 Novato Boulevard • Suite 100 • Novato, California 94947 • TEL (415) 899-1600 • FAX (415) 899-1601

PES Environmental, Inc.
Engineering & Environmental Services

Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

(1) CONTINUED BREAKING CONCRETE TO TIE-IN DI #0 TO INTERCEPTOR E (2) COMPLETE TRENCHING FOR 12, 13 & 14; (3) BEGAN TRACK REMOVAL FOR TRENCHING BETWEEN DI'S #8 & 13 (4) CONTINUED GRADING AREA D ROADWAY (5) ROBERT POURED APPROX. 150 yd³ OF CONCRETE, EXTENDING 8/10 POUR APPROX 130 ft NORTH

Equipment Used:

CASE 580 SUPER L, DUMP TRUCK, LOADER, BACKHOE W/ BREAKER, EXCAVATOR, WATER TRUCK

CONCRETE PUMPER

Personnel:

PES: DON SEYMOUR
DECON: JASON; AUGUSTE, ADRIAN; CLEMENTE; MITCH; ISSACK
ROBERT; RON; DAVE; RB; RICHARD

Unexpected Field Conditions Encountered:

ENCOUNTER VARIOUS LAYERS OF CONCRETE & ASPHALT WHICH REQUIRED REMOVAL IN AREA D ROAD WAY
WATER PONDING IN AREA D ROADWAY FROM CONCRETE CURING RUN-OFF

Impact To Completion Schedule:

Recorder's Initials: DJS

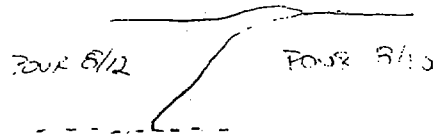
Date: August 12, 98

1682 Novato Boulevard • Suite 100 • Novato, California 94947 • TEL (415) 899-1600 • FAX (415) 899-1601

12 AUGUST 98

* SPRINKLER SYSTEM INSTALLED BY RON BRANT TO MAINTAIN SURFACE OF FIRST POUR DAMP IS PERFORMING ADEQUATELY. HOWEVER, EXCESSIVE PONDING OF WATER IS OCCURRING ON SURFACES ADJACENT TO POUR DUE TO RUNOFF FROM THE SLAB

* ALERTED MIKE McCOY OVER CONCERN OF JOINT BETWEEN 8/10 POUR & TODAYS POUR



ALSO THERE APPEAR TO BE FORM BOARDS EMBEDDED INTO 8/10 POUR AND ITS UNCLEAR HOW THEY CAN BE REMOVED

SLUMP TEST 09:20

SLUMP 8 INCHES

AMBIENT TEMP ~ 80°

THREE CYLINDERS COLLECTED 09:40

THREE CYLINDERS COLLECTED 12:00

PES Environmental, Inc.
Engineering & Environmental Services

Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

(1) DEMO CONCRETE TO TIE-IN BOX 00 TO INTERCEPTOR: (2) DIG UNDER TRACKS TO INSTALL PIPING FOR DI'S #13 & #12: (3)

Equipment Used:

CASE 580 SUPER L, JOHN DEERE 710 W/ BREAKER, EXCAVATOR LOADER, DUMP TRUCK, WATERTRUCK

Personnel:

PES: DON SEYMOUR
DECON
BERNT & SONS

Unexpected Field Conditions Encountered:

(1) ENCOUNTERED CONCRETE PAD (WEST OF TRACKS) WHICH PIPING UNDER TRACKS, REQUIRED REMOVAL W/ BREAKER
(2) EXCESSIVE PONDING ON WATER FROM SPRINKLER SYSTEM. RECOMMENDED TO RON BERNT & LRTC TO APPLY CURE COATS TO NEWLY POURED CONCRETE

Impact To Completion Schedule:

(1)

Recorder's Initials: DJS

Date: AUGUST 13, 98

1682 Novato Boulevard • Suite 100 • Novato, California 94947 • TEL (415) 899-1600 • FAX (415) 899-1601

PES Environmental, Inc.
Engineering & Environmental Services

Daily Progress Report
Levine Richmond Terminal
Upland Cap Installation

Work Performed:

(1) COMPLETED TIE-IN OF DI # 00 TO ~~EASTERN~~ AREA E INTERCEPTOR; (2) GRADING AREA D ROADWAY (3) BERNT POURED A 5,000 ft² PORTION IN AREA D, COVERED W/ CURE COVERS TO KEEP SURFACE MOIST

Equipment Used:

CASE 580 SUPER L, BACKHOE W/ BREAKER, LOADER, DUMP TRUCK

Personnel:

PES
DRION
RON BERNT & SONS

Unexpected Field Conditions Encountered:

TO AVOID EXCESSIVE CONCRETE REMOVAL, STORM SEWER PIPING FROM DI # 00 HAS AN APPROX 3" RISE TO EXISTING INTERCEPTOR TIE-IN WHICH THEN DROPS APPROX. 3 FEET OVER 15 FEET

Impact To Completion Schedule:

Recorder's Initials: DJS

Date: ~~14 AUGUST~~ 14 AUGUST 98

1682 Novato Boulevard • Suite 100 • Novato, California 94947 • TEL (415) 899-1600 • FAX (415) 899-1601

DJS

PES DAILY FIELD REPORT: 8/17/98

Work Performed, Decon

(1) Install DI # 14 and final section of storm sewer piping;
(2) Continue to break concrete foundations in northern portion of Area D swale, adjacent to proposed roadway;
(3) Excavate approximately 5 feet bgs for Interceptor No. 1; and
(4) Continue to grade swale adjacent to Area D roadway, relocate soils to Area A.

Work Performed, Bernt & Sons

(1) Installed forms and placed steel mats in preparation to pour concrete section in area D;
(2) Inspected elevations of form boards with Bernt foreman to confirm cap design elevations will be met.

Sampling/Testing Performed

No sampling performed.

Unexpected Field Conditions

(1) Additional concrete encountered below ground surface where swale is being excavated in northern portion of area D.

Questions/Comments Dick Vesperman

(1) Dick reiterated concern over area E interceptor and outfall piping. He would like information evaluating whether existing interceptor is adequate to manage anticipated flows.

DJS

PES DAILY FIELD REPORT: 18 August 1998

Work Performed, Decon

(1) Remove rail spikes and ties to complete storm sewer piping from DI 13 to DI 14.
(2) Continue to break concrete foundations in northern portion of Area D swale, adjacent to roadway; and
(4) Relocate soil and concrete from area D to area A.

Work Performed, Bernt & Sons

(1) Poured approximately 120 cubic yards of concrete in southwest portion of Area D.
(2) Removed forms from pour performed on 8/12.
(3) Began laying forms for next pour

Sampling/Testing Performed

(1) Air Monitoring: see air monitoring sample location map and air monitoring forms for air monitoring locations and sampling information.
(2) Soil sample from interceptor 1 excavation collected and submitted for analysis.
(3) Slump test performed, three cylinders collected for concrete strength test.

Unexpected Field Conditions

(1) Advance excavation for interceptor 1. Encounter buffed white material on east side of excavation. Continued excavation, but segregated suspect soils onto plastic tarp. Segregated soils covered and secured pending analytical results of soil sample collected.

Questions/Comments Dick Vesperman

(1) Informed Dick Vesperman of suspect soil and material encountered while excavating at interceptor 1 location.
(2) Mr. Vesperman concurred with the actions taken.

DSS

PES DAILY FIELD REPORT: 19 August 1998

Work Performed, Decon

(1 Continue to break concrete foundations in northern portion of Area D swale, adjacent to roadway;
(2) Complete excavation for interceptor 1, slurry bottom w/approx. 9 yards of 3 sack.
(3) Remove spike bolts, ties and rails on rail line where inspection pit is to be located.
(4) Remove large concrete foundation in N/W corner of area D so area could be graded to correct elevation.
(5) Pour slurry to backfill trench from DI 14 to rail tracks
(6) Grading along road and western perimeter of area D. Material transported to area A.

Work Performed, Bernt & Sons

(1) Continue setting forms for next pour. Next pour is scheduled for tomorrow (8/20).
(2) Confirm elevations of form boards for pour scheduled 8/20 are correct with Bent's foreman Dave.

Sampling/Testing Performed

Air sampling conducted. Air Monitoring: see air monitoring sample location map and air monitoring forms for air monitoring locations and sampling information.

Unexpected Field Conditions/Comments

None

Questions/Comments Dick Vesperman

(1) Mr. Vesperman reiterated his concern about inadequacy of interceptor in area E. Requested when a plan a schedule would be submitted for its repair/modification.

DJS

PES DAILY FIELD REPORT: 20 August 1998

Work Performed, Decon

(1) Grade areas adjacent to interceptors to prep area for crane placement
(2) Pumped accumulated water in excavation for interceptor 3 and remove sluff from bottom.
(3) Pump accumulated water in excavation for interceptor 2 into Baker Tank.
(4) LRTC/Decon transports interceptors to yard for placement in excavations.
(5) Place interceptor boxes into excavations. Set boxes with 2-sack slurry approximately 1/3 interceptor box height.
(6) Transported stockpiled soil from area D to area A.
C&S Marine repaired seawall adjacent to interceptor 1.

Work Performed, Bernt & Sons

(1) Poured approximately 160 yards of concrete in Area D.
(2) Removed form boards from previous pours.

Sampling/Testing Performed

(1) Performed slump test
(2) 2 sets of three cylinders collected for concrete strength test.

Unexpected Field Conditions/Comments

None

Questions/Comments Dick Vesperman

(1) Mr. Vesperman was present for interceptor placement. He was satisfied with the safety conditions employed during placement.

APPENDIX B

ANALYTICAL LABORATORY REPORTS AND CHAIN-OF-CUSTODY FORMS FOR STOCKPILED MATERIAL

RECEIVED JUL 0 6 1998

K PRIME, Inc.

CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 07.01.98

TO: Mr. WILL MAST
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct: 100-9418
Project: 486.0103.019

FROM: Richard A. Kagel, Ph.D. RAK 7/1/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.019" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following sample:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
GS-7	SOIL	06.25.98	15105

This sample was received in our laboratory on 06.26.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486.0103.019

SAMPLE ID: GS-7
LAB NO: 15105
SAMPLE TYPE: SOIL
DATE SAMPLED: 6/25/98
TIME SAMPLED: 09:40

METHOD: PESTICIDES
REFERENCE: EPA 8080

DATE ANALYZED: 6/29/98
UNITS: UG/KG

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	2000	ND
B-BHC	319-85-7	2000	ND
LINDANE	58-89-9	2000	ND
HEPTACHLOR	76-44-8	2000	ND
D-BHC	319-86-8	2000	ND
ALDRIN	309-00-2	2000	ND
HEPTACHLOR EPOXIDE	1024-57-3	2000	ND
ENDOSULFAN I	959-98-8	2000	ND
4,4'-DDE	72-55-9	2000	8,350
DIELDRIN	60-57-1	2000	5,720
ENDRIN	72-20-8	2000	20,700
4,4'-DDD	72-54-8	2000	ND
ENDOSULFAN II	33212-65-9	2000	ND
4,4'-DDT	50-29-3	5000	84,500
ENDRIN ALDEHYDE	7421-93-4	2000	ND
ENDOSULFAN SULFATE	1031-07-8	2000	ND
METHOXYCHLOR	72-43-5	20,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: RAK
DATE: 7/1/98

PES ENVIRONMENTAL, Inc.
Engineering & Environmental Services

CHAIN OF CUSTODY RECORD

KPI Proj # 9418

1682 NOVATO BOULEVARD, SUITE 100
NOVATO, CALIFORNIA 94947
(415) 899-1600 FAX (415) 899-1601

JOB NUMBER: 486.0103.019

NAME / LOCATION: LRTC

PROJECT MANAGER: WILL MAST

SAMPLERS: WILL MAST

RECORDER: Will Mast

DATE YR	DATE MO	DATE DY	DATE TIME	SAMPLE NUMBER / DESIGNATION	SOURCE CODE	MATRIX Water	MATRIX Sedim't	MATRIX Soil	MATRIX Oil	# CONTAINERS & PRESERV. Unpres.	H_2SO_4	HNO_3	HCl	Filtered	DEPTH IN FEET	COL MTD CD	QA CODE	EPA 601 / 8010	EPA 602 / 8020 (BTEX)	EPA 624 / 8240	EPA 625 / 8270	TPHg by 5030 / 8015 (mod)	TPHd by 3550 / 8015 (mod)	PEST. by 8080	SPL #
98	06	25	0940	G3-7				X		4														X	15705

NOTE

Composite for one sample
Standard TAT

CHAIN OF CUSTODY RECORD

RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
Will Mast	Roger Hall	6-26-98	900
Roger Hall	Roger Brewer	6-26-98	1pm

DISPATCHED BY: (Signature)	DATE	TIME	RECEIVED FOR LAB BY: (Signature)	DATE	TIME

METHOD OF SHIPMENT:

NOV 2 4 1998

K PRIME, Inc.

CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 11.19.98

TO: Mr. BILL FRIZZELL
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct.: 9418
Project: "486.0103.019"

FROM: Richard A. Kagel, Ph.D. RAK 11/19/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.019" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
SPB-1	SOIL	11.13.98	17874
SPB-2	SOIL	11.13.98	17875
SPC-1	SOIL	11.13.98	17876
SPC-2	SOIL	11.13.98	17877
SPD-1	SOIL	11.13.98	17878
SPD-2	SOIL	11.13.98	17879

These samples were received in our laboratory on 11.14.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486.0103.019

METHOD: ORGANOCHLORINE PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: SPB-1,2*
LAB NO: 17874-17875*
SAMPLE TYPE: SOIL
DATE SAMPLED: 11/13/98
TIME SAMPLED: 12:20

DATE EXTRACTED: 11/15/98
DATE ANALYZED: 11/18/98

UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	25,000	ND
B-BHC	319-85-7	25,000	ND
LINDANE	58-89-9	25,000	ND
HEPTACHLOR	76-44-8	25,000	ND
D-BHC	319-86-8	25,000	ND
ALDRIN	309-00-2	25,000	ND
HEPTACHLOR EPOXIDE	1024-57-3	25,000	ND
ENDOSULFAN I	959-98-8	25,000	ND
4,4'-DDE	72-55-9	50,000	ND
DIELDRIN	60-57-1	50,000	ND
ENDRIN	72-20-8	50,000	ND
4,4'-DDD	72-54-8	50,000	216,000
ENDOSULFAN II	33212-65-9	50,000	ND
4,4'-DDT	50-29-3	50,000	537,000
ENDRIN ALDEHYDE	7421-93-4	50,000	ND
ENDOSULFAN SULFATE	1031-07-8	50,000	ND
METHOXYCHLOR	72-43-5	250,000	ND
CHLORDANE	57-74-9	250,000	ND
TOXPHENE	8001-35-2	500,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE
* - THIS SAMPLE RESULT IS FOR A COMPOSITE OF TWO SOIL SAMPLES

APPROVED BY: BAK
DATE: 11/19/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486.0103.019

METHOD: ORGANOCHLORINE PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: SPC-1,2*
LAB NO: 17876-17877*
SAMPLE TYPE: SOIL
DATE SAMPLED: 11/13/98
TIME SAMPLED: 12:30

DATE EXTRACTED: 11/15/98
DATE ANALYZED: 11/18/98

UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	2,500	ND
B-BHC	319-85-7	2,500	ND
LINDANE	58-89-9	2,500	ND
HEPTACHLOR	76-44-8	2,500	ND
D-BHC	319-86-8	2,500	ND
ALDRIN	309-00-2	2,500	ND
HEPTACHLOR EPOXIDE	1024-57-3	2,500	ND
ENDOSULFAN I	959-98-8	2,500	ND
4,4'-DDE	72-55-9	5,000	ND
DIELDRIN	60-57-1	5,000	ND
ENDRIN	72-20-8	5,000	ND
4,4'-DDD	72-54-8	5,000	14,400
ENDOSULFAN II	33212-65-9	5,000	ND
4,4'-DDT	50-29-3	5,000	23,000
ENDRIN ALDEHYDE	7421-93-4	5,000	ND
ENDOSULFAN SULFATE	1031-07-8	5,000	ND
METHOXYCHLOR	72-43-5	25,000	ND
CHLORDANE	57-74-9	25,000	ND
TOXPHENE	8001-35-2	50,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE
* - THIS SAMPLE RESULT IS FOR A COMPOSITE OF TWO SOIL SAMPLES

APPROVED BY: RAK
DATE: 11/19/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486.0103.019

METHOD: ORGANOCHLORINE PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: SPD-1,2*
LAB NO: 17878-17879*
SAMPLE TYPE: SOIL
DATE SAMPLED: 11/13/98
TIME SAMPLED: 12:40

DATE EXTRACTED: 11/15/98
DATE ANALYZED: 11/18/98

UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	12,500	ND
B-BHC	319-85-7	12,500	ND
LINDANE	58-89-9	12,500	ND
HEPTACHLOR	76-44-8	12,500	ND
D-BHC	319-86-8	12,500	ND
ALDRIN	309-00-2	12,500	ND
HEPTACHLOR EPOXIDE	1024-57-3	12,500	ND
ENDOSULFAN I	959-98-8	12,500	ND
4,4'-DDE	72-55-9	25,000	ND
DIELDRIN	60-57-1	25,000	ND
ENDRIN	72-20-8	25,000	ND
4,4'-DDD	72-54-8	25,000	43,100
ENDOSULFAN II	33212-65-9	25,000	ND
4,4'-DDT	50-29-3	25,000	77,400
ENDRIN ALDEHYDE	7421-93-4	25,000	ND
ENDOSULFAN SULFATE	1031-07-8	25,000	ND
METHOXYCHLOR	72-43-5	125,000	ND
CHLORDANE	57-74-9	125,000	ND
TOXPHENE	8001-35-2	250,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE
* - THIS SAMPLE RESULT IS FOR A COMPOSITE OF TWO SOIL SAMPLES

APPROVED BY: RAK
DATE: 11/19/98

PES ENVIRONMENTAL, Inc.
Engineering & Environmental Services

CHAIN OF CUSTODY RECORD

1682 NOVATO BOULEVARD, SUITE 100
NOVATO, CALIFORNIA 94947
(415) 899-1600 FAX (415) 899-1601

KPI Proj # 9418

JOB NUMBER: 486.0103.019
NAME / LOCATION: LRTC
PROJECT MANAGER: W. FRIZZELL

SAMPLERS: W. MAST
RECORDER: W. Mast

DATE YR	MO	DY	TIME	SAMPLE NUMBER / DESIGNATION	SOURCE CODE	MATRIX Water	Sedim't	Soil	Oil	# CONTAINERS & PRESERV. Unpres.	H_2SO_4	HNO_3	HCl	Filtered	KPI#	DEPTH IN FEET	COL MTD CD	QA CODE	EPA 601 / 8010	EPA 602 / 8020 (BTEX)	EPA 624 / 8240	EPA 625 / 8270	TPHg by 5030 / 8015 (mod)	TPHd by 3550 / 8015 (mod)	EPA 8080	
98	11	13	1220	SPB-1	49			X		1					17874		10								X	COMPOSITE
			1220	SPB-2											17875											
			1230	SPC-1											17876										X	COMPOSITE
			1230	SPC-2											17877											
			1240	SPD-1											17878										X	COMPOSITE
			1240	SPD-2											17879											

NOTE

5-DAY TAT

CHAIN OF CUSTODY RECORD

RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
W. Mast	[signature]	11-13-98	19:40
[signature]	[signature]	11/14/98	9:42

DISPATCHED BY: (Signature)	DATE	TIME	RECEIVED FOR LAB BY: (Signature)	DATE	TIME

METHOD OF SHIPMENT:

K PRIME, Inc.

CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

RECEIVED FEB 17 1999

TRANSMITTAL

DATE: 01.27.99

TO: Mr. WILL MAST
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct.: 9418
Project: "486.0103.019"

FROM: Richard A. Kagel, Ph.D. RAK 1/27/99
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.019" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
B1	SOIL	01.15.98	19008
B2	SOIL	01.15.98	19009
B3	SOIL	01.15.98	19010
B4	SOIL	01.15.98	19011
C1	SOIL	01.15.98	19012
C2	SOIL	01.15.98	19013
C3	SOIL	01.15.98	19014
C4	SOIL	01.15.98	19015

These samples were received in our laboratory on 01.18.99 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486.0103.019

METHOD: ORGANOCHLORINE PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: B1,B2,B3,B4*
LAB NO: 19008-19011*
SAMPLE TYPE: SOIL
DATE SAMPLED: 1/15/99
TIME SAMPLED: 11:49-12:00

DATE EXTRACTED: 1/18/99
DATE ANALYZED: 1/20/99

UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	1,000	ND
B-BHC	319-85-7	1,000	ND
LINDANE	58-89-9	1,000	ND
HEPTACHLOR	76-44-8	1,000	ND
D-BHC	319-86-8	1,000	ND
ALDRIN	309-00-2	1,000	ND
HEPTACHLOR EPOXIDE	1024-57-3	1,000	ND
ENDOSULFAN I	959-98-8	1,000	ND
4,4'-DDE	72-55-9	2,000	2,270
DIELDRIN	60-57-1	2,000	ND
ENDRIN	72-20-8	2,000	ND
4,4'-DDD	72-54-8	2,000	6,190
ENDOSULFAN II	33212-65-9	2,000	ND
4,4'-DDT	50-29-3	2,000	7,500
ENDRIN ALDEHYDE	7421-93-4	2,000	ND
ENDOSULFAN SULFATE	1031-07-8	2,000	ND
METHOXYCHLOR	72-43-5	10,000	ND
CHLORDANE	57-74-9	10,000	ND
TOXPHENE	8001-35-2	20,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE
* - THIS SAMPLE RESULTS IS FOR A COMPOSITE OF FOUR SAMPLES

APPROVED BY: RMK
DATE: 1/27/99

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486.0103.019

METHOD: ORGANOCHLORINE PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: C1,C2,C3,C4*
LAB NO: 19012-19015*
SAMPLE TYPE: SOIL
DATE SAMPLED: 1/15/99
TIME SAMPLED: 12:09-12:15

DATE EXTRACTED: 1/18/99
DATE ANALYZED: 1/20/99

UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	2,500	ND
B-BHC	319-85-7	2,500	ND
LINDANE	58-89-9	2,500	ND
HEPTACHLOR	76-44-8	2,500	ND
D-BHC	319-86-8	2,500	ND
ALDRIN	309-00-2	2,500	ND
HEPTACHLOR EPOXIDE	1024-57-3	2,500	ND
ENDOSULFAN I	959-98-8	2,500	ND
4,4'-DDE	72-55-9	5,000	6,790
DIELDRIN	60-57-1	5,000	ND
ENDRIN	72-20-8	5,000	ND
4,4'-DDD	72-54-8	5,000	19,300
ENDOSULFAN II	33212-65-9	5,000	ND
4,4'-DDT	50-29-3	5,000	24,300
ENDRIN ALDEHYDE	7421-93-4	5,000	ND
ENDOSULFAN SULFATE	1031-07-8	5,000	ND
METHOXYCHLOR	72-43-5	25,000	ND
CHLORDANE	57-74-9	25,000	ND
TOXPHENE	8001-35-2	50,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE
* - THIS SAMPLE RESULTS IS FOR A COMPOSITE OF FOUR SAMPLES

APPROVED BY: RAK
DATE: 1/27/99

PES ENVIRONMENTAL, Inc.
Engineering & Environmental Services

CHAIN OF CUSTODY RECORD

KFI Proj 9418

1682 NOVATO BOULEVARD, SUITE 100
NOVATO, CALIFORNIA 94947
(415) 899-1600 FAX (415) 899-1601

JOB NUMBER: 486.0103.019

NAME / LOCATION: LRTC

PROJECT MANAGER: Will Mast

SAMPLERS: James Allen

RECORDER: JRA

DATE YR	DATE MO	DATE DY	DATE TIME	SAMPLE NUMBER / DESIGNATION	SOURCE CODE	MATRIX Water	MATRIX Sedim't	MATRIX Soil	MATRIX Oil	# CONTAINERS & PRESERV. Unpres.	H_2SO_4	HNO_3	HCl	Filtered	DEPTH IN FEET KFI #	COL MTD CD	QA CODE	EPA 601 / 8010	EPA 602 / 8020 (BTEX)	EPA 624 / 8240	EPA 625 / 8270	TPHg by 5030 / 8015 (mod)	TPHd by 3550 / 8015 (mod)	EPA 8080 (Pesticides)	
99	01	15	1149	B1	48			X		X					19008	10	10							X	
99	01	15	1152	B2	48			X		X					19009	10	10							X	COMPOSITE
99	01	15	1153	B3	48			X		X					19010	10	10							X	
99	01	15	1200	B4	48			X		X					19011	10	10							X	
99	01	15	1209	C1	48			X		X					19012	10	10							X	
99	01	15	1211	C2	48			X		X					19013	10	10							X	
99	01	15	1214	C3	48			X		X					19014	10	10							X	COMPOSITE
99	01	15	1215	C4	48			X		X					19015	10	10							X	

NOTE

Standard TAT

Composite to 2 analyses

CHAIN OF CUSTODY RECORD

RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
James Allen	C Kagel	1/18/99	1235
RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
DISPATCHED BY: (Signature) / DATE / TIME	RECEIVED FOR LAB BY: (Signature)	DATE	TIME

METHOD OF SHIPMENT: K-Prime Courier

K PRIME, Inc.

CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 06.17.98

TO: Mr. WILL MAST
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct: 100-9418
Project: 486.0103.019

FROM: Richard A. Kagel, Ph.D. RAK 6/17/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.019" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following sample:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
615AS1	ASPHALT	06.15.98	15041

This sample was received in our laboratory on 06.15.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486.0103.019

SAMPLE ID: 615AS1
LAB NO: 15041
SAMPLE TYPE: ASPHALT
DATE SAMPLED: 6/15/98
TIME SAMPLED: 11:30

METHOD: PESTICIDES
REFERENCE: EPA 8080

DATE ANALYZED: 6/16/98
UNITS: UG/KG

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	500	ND
B-BHC	319-85-7	500	ND
LINDANE	58-89-9	500	ND
HEPTACHLOR	76-44-8	500	ND
D-BHC	319-86-8	500	ND
ALDRIN	309-00-2	500	ND
HEPTACHLOR EPOXIDE	1024-57-3	500	ND
ENDOSULFAN I	959-98-8	500	ND
4,4'-DDE	72-55-9	500	ND
DIELDRIN	60-57-1	500	ND
ENDRIN	72-20-8	500	ND
4,4'-DDD	72-54-8	500	ND
ENDOSULFAN II	33212-65-9	500	ND
4,4'-DDT	50-29-3	500	ND
ENDRIN ALDEHYDE	7421-93-4	500	ND
ENDOSULFAN SULFATE	1031-07-8	500	ND
METHOXYCHLOR	72-43-5	5,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: ck
DATE: 6/17/98

PES ENVIRONMENTAL, Inc.
Engineering & Environmental Services

CHAIN OF CUSTODY RECORD

1682 NOVATO BOULEVARD, SUITE 100
NOVATO, CALIFORNIA 94947
(415) 899-1600 FAX (415) 899-1601

KPI PROJ # 9418

SAMPLERS: WILL MAST

JOB NUMBER: 486.0103.019

NAME / LOCATION: LRTC RICHMOND CA

PROJECT MANAGER: WILL MAST

RECORDER: Will Mast

DATE YR	MO	DY	TIME	SAMPLE NUMBER / DESIGNATION	SOURCE CODE	MATRIX: Asphalt	Water	Sedim't	Soil	Oil	# CONTAINERS & PRESERV.: Unpres.	H_2SO_4	HNO_3	HCl	Filtered	DEPTH IN FEET	COL MTD CD	QA CODE	ANALYSIS REQUESTED: EPA 601 / 8010	EPA 602 / 8020 (BTEX)	EPA 624 / 8240	EPA 625 / 8270	TPHg by 5030 / 8015 (mod)	TPHd by 3550 / 8015 (mod)	EPA 8080	KPI SPL #
06	15	98	1130	615AS1		X					1					0	10								X	15041

RECEIVED JUN 1 3 1998

NOTE
24-HOUR TAT

CHAIN OF CUSTODY RECORD

RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
Will Mast	Robert S. [illegible]	6/15/98	4:55pm
Robert S. [illegible]			

DISPATCHED BY: (Signature)	DATE	TIME	RECEIVED FOR LAB BY: (Signature)	DATE	TIME
			Ginger Brisbee	15 Jun 98	1755

METHOD OF SHIPMENT:

APPENDIX C

FIELD DENSITY TESTING RESULTS

(2)

SHEET 1 OF

PROJECT: LRTC / Levine Richmond Terminal Corp. JOB NO.:

SUBJECT: SUMMARY OF FIELD DENSITY TEST DATA BY: Tom Lian

	TEST NO. (1)	LOCATION (By street & station or by coordinates) (2)	Depth or elevation (feet) (3)	Moisture Content (Percent)	Dry Density (pcf)	Maximum Dry Density (pcf) (4)	Degree of Compact. (Percent)	REMARKS: (Indicate satisfactory retest number opposite failing test; indicate nuclear tests)
8/18	1	20'S, 64'W	10.5	7.4	123.0	132	93	OK, Need ≥90% R.C.
	2	22'S, 141'W	8.5	6.5	126.8	132	96	
	3	41'S, 71'W	10.5	12.9	112.9	120	94	
	4	28'S, 190'W	8.5	7.5	120.0	132	91	
	5	118'S, 237'W	8.5	7.1	127.4	132	97	
8/24	6	113'S, 160'W	8.5	8.5	111.9	120	93	
	7	15'S, 166'W	8.0	12.0	104.8	120	87	Fail Need 90%, Removed
	8	13'S, 172'W	8.0	10.6	105.5	120	88	by excavation 8/26/98
	9	98'S, 171'W	9.0	10.9	127.5	132	97	ok, need ≥90% RC
	10	102'S, 71'W	9.0	8.1	121.0	132	92	
	11	33'S, 162'W	9.5	12.5	112.5	120	94	
	12	36'S, 135'W	9.5	~~11.7~~ 12.2	118.2	132	90	
8/26	13	75'S, 124'W	9.5	6.6	131.3	132	99	
	14	83'S, 110'W	10.0	7.1	126.2	132	96	
	15	72'S, 91'W	10.5	6.8	120.9	132	92	
8/27	16	12'S, 181'W	8.5	11.4	117.0	132	89	ok, rerolled
	17	17'S, 177'W	8.5	9.4	117.6	132	89	ok, rerolled
	18	92'S, 243'W	8.5	12.7	119.6	132	91	ok need ≥90% RC
8/28	19	57'S, 221'W	8.5	9.0	118.4	132	90	
	20	30'S, 206'W	9.0	9.3	121.2	132	92	

(1.) Suffix: S - Subgrade, SB - Subbase, B - Baserock, G - Gas Trench, W - Water Trench, SS - Sanitary Sewer Trench, SD - Storm Drain Trench, E - Electric Trench.

(2.) Origin of Coordinates: NE fence corner - See ANWest Sheet C-2
Show origin on plan; plot all tests in red pencil.

(3.) Indicate Datum: Elevation: DI+73 on ANWest C-2 DI+73 → Rim 6.2' MSL ; Depth:

(4.) Maximum Dry Density established in our laboratory in accordance with the ~~ASTM D 1557-91~~ ASTM D 1557-91 compaction test method.

UF 5

SHEET 2 OF

PROJECT: LRTC JOB NO.:

SUBJECT: *SUMMARY OF FIELD DENSITY TEST DATA* BY: Tom Lion

	TEST NO. (1)	LOCATION* (By street & station or by coordinates) ('S , 'W) (2)	Depth or elevation (feet) (3)	Moisture Content (Percent)	Dry Density (pcf)	Maximum Dry Density (pcf) (4)	Degree of Compact. (Percent)	REMARKS: (Indicate satisfactory retest number opposite failing test; indicate nuclear tests)
8/28	21	20' S, 185' W	10.5	10.9	125.0	132	95	Ok, Need ≥90% R.C.
9/4	22	55' S, 120' W	10.5	27.9	99.1	108	92	
	23	115' S, 220' W	10.5	31.6	100.8	108	93	
	24	80' S, 210' W	11.0	24.9	105.2	108	97	
	25	70' S, 175' W	11.0	28.1	108.0	108	100	
	26	35' S, 105' W	11.0	23.8	100.3	108	93	
	27	65' S, 105' W	11.0	25.1	99.7	108	92	
	28	60' S, 85' W	11.0	22.9	102.4	108	95	
9/8	29	35' S, 45' W	11.0	12.6	115.1	127	91	
	30	40' S, 70' W	11.0	13.9	117.3	120	92	
	31	75' S, 70' W	11.0	5.0	119.1	127	94	
	32	75' S, 50' W	11.0	15.4	110.4	120	92	
	33	60' S, 160' W	11.5	12.1	104.7	120	87	Fail, Need ≥90%, See FDT#
	34	80' S, 155' W	11.5	13.2	111.0	120	93	ok, Need ≥90% R.C.
9/9	35	55' S, 195' W	11.5	9.1	116.0	127	91	
	36	40' S, 180' W	11.5	8.4	115.5	127	91	
	37	100' S, 185' W	11.0	12.2	113.9	120	95	
	38	100' S, 220' W	11.0	11.4	111.1	120	93	
	39	115' S, 180' W	11.0	9.4	117.2	127	92	
9/10	40	90' S, 180' W	11.5	8.7	122.6	127	97	

(1.) Suffix: S - Subgrade, SB - Subbase, B - Baserock, G - Gas Trench, W - Water Trench, SS - Sanitary Sewer Trench, SD - Storm Drain Trench, E - Electric Trench.

*(2.) Origin of Coordinates: NE Fence Corner - See AN West C-2
Show origin on plan; plot all tests in red pencil.

(3.) Indicate Datum: Elevation: DI+B on AN West C-2 ; Depth:

(4.) Maximum Dry Density established in our laboratory in accordance with the ASTM D 1557-91 compaction test method.

FF 5

PROJECT: LRTC JOB NO.:

SUBJECT: SUMMARY OF FIELD DENSITY TEST DATA BY: Tom Liau

TEST NO. (1)	LOCATION (By street & station or by coordinates) (2)	Depth or elevation (feet) (3)	Moisture Content (Percent)	Dry Density (pcf)	Maximum Dry Density (pcf) (4)	Degree of Compact (Percent)	REMARKS: (Indicate satisfactory retest number opposite failing test; indicate nuclear tests)
41	65'S, 145'W	12.5	9.7	122.2	127	96	OK, Need ≥90% R.C.
42	40'S, 160'W	12.5	8.8	122.5	127	97	
43	30'S, 100'W	12.5	5.1	116.0	127	91	
44	30'S, 120'W	12.5	6.4	120.5	127	95	
45	65'S, 40'W	12.5	8.9	121.8	127	96	
46	50'S, 65'W	12.5	12.0	124.0	127	98	
47	30'S, 35'W	12.5	10.2	126.0	127	99	
48	85'S, 165'W	12.0	10.6	119.5	127	94	94% R.C.
49	60'S, 180'W	12.5	10.3	129.3	132	99	99% R.C.
50	90'S, 200'W	12.0	12.2	115.8	127	91	91% R.C.
51	135'S, 185'W	8.5	7.1	110.0	127	86.6	87 R.C. Fail, Need ≥90%, See FDT#
52	115'S, 205'W	13.5	12.9	121.4	127	96	OK, Need ≥90% RC
53	85'S, 230'W	12.5	17.4	116.3	127	92	
54	55'S, 210'W	14.0	13.4	120.4	127	95	
55	130'S, 180'W	8.5	13.3	120.4	127	95	Retest of #51, OK
56	105'S, 150'W	12.0	13.0	121.1	127	95	
57	95'S, 95'W	14.0	12.7	123.3	127	97	
58	20'S, 115'W	14.0	12.0	124.1	127	98	
59	50'S, 45'W	14.0	13.4	121.3	127	96	
60	30'S, 80'W	14.0	16.6	114.7	127	90	

(1.) Suffix: S - Subgrade, SB - Subbase, B - Baserock, G - Gas Trench, W - Water Trench, SS - Sanitary Sewer Trench, SD - Storm Drain Trench, E - Electric Trench.

(2.) Origin of Coordinates: North East Fence Corner - See AN West Sheet C-2
Show origin on plan; plot all tests in red pencil.

(3.) Indicate Datum: Elevation: DT#13 on AN West C-2 ~~ATM~~; Depth:

(4.) Maximum Dry Density established in our laboratory in accordance with the D 1557-91 compaction test method.

TFS

SHEET 4 OF 4

PROJECT: LRTC JOB NO.:

SUBJECT: SUMMARY OF FIELD DENSITY TEST DATA BY: Tom Lion

TEST NO. (1)	LOCATION (By street & station or by coordinates) (2)	Depth or elevation (feet) (3)	Moisture Content (Percent)	Dry Density (pcf)	Maximum Dry Density (pcf) (4)	Degree of Compact. (Percent)	REMARKS: (Indicate satisfactory retest number opposite failing test; indicate nuclear tests)
61	150'S, 110'W	10.5	13.7	117.4	127	92	OK, Need ≥90% R.C.
62	120'S, 225'W	13.0	12.5	118.4	127	93	
63	55'S, 30'W	13.0	11.9	121.4	127	96	
11/3 64	116'S, 175'W	14.0	10.2	120.9	132	92	
65	105'S, 135'W	14.5	9.6	124.7	132	94	
66	110'S, 100'W	14.0	10.5	122.5	132	93	

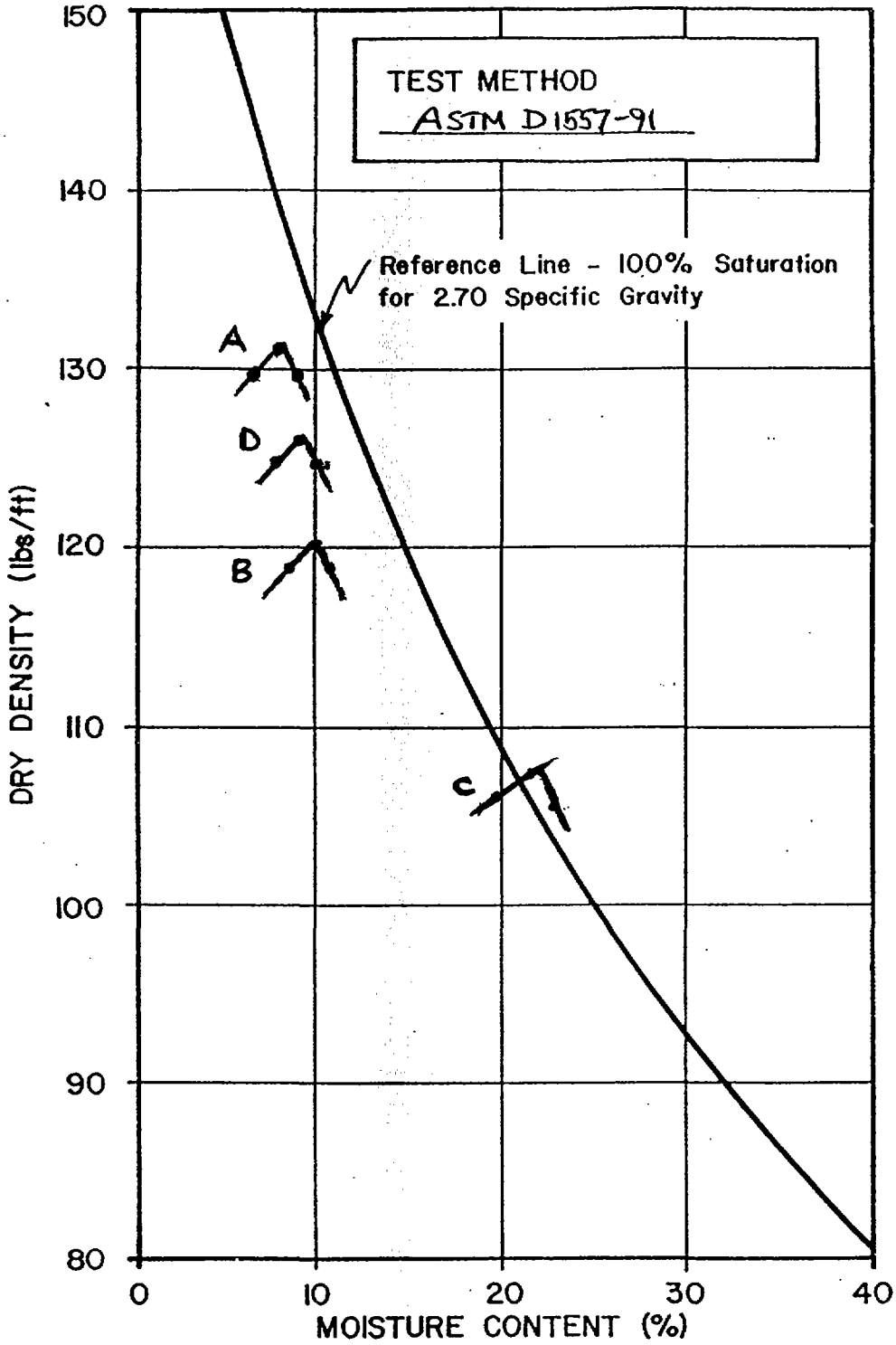
(1.) Suffix: S - Subgrade, SB - Subbase, B - Baserock, G - Gas Trench, W - Water Trench, SS - Sanitary Sewer Trench, SD - Storm Drain Trench, E - Electric Trench.

(2.) Origin of Coordinates: NE fence corner
Show origin on plan; plot all tests in red pencil.

(3.) Indicate Datum: Elevation: DL + 73 elev rim 6.2' MSL; Depth:

(4.) Maximum Dry Density established in our laboratory in accordance with the ASTM D1557-91 compaction test method.

TF 5



Symbol	Sample Source	Classification	Optimum Moisture (%)	Maximum Dry Density (pcf
A	Onsite Fill-Gravels	GREY SANDY GRAVEL (GP)	8.0	132
B	Onsite Fill-Bauxite	ORANGE & WHITE GRAVELLY SAND (SP)	10.5	120
C	Native Bay Mud w/Gravel	DARK GREY SANDY CLAY (CH)	22.0	108
D	Mixture of A & B	ORANGE & GREY SANDY GRAVEL w/gravels (GP)	9.5	127

PGS Environmental, Inc.
Testing by Tom Lion

Job No:

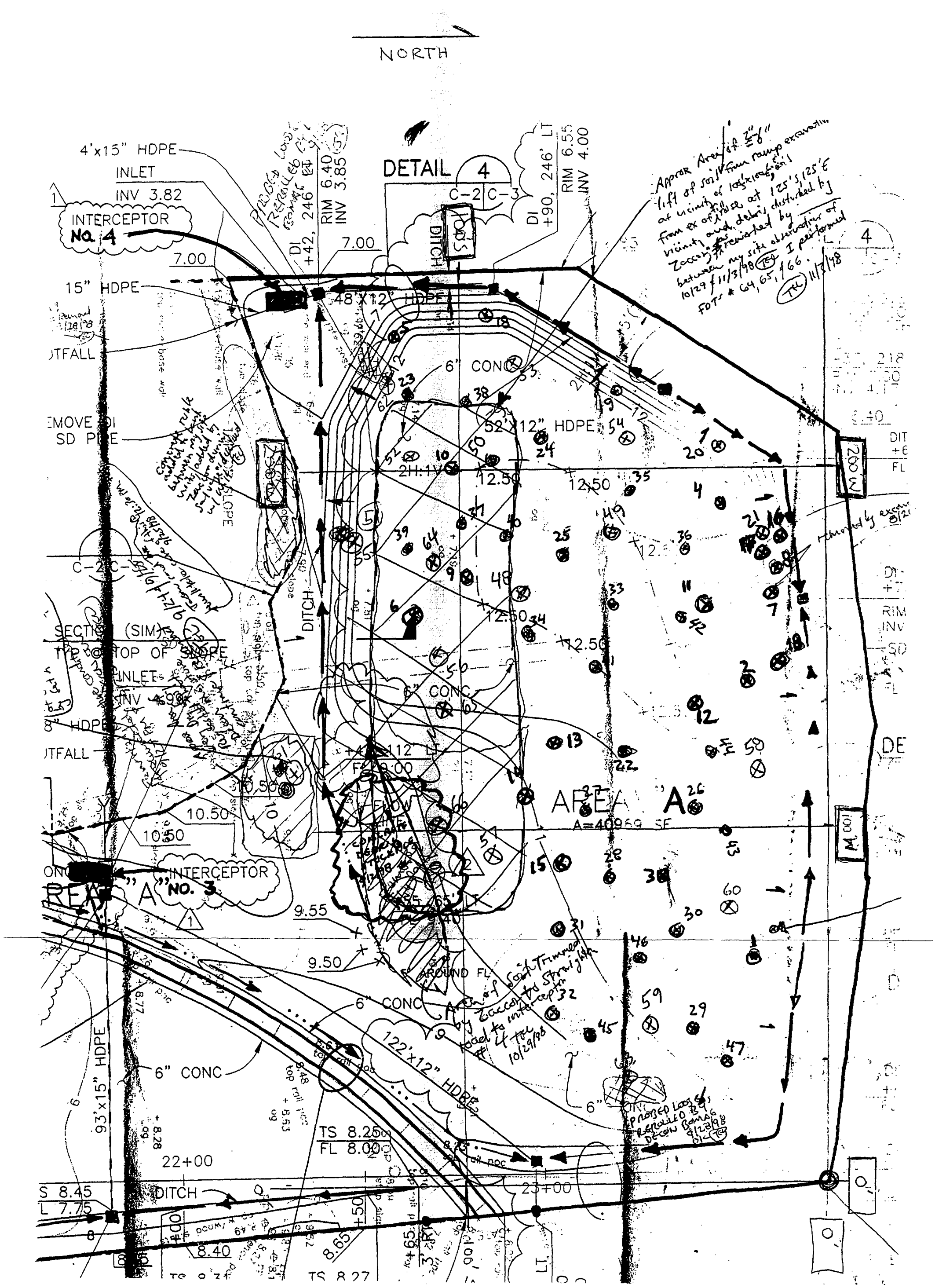
Appr: by Tom Lion

Date: 11/30/98

COMPACTION TEST DATA

LRTC
Richmond, CA

PLATE


NORTH
DETAIL 4
4'x15" HDPE
INLET
INV 3.82
INTERCEPTOR
No. 4
7.00
15" HDPE
48'X12" HDPE
6" CONC
52'X12" HDPE
2H:1V
12.50
DITCH
SLOPE
SECTION (SIM)
TYP @ TOP OF SLOPE
INLET
INV
8" HDPE
OUTFALL
10.50
INTERCEPTOR
NO. 3
AREA "A"
A=40969 SF
FLOW
9.55
9.50
5' AROUND FL
6" CONC
122'X12" HDPE
93'x15" HDPE
TS 8.25
FL 8.00
22+00
23+00
DITCH
TS 8.45
FL 7.75
8.40
8.65
TS 8.27
RIM 6.40
INV 3.85
DI +42, 246' RT
RIM 6.55
INV 4.00
DI +90, 246' LT
C-2
C-3
4

APPENDIX D

WASTE DISPOSAL MANIFESTS

State of California—Environmental Protection Agency
Form Approved OMB No. 2050-0039 (Expires 9-30-99)
Please print or type. Form designed for use on elite (12-pitch) typewriter.

See Instructions on back of page 6.

Department of Toxic Substances C
Sacramento, California

UNIFORM HAZARDOUS WASTE MANIFEST

1. Generator's US EPA ID No. CAD980673560
Manifest Document No. 2836B
2. Page 1 of 1

Information in the shaded areas is not required by Federal law.

3. Generator's Name and Mailing Address
Levine - Richmond Terminal Corporation
402 Wright Avenue
Richmond, CA 94804-3532
4. Generator's Phone (510) 232-4422

A. State Manifest Document Number 9819592
B. State Generator's ID

5. Transporter 1 Company Name
DECON Environmental Services, Inc.
6. US EPA ID Number CAD982468183
C. State Transporter's ID
D. Transporter's Phone (510) 732-6444

7. Transporter 2 Company Name
Ecology Control Industries
8. US EPA ID Number CAD982030173
E. State Transporter's ID
F. Transporter's Phone (510) 235-1393

9. Designated Facility Name and Site Address
Clean Harbors Environmental Services, Inc.; 5 mi. South of Kimball on Hwy 71
Kimball NE 69145
10. US EPA ID Number NED981723513
G. State Facility's ID NED981723513
H. Facility's Phone (308) 235-4012

11. US DOT Description (including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	Type	13. Total Quantity	14. Unit Wt/Vol	I. Waste Number
a. Hazardous waste liquid, n.o.s. (D012, D018), NA3082, III	002	DM	00110	G	State 341 / EPA/Other D012 D
b.					State / EPA/Other
c.					State / EPA/Other
d.					State / EPA/Other

J. Additional Descriptions for Materials Listed Above
a. CH129513: ERG-171

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

15. Special Handling Instructions and Additional Information
40hr OSHA trained handlers should use NIOSH approved safety equipment. 24hr ER# (510) 475-2901
Site: same as above

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

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

GENERATOR — Printed/Typed Name: Mike McCoy — Signature: Mike McCoy — Month 09 Day 25 Year 98

TRANSPORTER
17. Transporter 1 Acknowledgement of Receipt of Materials
Printed/Typed Name: Jim Brooks — Signature: Jim Brooks — Month 09 Day 25 Year 98
18. Transporter 2 Acknowledgement of Receipt of Materials
Printed/Typed Name: CHRIS WISE — Signature: Chris Wise — Month 09 Day 26 Year 98

FACILITY
19. Discrepancy Indication Space
Discrepancy D001 applies 134F @ CH.
20. Facility Owner or Operator Certification of receipt of hazardous materials covered by this manifest except as noted in Item 19.
Printed/Typed Name — Signature — Month Day Year

DO NOT WRITE BELOW THIS LINE.

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

9819592

DTSC 8022A (4/97)
EPA 8700-22

White: TSDF SENDS THIS COPY TO DTSC WITHIN 30 DAYS
To: P.O. Box 3000, Sacramento, CA 95812

State of California—Environmental Protection Agency
Form Approved OMB No. 2050-0039 (Expires 9-30-99)
Please print or type. Form designed for use on elite (12-pitch) typ[illegible]er.

See Instructions on back of p[illegible]e 6. 974023

Department of Toxic Substances Cont[illegible]
Sacramento, California

UNIFORM HAZARDOUS WASTE MANIFEST

1. Generator's US EPA ID No.: CAD980673560
Manifest Document No.:
2. Page 1 of 1
Information in the shaded areas is not required by Federal law.

3. Generator's Name and Mailing Address: Levin Richmond Terminal, 402 Wright Ave. — Richmond, Calif.
4. Generator's Phone: (510) 232-4422

A. State Manifest Document Number: 96633521
B. State Generator's ID:
C. State Transporter's ID:
D. Transporter's Phone: (925) 687-1292 ~~510-235-1393~~
E. State Transporter's ID:
F. Transporter's Phone:
G. State Facility's ID: CAD009466392
H. Facility's Phone: 510-235-1393

5. Transporter 1 Company Name: DEXANNA ~~Ecology Control Industries~~
6. US EPA ID Number: CAD982438566 ~~CAD982030173~~
7. Transporter 2 Company Name:
8. US EPA ID Number:
9. Designated Facility Name and Site Address: ERICKSON INC., 255 PARR BLVD, RICHMOND, CA 94801
10. US EPA ID Number: CAD009466392

11. US DOT Description (including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	Type	13. Total Quantity	14. Unit Wt/Vol	I. Waste Number
WASTE EMPTY STORAGE TANK Non-RCRA hazardous waste solid	001	TP	01000	P	State 512; EPA/Other NONE
b.					State; EPA/Other
c.					State; EPA/Other
d.					State; EPA/Other

J. Additional Descriptions for Materials Listed Above
QTY. 1 EMPTY STORAGE TANK(S) # 23734 — — — TANK(S) HAVE BEEN INERTED WITH 15 LBS DRY ICE PER 1000 GALLONS CAPACITY

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

15. Special Handling Instructions and Additional Information
Wear appropriate protective clothing when handling. SITE LOCATION: 402 Wright Ave. Richmond Cal
24 Hour Emergency Telephone Number: (510) 475-2901 (DeCon)
24 Hour Emergency Contact: ~~Mike McCoy~~ (Answering Service DeCon) ERG 17

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

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

Printed/Typed Name: Mike McCoy
Signature: [signature]
Month Day Year: 08 28 98

17. Transporter 1 Acknowledgement of Receipt of Materials
Printed/Typed Name: James R. Cox
Signature: James R. Cox
Month Day Year: 08 28 98

18. Transporter 2 Acknowledgement of Receipt of Materials
Printed/Typed Name:
Signature:
Month Day Year:

19. Discrepancy Indication Space
1. MANIFEST DOCUMENT NUMBER MISSING

20. Facility Owner or Operator Certification of receipt of hazardous materials covered by this manifest except as noted in Item 19.
Printed/Typed Name: DAVID SATO
Signature: DAVE SATO
Month Day Year: 08 28 98

GENERATOR — TRANSPORTER — FACILITY

IN CASE OF EMERGENCY OR SPILL, CALL THE NATIONAL RE[illegible]SE CENTER 1-800-424-8802; WITHIN CALIFORNIA, CALL 1-800-852-75[illegible]

96633521

DO NOT WRITE BELOW THIS LINE.

DTSC 8022A (4/97)
EPA 8700—22

White: TSDF SENDS THIS COPY TO DTSC WITHIN 30 DAYS.
To: P.O. Box 3000, Sacramento, CA 95812

DAY OR NIGHT
TELEPHONE
(510) 235-1393

CERTIFICATE
CERTIFIED SERVICES COMPANY

255 Parr Boulevard • Richmond, California 94801

NO. 2889

CUSTOMER

JOB NO. 974023
DECON ENV.

FOR: ERICKSON, INC. TANK NO. 23734

LOCATION: RICHMOND, CA DATE: 9/14/98 TIME: 11:38:46

TEST METHOD VISUAL GASTECH/1314 SMPN LAST PRODUCT PESTICIDE

This is to certify that I have personally determined that this tank is in accordance with the American Petroleum Institute and have found the condition to be in accordance with its assigned designation. This certificate is based on conditions existing at the time the inspection herein set forth was completed and is issued subject to compliance with all qualifications and instructions.

TANK SIZE 1,000 GALLON TANK CONDITION SAFE FOR FIRE

REMARKS: OXYGEN 20.9% LOWER EXPLOSIVE LIMIT LESS THAN 0.1% ERICKSON, INC. HERBY CERTIFIES THAT THE ABOVE NUMBERED TANK HAS BEEN CUT OPEN, PROCESSED, AND THEREFORE DESTROYED AT OUR PERMITTED HAZARDOUS WASTE FACILITY.

ERICKSON, INC. HAS THE APROPRIATE PERMITS FOR, AND HAS ACCEPTED THE TANK SHIPPED TO US FOR PROCESSING.

In the event of any physical or atmospheric changes affecting the gas-free conditions of the above tanks, or if in any doubt, immediately stop all hot work and contact the undersigned. This permit is valid for 24 hours if no physical or atmospheric changes occur.

STANDARD SAFETY DESIGNATION

SAFE FOR MEN: Means that in the compartment or space so designated (a) The oxygen content of the atmosphere is at least 19.5 percent by volume; and that (b) Toxic materials in the atmosphere are within permissable concentrations; and (c) In the judgment of the Inspector, the residues are not capable of producing toxic materials under existing atmospheric conditions while maintained as directed on the Inspector's certificate.

SAFE FOR FIRE: Means that in the compartment so designated (a) The concentration of flammable materials in the atmosphere is below 10 percent of the lower explosive limit; and that (b) In the judgment of the Inspector, the residues are not capable of producing a higher concentration that permitted under existing atmospheric conditions in the presence of fire and while maintained as directed on the Inspector's certificate, and further, (c) All adjacent spaces have either been cleaned sufficiently to prevent the spread of fire, are satisfactorily inerted, or in the case of fuel tanks, have been treated as deemed necessary by the Inspector.

The undersigned representative acknowledges receipt of this certificate and understands the conditions and limitations under which it was issued.

Patrice Collins — REPRESENTATIVE

TITLE

Dave Soto — INSPECTOR

ECDC
ENVIRONMENTAL L.C.
A BY AN ALLIED WASTE COMPANY

Invoice

INVOICE DATE: October 22, 1998

Account Number: 98-2121
Invoice Number: 98-2332

CLIENT: Mr. Micheal McCoy
Levin-Richmond Terminal
402 Wright Avenue
Richmond, CA 94804

PROJECT: ***Transportation and Disposal of Non-RCRA Contaminated Soils located at the Levin-Richmond Terminal in Richmond, CA***

MANIFEST DATE	GONDOLA NUMBERS	TOTAL TONS
09/16/98	CNW350139	95.15
09/16/98	CTRN501045	96.17
09/16/98	CHTT286242	92.45
09/16/98	IAIS30087	97.82
09/16/98	CTRN501109	100.85

Total Tons: **482.44**

OK for payment 10/26/98

Transportion, Host Community Fees and Disposal - ECDC: 482.44 tons x $58.00/ton = $ 27,981.52

0925 9975 490

TOTAL AMOUNT DUE = $ 27,981.52

Back-up info in file

See attached for a summary of container numbers and weights. Per the terms of our agreement, payment is due within 30 days of receipt of invoice. Please direct payments to the address below:

ECDC Environmental, L.C.
557 North Industrial Road
St George, UT 84770

Date : 09/28/98
Page : 10
TICKETS FOR: 09/28/98 - 09/28/98

DataPro, Inc.
Tickets List

DATE	JOB/RAIL	TRUCK	CHASSIS	CONTAINER	SCALE	NET
09/28/98 13:06:32	98-2121 CHTT286242	0.00	0.00	0.00	93.05 0.00	93.05
	Total Net Weight for Rail Car CHTT286242					93.05
09/28/98 13:06:47	98-2121 CNW350139	0.00	0.00	0.00	95.70 0.00	95.70
	Total Net Weight for Rail Car CNW350139					95.70
09/28/98 13:07:20	98-2121 CTRN501045	0.00	0.00	0.00	96.55 0.00	96.55
	Total Net Weight for Rail Car CTRN501045					96.55
09/28/98 13:07:27	98-2121 IAIS30087	0.00	0.00	0.00	98.20 0.00	98.20
	Total Net Weight for Rail Car IAIS30087					98.20
	Total Net Weight for Job 98-2121					383.50

Total Net Weight for Report ==> 2756.04

ECDC ENVIRONMENTAL, LC.

RAIL CAR UNLOADING

JOB NUMBER 98-2121

DATE 09-28-98

MIJACK ROTARY

EMPLOYEE'S SIGNATURE

RAIL CAR NUMBER	CONTAINER #	COMMENTS
CHTT286242		
CNW350139		
CTRN501045		
IAIS30087		

State of California—Environmental Protection Agency
Form Approved OMB No. 2050-0039 (Expires 9-30-99)
Please print or type. Form designed for use on elite (12-pitch) typewriter.

See Instructions on back of page 6.

Department of Toxic Substances Co
Sacramento, California

UNIFORM HAZARDOUS WASTE MANIFEST

1. Generator's US EPA ID No.: CAD980673560
Manifest Document No.:
2. Page 1: 1 of 1
Information in the shaded areas is not required by Federal law.

3. Generator's Name and Mailing Address: Levin-Richmond Terminal, 402 Wright Avenue, Richmond, CA 94804
4. Generator's Phone (510) 232-4422 Attn: Mike McCoy
A. State Manifest Document Number: 98019891
B. State Generator's ID:
5. Transporter 2 Company Name:
6. US EPA ID Number:
C. State Transporter's ID:
D. Transporter's Phone:
7. Transporter 1 Company Name: Union Pacific Railroad
8. US EPA ID Number: NED001792910
E. State Transporter's ID:
F. Transporter's Phone: (402) 271-4400
9. Designated Facility Name and Site Address: ECDC Environmental 1111 W. Hwy 123, East Carbon, Utah 84520
10. US EPA ID Number: UTC093012201
G. State Facility's ID: UTAH94-22
H. Facility's Phone: (800) 444-4451

11. US DOT Description (including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	Type	13. Total Quantity	14. Unit Wt/Vol	I. Waste Number
Non-RCRA Hazardous Waste Solid, not a (US D.O.T.-Regulated Hazardous Waste)	001	CM	00100	T	State 611 ~~Non-RCRA~~ EPA/Other
b.					State / EPA/Other
c.					State / EPA/Other
d.					State / EPA/Other

J. Additional Descriptions for Materials Listed Above:

K. Handling Codes for Wastes Listed Above: a. 03 b. c. d.

15. Special Handling Instructions and Additional Information
Emergency Contact: } Mike McCoy
Information Contact: } 510-232-4422
ECDC Job # 98-2121
Railcar # CNW 350139

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

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

Printed/Typed Name: Mike McCoy
Signature: Mike McCoy
Month 09 Day 16 Y 9

17. Transporter 1 Acknowledgement of Receipt of Materials
Printed/Typed Name: Patrick Brown
Signature: Patrick Brown for U.P.
Month 09 Day 16 Y 9

18. Transporter 2 Acknowledgement of Receipt of Materials
Printed/Typed Name:
Signature:
Month Day Y

19. Discrepancy Indication Space

20. Facility Owner or Operator Certification of receipt of hazardous materials covered by this manifest except as noted in Item 19
Printed/Typed Name:
Signature:
Month Day Y

GENERATOR / TRANSPORTER / FACILITY

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

DO NOT WRITE BELOW THIS LINE.

DTSC 8022A (4/97)
EPA 8700—22

Please print or type. Form designed for use on elite (12-pitch) typewriter.

Department of Toxic Substances
Sacramento, California

UNIFORM HAZARDOUS WASTE MANIFEST

1. Generator's US EPA ID No.: CAD980673560
Manifest Document No.:
2. Page 1 of
Information in the shaded areas is not required by Federal law

3. Generator's Name and Mailing Address: LEVIN-Richmond Terminal, 402 Wright Avenue, Richmond, CA 94804
4. Generator's Phone (510) 232-4422 Attn: Mike McCoy

A. State Manifest Document Number: 9801989
B. State Generator's ID:
C. State Transporter's ID:
D. Transporter's Phone:
E. State Transporter's ID:
F. Transporter's Phone: (402) 271-4400
G. State Facility's ID: UTAH94-22
H. Facility's Phone: (800) 444-4451

5. Transporter 2 Company Name:
6. US EPA ID Number:
7. Transporter 1 Company Name: Union Pacific Railroad
8. US EPA ID Number: NED001792910
9. Designated Facility Name and Site Address: ECDC Environmental 1111 W. Hwy 123, East Carbon, Utah 84520
10. US EPA ID Number: UTC093012201

11. US DOT Description (including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	Type	13. Total Quantity	14. Unit Wt/Vol	I. Waste Number
Non-RCRA Hazardous Waste Solid, not a (US D.O.T.-Regulated Hazardous Waste)	001	CM	00100	T	State / EPA/Other: Non-RCRA 641
b.					State / EPA/Other
c.					State / EPA/Other
d.					State / EPA/Other

J. Additional Descriptions for Materials Listed Above:

K. Handling Codes for Wastes Listed Above: a. 03 b. c. d.

15. Special Handling Instructions and Additional Information
Emergency Contact: } Mike McCoy
Information Contact: } 510-232-4422
ECDC Job # 98-2121
Railcar # CTRN 501045

16. GENERATOR'S CERTIFICATION: I hereby declare that the contents of this consignment are fully and accurately described above by proper shipping name and are classified, packed, marked, and labeled, and are in all respects in proper condition for transport by highway according to applicable international and national government regulations.
rail
If I am a large quantity generator, I certify that I have a program in place to reduce the volume and toxicity of waste generated to the degree I have determined to be economicall practicable and that I have selected the practicable method of treatment, storage, or disposal currently available to me which minimizes the present and future threat to human healt and the environment; OR, if I am a small quantity generator, I have made a good faith effort to minimize my waste generation and select the best waste management method that available to me and that I can afford.

Printed/Typed Name	Signature	Month	Day	Y
Mike McCoy	[signature]	09	16	9

17. Transporter 1 Acknowledgement of Receipt of Materials

Printed/Typed Name	Signature	Month	Day	Y
Patrick Brown	Patrick Brown for U.P	09	16	9

18. Transporter 2 Acknowledgement of Receipt of Materials

Printed/Typed Name	Signature	Month	Day	Y

19. Discrepancy Indication Space

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

Printed/Typed Name	Signature	Month	Day	Y

GENERATOR / TRANSPORTER / FACILITY

IN CASE OF EMERGENCY OR SPILL, CALL THE NATIONAL ... ONSE CENTER 1-800-424-8802: WITHIN CALIFORNIA, CALL 1-800-85...

98019892

DO NOT WRITE BELOW THIS LINE.

DTSC 8022A (4/97)
EPA 8700—22

UNIFORM HAZARDOUS WASTE MANIFEST

1. Generator's US EPA ID No. CAD 981061755 60 | Manifest Document No. | 2. Page 1 of 1 | Information in the shaded areas is not required by Federal law.

3. Generator's Name and Mailing Address: Levin-Richmond, 402 Wright Avenue, Richmond, CA 94804

4. Generator's Phone (510) 232-4426 Attn: Mike McCoy

A. State Manifest Document Number: 98019884

B. State Generator's ID

5. Transporter 2 Company Name | 6. US EPA ID Number

C. State Transporter's ID

D. Transporter's Phone

7. Transporter 1 Company Name: Union Pacific Railroad | 8. US EPA ID Number: NED000179291 0

E. State Transporter's ID

F. Transporter's Phone: (402) 271-4400

9. Designated Facility Name and Site Address: ECDC Environmental 1111 W. Hwy 123, East Carbon, Utah 84520 | 10. US EPA ID Number: UTC093012201

G. State Facility's ID: UTAH94-22

H. Facility's Phone: (800) 444-4451

11. US DOT Description (including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	Type	13. Total Quantity	14. Unit Wt/Vol	I. Waste Number
a. Non-RCRA Hazardous Waste Solid, not a (US D.O.T.-Regulated Hazardous Waste)	001	CM	00100	T	State 611; EPA/Other Non-RCRA
b.					State; EPA/Other
c.					State; EPA/Other
d.					State; EPA/Other

J. Additional Descriptions for Materials Listed Above

K. Handling Codes for Wastes Listed Above: a. 03; b.; c.; d.

15. Special Handling Instructions and Additional Information

Emergency Contact: Mike McCoy
Information Contact: 510-232-4426
ECDC Job # 98-2121

Railcar # CHTT 286242

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

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

Printed/Typed Name: Mike McCoy | Signature: [signature] | Month 09 Day 16 Year 9

TRANSPORTER

17. Transporter 1 Acknowledgement of Receipt of Materials

Printed/Typed Name: Patrick Brown | Signature: Patrick Brown for U.P. | Month 09 Day 16 Year 9

18. Transporter 2 Acknowledgement of Receipt of Materials

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

FACILITY

19. Discrepancy Indication Space

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

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

DO NOT WRITE BELOW THIS LINE.

GENERATOR

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

DTSC 8022A (4/97)
EPA 8700—22

Form Approved OMB No. 2050-0039 (Expires 9-30-99)
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UNIFORM HAZARDOUS WASTE MANIFEST

1. Generator's US EPA ID No.: CAD980671356 | Manifest Document No. | 2. Page 1 of 1 | Information in the shaded areas is not required by Federal law.

3. Generator's Name and Mailing Address: Levin Richmond Terminal, 402 Wright Avenue, Richmond, CA 94804

4. Generator's Phone (510) 232-4422 Attn: Mike McCoy

A. State Manifest Document Number: 98019885

B. State Generator's ID:

5. Transporter 1 Company Name | 6. US EPA ID Number

C. State Transporter's ID:

D. Transporter's Phone:

7. Transporter 2 Company Name: Union Pacific Railroad | 8. US EPA ID Number: NED001792910

E. State Transporter's ID:

F. Transporter's Phone: (402) 271-4400

9. Designated Facility Name and Site Address: ECDC Environmental 1111 W. Hwy 123, East Carbon, Utah 84520 | 10. US EPA ID Number: UTC093012201

G. State Facility's ID: UTAH94-22

H. Facility's Phone: (800) 444-4451

11. US DOT Description (including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	Type	13. Total Quantity	14. Unit Wt/Vol	I. Waste Number
a. Non-RCRA Hazardous Waste Solid, not a (US D.O.T.-Regulated Hazardous Waste)	001	CM	00100	T	State 611; EPA/Other Non-RCRA
b.					State; EPA/Other
c.					State; EPA/Other
d.					State; EPA/Other

J. Additional Descriptions for Materials Listed Above

K. Handling Codes for Wastes Listed Above: a. 03 | b. | c. | d.

15. Special Handling Instructions and Additional Information
Emergency Contact: } Mike McCoy
Information Contact: } 510-232-4422
ECDC Job # 98-2121

Railcar # IAIS 30087

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

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

Printed/Typed Name: Mike McCoy | Signature: [signature] | Month 09 Day 16

TRANSPORTER

17. Transporter 1 Acknowledgement of Receipt of Materials
Printed/Typed Name: Patrick Brown | Signature: Patrick Brown for UP | Month 09 Day 16

18. Transporter 2 Acknowledgement of Receipt of Materials
Printed/Typed Name | Signature | Month | Day

FACILITY

19. Discrepancy Indication Space

20. Facility Owner or Operator Certification of receipt of hazardous materials covered by this manifest except as noted in Item 19.
Printed/Typed Name | Signature | Month | Day

DO NOT WRITE BELOW THIS LINE.

GENERATOR

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

DTSC 8022A (4/97)
EPA 8700—22

ECDC ENVIRONMENTAL, LC.

RAIL CAR UNLOADING

JOB NUMBER 98-2121

DATE 10-14-98

MIJACK ROTARY

EMPLOYEE'S SIGNATURE

RAIL CAR NUMBER	CONTAINER #	COMMENTS
CTRN501109		

Date : 10/14/98 DataPro, Inc.
Page : 1 Tickets List
TICKETS FOR: 10/14/98 - 10/14/98

DATE	JOB/RAIL	TRUCK	CHASSIS	CONTAINER	SCALE	NET
10/14/98	98-2121				101.40	
11:34:14	CTRN501109	0.00	0.00	0.00	0.00	101.40

Total Net Weight for Rail Car CTRN501109 101.40

Total Net Weight for Job 98-2121 101.40

Total Net Weight for Report ==> 101.40

Form Approved OMB No. 2050-0039 (Expires 9-30-99)
Please print or type. Form designed for use on elite (12-pitch) typewriter.

See Instructions on back of page 6.

Department of Toxic Substances C
Sacramento, California

UNIFORM HAZARDOUS WASTE MANIFEST

1. Generator's US EPA ID No.: CAD980673560
Manifest Document No.:
2. Page 1: 1 of 1
Information in the shaded areas is not required by Federal law.

3. Generator's Name and Mailing Address: Lavin Richmond Terminal Corp
402 Wright Avenue
Richmond, CA 94804

4. Generator's Phone (510) 232 4422 Attn: Mike McCoy

A. State Manifest Document Number: 98019888
B. State Generator's ID:

5. Transporter 1 Company Name:
6. US EPA ID Number:
C. State Transporter's ID:
D. Transporter's Phone:

7. Transporter 2 Company Name: Union Pacific Railroad
8. US EPA ID Number: NED000179290
E. State Transporter's ID:
F. Transporter's Phone: (402) 271-4400

9. Designated Facility Name and Site Address: ECDC Environmental 1111 W. Hwy 123
East Carbon, Utah 84520
10. US EPA ID Number: UTC093012201
G. State Facility's ID: UTAH94-22
H. Facility's Phone: (800) 444-4451

11. US DOT Description (including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	12. Containers Type	13. Total Quantity	14. Unit Wt/Vol	I. Waste Number
Non-RCRA Hazardous Waste Solid, not a (US D.O.T.-Regulated Hazardous Waste)	001	CM	00082	T	State 611 / EPA/Other NON-RCRA
b.					State / EPA/Other
c.					State / EPA/Other
d.					State / EPA/Other

J. Additional Descriptions for Materials Listed Above:

K. Handling Codes for Wastes Listed Above
a.
b.
c. 03
d.

15. Special Handling Instructions and Additional Information
Emergency Contact: Mike McCoy
Information Contact: 510-232-4422
ECDC Job # 98-2121
Railcar # CTRN501109

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

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

Printed/Typed Name: Mike McCoy
Signature:
Month 09 Day 24 Year 9

TRANSPORTER

17. Transporter 1 Acknowledgement of Receipt of Materials
Printed/Typed Name: Patrick Brown
Signature:
Month 09 Day 24 Year 98

18. Transporter 2 Acknowledgement of Receipt of Materials
Printed/Typed Name:
Signature:
Month Day Year

FACILITY

19. Discrepancy Indication Space

20. Facility Owner or Operator Certification of receipt of hazardous materials covered by this manifest except as noted in Item 19.
Printed/Typed Name:
Signature:
Month Day Year

GENERATOR

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

DO NOT WRITE BELOW THIS LINE.

DTSC 8022A (4/97)
EPA 8700-22

Jayleen,

606 PARR TERMINAL 606

606 PARR TERMINAL 606

WASTE

WAYBILL

PAGE 1

Car Initial and Number	Kind	No. Cars	Waybill Date	Waybill Number
CTRN 501109	RR	1	00/00/00	By LJ

STOP THIS CAR AT — Road — Station — State — For — Consignee at Stop

To No.	Station	State	From No.	Station	State
9104	COLUMBIA JUNCTION	UT	1418	RICHMOND	CA
			Billed at No.	Station	State

Route	A/S	Ref Number	B/L Number	B/L Date
UP	S		NS	09/23/98 Time 1331

Consignee

ECDC
1111 WEST HIGHWAY 123
EAST CARBON, UT 84520

Shipper

LEVIN-RICHMOND TERMINAL
402 WRIGHT AVE
RICHMOND, CA 94804

Party to Receive Freight Bill

ECDC
1111 WEST HIGHWAY 123
EAST CARBON, UT 84520

Notify Party on Arrival

Special Instructions

Weighed
At RICHMOND CA PARR TERMINAL RAILRO

Gross	268,500
Tare	66,800
Allowance	
Net	201,700
	100.85

Tariff Authority
Item:
Sec.7 NO

Method of Payment
COLLECT

STCC Number
40 291 01

Declared Value not to Exceed
Per

Seals

Pkgs	Qual	Description of Articles	Weight	Rate	Per	Freight	Advance	Prepaid
1.00		HAZMAT DIRT-CONTAMINATED TRAIN 2 SEDIMENTS CONTAMINATED WITH DDT & DIELDRIN, NON-RCRA CALIFORNIA HAZARDOUS WASTE LOADED TO FULL CUBIC CAPACITY						

Reference Numbers
CT CONTRACT NUMBER SP-C-23178

Post-it™ Fax Note 7671

Date 9-30	# of pages ▸ 2
To Patrick	From Lori
Co./Dept. EDC/ECDC	Co. Levin
Phone #	Phone #
Fax (415) 642-7174	Fax #

606 PARR TERMINAL 606

WASTE

WAYBILL

Car Initial and Number	Kind	No. Cars	Waybill Date	Waybill Number
THIS 30087	RR	4 LEAD CAR	00/00/00	By LJ

TOP THIS CAR	Road	Station	State	For	Consignee at Stop

To No.	Station	State	From No.	Station	State
9104	COLUMBIA JUNCTION	UT	1418	RICHMOND	CA
			Billed at No.	Station	State

Route	A/S	Ref Number	B/L Number	B/L Date
UP OGDEN DRGW	S		NS	09/16/98 Time 912

Consignee

ECDC
1111 WEST HIGHWAY 123
EAST CARBON, UT 84520

Shipper

LEVIN-RICHMOND TERMINAL
402 WRIGHT AVE
RICHMOND, CA 94804

Party to Receive Freight Bill

ECDC
1111 WEST HIGHWAY 123
EAST CARBON, UT 84520

Notify Party on Arrival

Special Instructions

Weighed
At RICHMOND CA PARR TERMINAL RAILRO

Gross	262,850
Tare	67,200
Allowance	
Net	195,650
	97.82

Tariff Authority
Item:
Sec.7 NO

Method of Payment
COLLECT

STCC Number	Declared Value not to Exceed Per	Seals
40 291 01		

Pkgs	Qual	Description of Articles	Weight	Rate	Per	Freight	Advance	Prepaid
1.00		HAZMAT DIRT-CONTAMINATED TRAIN 1 SEDIMENTS CONTAMINATED WITH DDT & DIELDRIN, NON-RCRA CALIFORNIA HAZARDOUS WASTE LOADED TO FULL CUBIC CAPACITY						

TRAILING CARS

Init	Number	Net Weight	Init	Number	Net Weight	Init	Number	Net Weight
CNW	350139	190,300	CTRN	501045	192,350	CHTT	286242	184,900
		95.15			96.17			92.45

TOTAL NET WEIGHT 763,200

Reference Numbers

CT CONTRACT NUMBER SP-C-23178

606 PARR TERMINAL 606

WASTE

WAYBILL

Initial and Number	Kind	No. Cars	Waybill Date	Waybill Number
286401	RR	2 LEAD CAR	00/00/00	By LJ

P	Road	Station	State	For	Consignee at Stop
S					

To No.	Station	State	From No.	Station	State
9104	COLUMBIA JUNCTION	UT	1418	RICHMOND	CA
			Billed at No.	Station	State

oute	A/S	Ref Number	B/L Number	B/L Date
JP	S		NS	02/11/99 Time 1453

Consignee

ECDC
1111 WEST HIGHWAY 123
EAST CARBON, UT 84520

Shipper

LEVIN-RICHMOND TERMINAL
402 WRIGHT AVE
RICHMOND, CA 94804

Party to Receive Freight Bill

ECDC
1111 WEST HIGHWAY 123
EAST CARBON, UT 84520

Notify Party on Arrival

Special Instructions

Weighed
At RICHMOND CA PARR TERMINAL RAILRO

Gross	284,350
Tare	65,800
Allowance	
Net	218,550

Tariff Authority
Item:
Sec.7 NO

Method of Payment
COLLECT

STCC Number	Declared Value not to Exceed Per	Seals
40 291 01		

	Qual	Description of Articles	Weight	Rate	Per	Freight	Advance	Prepaid
1.00		HAZMAT DIRT-CONTAMINATED TRAIN SEDIMENTS CONTAMINATED WITH DDT & DIELDRIN, NON-RCRA CALIFORNIA HAZARDOUS WASTE LOADED TO FULL CUBIC CAPACITY						

TRAILING CARS

Init	Number	Net Weight	Init	Number	Net Weight	Init	Number	Net Weight
TRN	501048	201,700						

NET WEIGHT 420,250

Reference Numbers

CT CONTRACT NUMBER SP-C-23178

Environmental Protection Agency
OMB No. 2050-0039 (Expires 9-30-99)
Type. Form designed for use on elite (12-pitc' ewriter.

See Instructions on back of page 6.

Department of Toxic Substances Con
Sacramento, California

UNIFORM HAZARDOUS WASTE MANIFEST

1. Generator's US EPA ID No.: CAD000673566
Manifest Document No.:
2. Page 1 of 1
Information in the shaded areas is not required by Federal law.

3. Generator's Name and Mailing Address
LEVIN RICHMOND TERMINAL CORP. ATTN: MIKE MCCOY
402 WRIGHT AVENUE RICHMOND CA 94804
4. Generator's Phone ( ) 510 232-4422

A. State Manifest Document Number: 98357536
B. State Generator's ID:
C. State Transporter's ID:
D. Transporter's Phone: (402) 271-4400
E. State Transporter's ID:
F. Transporter's Phone:
G. State Facility's ID: UTAH 84620
H. Facility's Phone: (800) 444-4451

5. Transporter 1 Company Name: Union Pacific Lines, 1416 Dodge, Omaha, NE 68179
6. US EPA ID Number: NED001792910
7. Transporter 2 Company Name:
8. US EPA ID Number:
9. Designated Facility Name and Site Address: ECDC Environmental, 1111 W. Hwy 123, East Carbon, Utah 84620
10. US EPA ID Number: UTCD000012201

11. US DOT Description (including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	Type	13. Total Quantity	14. Unit Wt/Vol	1. Waste Number
a. Non RCRA Hazardous Waste solid, not a (U.S. D.O.T. Regulated Hazardous Waste)	001	CM	00100		State / EPA/Other: Non RCRA
b.					State / EPA/Other
c.					State / EPA/Other
d.					State / EPA/Other

J. Additional Descriptions for Materials Listed Above

K. Handling Codes for Wastes Listed Above: a. 03 b. c. d.

15. Special Handling Instructions and Additional Information
Emergency Contact: Mike McCoy 510-232-4422
Information Contact:
Railcar: CTRN 501048
ECDC Project No. 98 2121

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

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

Printed/Typed Name	Signature	Month	Day	Year
Mike McCoy	Mike McCoy	02	12	99

17. Transporter 1 Acknowledgement of Receipt of Materials

Printed/Typed Name	Signature	Month	Day	Year
Patrick Brown	Patrick Brown for U.P.	02	15	99

18. Transporter 2 Acknowledgement of Receipt of Materials

Printed/Typed Name	Signature	Month	Day	Year

19. Discrepancy Indication Space

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

Printed/Typed Name	Signature	Month	Day	Year
Kristy Candelaria	Kristy Candelaria	02	18	99

DO NOT WRITE BELOW THIS LINE.

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

DTSC 8022A (4/97)
EPA 8700-22

IN CASE OF EMERGENCY OR SPILL, CALL THE NATIONAL RESPONSE CENTER 1-800-424-8802; WITHIN CALIFORNIA, CALL 1-800-852-7

GENERATOR

TRANSPORTER

FACILITY

Environmental Protection Agency
OMB No. 2050-0039 (Expires 9-30-99)
Type. Form designed for use on elite (12-pitc writer.

See Instructions on back of page 6.

Department of Toxic Substances Con
Sacramento, California

UNIFORM HAZARDOUS WASTE MANIFEST

1. Generator's US EPA ID No. [illegible] | Manifest Document No. | 2. Page 1 1 of 1 | Information in the shaded areas is not required by Federal law.

3. Generator's Name and Mailing Address
[illegible] TERMINAL CORP. ATTN: MIKE MCCOY
[illegible] AVENUE, RICHMOND, CA 94804

4. Generator's Phone ( ) [illegible]

A. State Manifest Document Number: 98357535
B. State Generator's ID: [illegible]
C. State Transporter's ID:
D. Transporter's Phone: (402) 271-4400
E. State Transporter's ID:
F. Transporter's Phone:
G. State Facility's ID: UTAH 94-2[illegible]
H. Facility's Phone: (800) 444-4451

5. Transporter 1 Company Name: Union Pacific Lines, 1416 Dodge St, Omaha, NE 68179
6. US EPA ID Number: NED00[illegible]
7. Transporter 2 Company Name:
8. US EPA ID Number:
9. Designated Facility Name and Site Address: ECDC Environmental, 1111 W. Hwy 123, East Carbon, Utah 84520
10. US EPA ID Number: UTC0[illegible]

11. US DOT Description (including Proper Shipping Name, Hazard Class, and ID Number)	12. Containers No.	Type	13. Total Quantity	14. Unit Wt/Vol	Waste Number
a. Non RCRA Hazardous Waste solid, not a (U.S. D.O.T. Regulated Hazardous Waste)	001	CM	00100		State: EVI; Non RCRA
b.					EPA/Other
c.					State
d.					EPA/Other

J. Additional Descriptions for Materials Listed Above

K. Handling Codes for Wastes Listed Above: 03

15. Special Handling Instructions and Additional Information
Emergency Contact: Mike McCoy 510/232-4422
Information Contact
Railcar: CHTT 286401
ECDC Project No. 98-2121

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

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

Printed/Typed Name	Signature	Month	Day	Y
Mike McCoy	[signature]	02	12	9

17. Transporter 1 Acknowledgement of Receipt of Materials

Printed/Typed Name	Signature	Month	Day	Y
Patrick Brown	Patrick Brown for U.P.	02	15	9

18. Transporter 2 Acknowledgement of Receipt of Materials

Printed/Typed Name	Signature	Month	Day	Y

19. Discrepancy Indication Space

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

Printed/Typed Name	Signature	Month	Day
Kristy Candelaria	Kristy Candelaria	02	18

DO NOT WRITE BELOW THIS LINE.

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

DTSC 8022A (4/97)
EPA 8700-22

98357535

IN CASE OF EMERGENCY OR SPILL, CALL THE NATIONAL RE[illegible]E CENTER 1-800-424-8802; WITHIN CALIFORNIA, CALL 1-800-852-75

GENERATOR

TRANSPORTER

FACILITY

SITE

ECDC ENVIRONMENTAL

1111 WEST HIGHWAY 123
EAST CARBON CITY, UTAH 84520

INVOICE

LEVIN-RICHMOND TERMINAL
402 WRIGHT AVENUE
RICHMOND CALIFORNIA
ATTN: MICHAEL MC COY 94804

INVOICE NO.	000790
PAGE	1
DATE	02/25/99
CUSTOMER NO.	02121
SITE NO.	000
REFERENCE NO.	

SERVICE DATE	CODE	DESCRIPTION	REFERENCE	QTY.	AMOUNT
	(001)	LEVIN-RICHMOND TERMINAL 402 WRIGHT AVENUE			
02/22	IN TN	INDUSTRIAL DEBR PO #: 98-2121 Carrier: 2 RAIL CARS SOIL AND CONCRETE DEBRIS 02/22/99	1576	211.85	12,287.30
		--- INVOICE SUMMARY ---			
	Job	Material	Quantity	Amount	
	98-2121	INDUSTRIAL DEBR	211.85	12,287.30	
		Per LRTC Scale			
		209.13 ST x 58.00/ST =			12,129.54
		Authorized to Pay this amount 0925 9975 490			

Account Status

Payment due upon receipt of this invoice. 1.5% per month (18% per annum) late charge on balances over 30 days from date of invoice.
Payments received after invoice date are not reflected.
To ensure proper credit, please include your account number on your check and include the bottom portion of this invoice. When making payment on multiple accounts, please include the account numbers and the amounts of payment.

CURRENT	31-60 DAYS	61-90 DAYS	OVER 90 DAYS
24,032.30	.00	.00	.00

We reserve the right to suspend service without notice on any past due account.

TOTAL THIS INVOICE 12,287.30

PLEASE PAY THIS AMOUNT 24,032.30

Please remit to:

INVOICE NO.	000790
PAGE	1
DATE	02/25/99
CUSTOMER NO.	02121
ITE NO.	000
RENCE NO.	

ECDC Environmental, L.C.
557 North Industrial Road
St. George, UT 84770

AMOUNT OF REMITTANCE

PLEASE RETURN THIS PORTION WITH REMITTANCE

REMARKS

TELEPHONE NUMBER (435) 888 4451

APPENDIX E

ANALYTICAL LABORATORY REPORTS AND CHAIN-OF-CUSTODY FORMS FOR AIR MONITORING SAMPLES

K PRIME, Inc.

CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 05.20.98

TO: Mr. Don Seymour
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Acct: 9418
Project: 4860103015

Phone: 415.899.1600
FAX: 415.899.1601

FROM: Richard A. Kagel, Ph.D. RAK 5/20/98
Laboratory Director

SUBJECT: YOUR PROJECT "4860103015" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
3755-518	AIR	05.18.98	14779
10941-518	AIR	05.18.98	14780 HOLD
10716-518	AIR	05.18.98	14781
3740-518	AIR	05.18.98	14782
3756-518	AIR	05.18.98	14783

These samples were received in our laboratory on 05.20.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 3755-518
LAB NO: 14779
SAMPLE TYPE: AIR
DATE SAMPLED: 5/18/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 387
SAMPLE VOLUME (cu.m): 0.774

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 5/20/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.065	ND
B BHC	319-85-7	0.065	ND
LINDANE	58-89-9	0.065	ND
HEPTACHLOR	76-44-8	0.065	ND
D BHC	319-86-8	0.065	ND
ALDRIN	309-00-2	0.065	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.065	ND
ENDOSULFAN I	959-98-8	0.065	ND
4,4'-DDE	72-55-9	0.065	ND
DIELDRIN	60-57-1	0.065	ND
ENDRIN	72-20-8	0.065	ND
4,4'-DDD	72-54-8	0.065	ND
ENDOSULFAN II	33212-65-9	0.065	ND
4,4'-DDT	50-29-3	0.065	ND
ENDRIN ALDEHYDE	7421-93-4	0.065	ND
ENDOSULFAN SULFATE	1031-07-8	0.065	ND
METHOXYCHLOR	72-43-5	0.065	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: RMC
DATE: 5/20/98

APPROVED BY: RMC
DATE: 5/20/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10716-518
LAB NO: 14781
SAMPLE TYPE: AIR
DATE SAMPLED: 5/18/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 387
SAMPLE VOLUME (cu.m): 0.774

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 5/20/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A BHC	319-84-6	0.065	ND
B-BHC	319-85-7	0.065	ND
LINDANE	58-89-9	0.065	ND
HEPTACHLOR	76-44-8	0.065	ND
D-BHC	319-86-8	0.065	ND
ALDRIN	309-00-2	0.065	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.065	ND
ENDOSULFAN I	959-98-8	0.065	ND
4,4'-DDE	72-55-9	0.065	ND
DIELDRIN	60-57-1	0.065	ND
ENDRIN	72-20-8	0.065	ND
4,4'-DDD	72-54-8	0.065	ND
ENDOSULFAN II	33212-65-9	0.065	ND
4,4'-DDT	50-29-3	0.065	ND
ENDRIN ALDEHYDE	7421-93-4	0.065	ND
ENDOSULFAN SULFATE	1031-07-8	0.065	ND
METHOXYCHLOR	72-43-5	0.065	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: RAK
DATE: 5/20/98

APPROVED BY: RAK
DATE: 5/20/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 3740-518
LAB NO: 14782
SAMPLE TYPE: AIR
DATE SAMPLED: 5/18/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 179
SAMPLE VOLUME (cu.m): 0.358

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 5/20/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.140	ND
B-BHC	319-85-7	0.140	ND
LINDANE	58-89-9	0.140	ND
HEPTACHLOR	76-44-8	0.140	ND
D-BHC	319-86-8	0.140	ND
ALDRIN	309-00-2	0.140	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.140	ND
ENDOSULFAN I	959-98-8	0.140	ND
4,4'-DDE	72-55-9	0.140	ND
DIELDRIN	60-57-1	0.140	ND
ENDRIN	72-20-8	0.140	ND
4,4'-DDD	72-54-8	0.140	ND
ENDOSULFAN II	33212-65-9	0.140	ND
4,4'-DDT	50-29-3	0.140	ND
ENDRIN ALDEHYDE	7421-93-4	0.140	ND
ENDOSULFAN SULFATE	1031-07-8	0.140	ND
METHOXYCHLOR	72-43-5	0.140	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AMK
DATE: 5/20/98

APPROVED BY: RAK
DATE: 5/20/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 3756-518
LAB NO: 14783
SAMPLE TYPE: AIR
DATE SAMPLED: 5/18/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 15 /
SAMPLE VOLUME (cu.m): 0.314

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 5/20/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.159	ND
B-BHC	319-85-7	0.159	ND
LINDANE	58-89-9	0.159	ND
HEPTACHLOR	76-44-8	0.159	ND
D-BHC	319-86-8	0.159	ND
ALDRIN	309-00-2	0.159	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.159	ND
ENDOSULFAN I	959-98-8	0.159	ND
4,4'-DDE	72-55-9	0.159	ND
DIELDRIN	60-57-1	0.159	ND
ENDRIN	72-20-8	0.159	ND
4,4'-DDD	72-54-8	0.159	ND
ENDOSULFAN II	33212-65-9	0.159	ND
4,4'-DDT	50-29-3	0.159	ND
ENDRIN ALDEHYDE	7421-93-4	0.159	ND
ENDOSULFAN SULFATE	1031-07-8	0.159	ND
METHOXYCHLOR	72-43-5	0.159	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AMK
DATE: 5/20/98

APPROVED BY: AMK
DATE: 5/20/98

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707 527.7574

SAMPLING DATA SHEET

Client/Project ID: [illegible]	Date/s Sampled: 18 MAY 98
Site: LPIC	Time Period Sampled: 387 MIN
Project Location: [illegible]	Client Project No.: 486.0103.015
Instrument Model No.: ASA ESCORT	Sampler (Signature):
Pump Serial No.: ASA 3755	Total Sample Volume: 0.774 cum.
Calibrated By: RAK	
Bubble Flow Meter (mL/min): 2,000	Rotameter Reading: 2.1
Adsorbent Cartridge Information:	
Type/Lot #:	Sample ID: [illegible]
Adsorbent: XAD-2	Sample Number: 14779
Sampling Data:	
Start Time: [illegible] 36	Stop Time: [illegible]

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
[illegible]	[illegible]					[illegible]
	[illegible]					
	2.2					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PCS

Date/s Sampled: 18 JAN 98

Site: LRTC

Time Period Sampled:

Project Location: [illegible]ND

Client Project No.: 486.0103.015

Instrument Model No.: [illegible]A ESCORT

Sampler (Signature):

Pump Serial No.: [illegible] 10991

Total Sample Volume:

Calibrated By:

Bubble Flow Meter (mL/min):

Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot #:

Sample ID: [illegible]

Adsorbent: XAD-2

Sample Number: 14780

Sampling Data:

Start Time: 10:43

Stop Time: [illegible]

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
[illegible]	2.3					
[illegible]	[illegible]					
[illegible]	2.2					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: [illegible]

Date/s Sampled: 18 MAR 98

Site: RTC

Time Period Sampled: 387 MIN

Project Location: [illegible] MOND

Client Project No.: 486.0103.015

Instrument Model No.: USA ESCORT

Sampler (Signature):

Pump Serial No.: USA 10716

Total Sample Volume: 0.774 m^3

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000

Rotameter Reading: 2.2

Adsorbent Cartridge Information:

Type/Lot # : [illegible]

Sample ID: [illegible]

Adsorbent: XAD-2

Sample Number: 14781

Sampling Data:

Start Time: [illegible]

Stop Time: [illegible]

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
[illegible]	2.3					[illegible]
[illegible]	2.3					
[illegible]	2.3					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PCS	Date/s Sampled: 18 MAY 98
Site: LRTC	Time Period Sampled: 179 MIN
Project Location: RICHMOND	Client Project No.: 486 0103 015
Instrument Model No.: VISA ESCORT	Sampler (Signature):
Pump Serial No.: SA 3740	Total Sample Volume: 0.358 m^3

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: 2.1

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: [illegible]

Adsorbent: XAD-2 Sample Number: 14782

Sampling Data:

Start Time: 13:12 Stop Time: 16:11

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
[illegible]	2.1					[illegible]
[illegible]	2.2					[illegible]
						[illegible]

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID:

Date/s Sampled: [illegible]

Site:

Time Period Sampled: 157 min

Project Location:

Client Project No.: [illegible]

Instrument Model No.: [illegible]

Sampler (Signature):

Pump Serial No.: [illegible]

Total Sample Volume: 0.314 m^3

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000

Rotameter Reading: 2.2

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: [illegible]

Adsorbent: XAD-2 RAK

Sample Number: 14783

Sampling Data:

Start Time: [illegible]

Stop Time: [illegible]

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
[illegible]	2.3					[illegible]
[illegible]	2.3					[illegible]

Gutman Glass

K PRIME, INC.

CHAIN OF CUSTODY RECORD

CONSULTING ANALYTICAL CHEMISTS 4197 Lakeside Drive, Suite 170, Richmond, CA 94806 FAX: (510) 222/4817 PHONE: (510) 222-4815

Client/Project ID	Address/Phone	KPI Project No.
PES	415 899 1600	9418
Project Location: LRTC	Client Project No.: 486 0103 015	
Contact: DON SEYMOUR	Sampler (Signature):	

ANALYSES: 8080

Sample Identification No.	Date	Time	Lab Sample No.	Type of Sample	No. of Containers	8080							Expected Turnaround Time	Remarks
3755-518	5/18/98		14779	AIR	1								24-HOUR	
10991-518	"		14780	↓	1								↓	(HOLD)
10716-518	"		14781	↓	1								↓	
3740-518	"		14782	↓	1								↓	
3756-518	"		14783	↓	1								↓	

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
Don Seymour	5/18/98	13:30	2069 RC JTB 804		
NCM	052098	1030	Ginger Brinkle	052098	1030

Disposal Method

Disposed by: (Signature) Date Time

White Copy : Accompanies Samples
Yellow Copy : Sampler

05/20/1998 16:57 707-527-7879 K PRIME, INC PAGE 06

RECEIVED JUN 0 1 1998

K PRIME, Inc.
CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 05.28.98

TO: Mr. Will Mast
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct: 9418
Project: 486.0103.015

FROM: Richard A. Kagel, Ph.D. RAK 5/28/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.015" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
10991-521	AIR	05.21.98	14825
3740-521	AIR	05.21.98	14823
3756-521	AIR	05.21.98	14824

These samples were received in our laboratory on 05.22.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 3740-521
LAB NO: 14823
SAMPLE TYPE: AIR
DATE SAMPLED: 5/21/98
TIME SAMPLED: 16:02
SAMPLING DURATION (MINUTES): 449
SAMPLE VOLUME (cu.m): 0.898

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 5/22/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.056	ND
B-BHC	319-85-7	0.056	ND
LINDANE	58-89-9	0.056	ND
HEPTACHLOR	76-44-8	0.056	ND
D-BHC	319-86-8	0.056	ND
ALDRIN	309-00-2	0.056	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.056	ND
ENDOSULFAN I	959-98-8	0.056	ND
4,4'-DDE	72-55-9	0.056	ND
DIELDRIN	60-57-1	0.056	ND
ENDRIN	72-20-8	0.056	ND
4,4'-DDD	72-54-8	0.056	ND
ENDOSULFAN II	33212-65-9	0.056	ND
4,4'-DDT	50-29-3	0.056	ND
ENDRIN ALDEHYDE	7421-93-4	0.056	ND
ENDOSULFAN SULFATE	1031-07-8	0.056	ND
METHOXYCHLOR	72-43-5	0.056	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 5-28-98

APPROVED BY: MMS
DATE: 5/28/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 3756-521
LAB NO: 14824
SAMPLE TYPE: AIR
DATE SAMPLED: 5/21/98
TIME SAMPLED: 16:15
SAMPLING DURATION (MINUTES): 452
SAMPLE VOLUME (cu.m): 0.904

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 5/22/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.055	ND
B-BHC	319-85-7	0.055	ND
LINDANE	58-89-9	0.055	ND
HEPTACHLOR	76-44-8	0.055	ND
D-BHC	319-86-8	0.055	ND
ALDRIN	309-00-2	0.055	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.055	ND
ENDOSULFAN I	959-98-8	0.055	ND
4,4'-DDE	72-55-9	0.055	ND
DIELDRIN	60-57-1	0.055	ND
ENDRIN	72-20-8	0.055	ND
4,4'-DDD	72-54-8	0.055	ND
ENDOSULFAN II	33212-65-9	0.055	ND
4,4'-DDT	50-29-3	0.055	ND
ENDRIN ALDEHYDE	7421-93-4	0.055	ND
ENDOSULFAN SULFATE	1031-07-8	0.055	ND
METHOXYCHLOR	72-43-5	0.055	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 5.28.98

APPROVED BY: RMK
DATE: 5/28/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10991-521
LAB NO:	14825
SAMPLE TYPE:	AIR
DATE SAMPLED:	5/21/98
TIME SAMPLED:	15:57
SAMPLING DURATION (MINUTES):	458
SAMPLE VOLUME (cu.m):	0.916

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	5/22/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.055	ND
B-BHC	319-85-7	0.055	ND
LINDANE	58-89-9	0.055	ND
HEPTACHLOR	76-44-8	0.055	ND
D-BHC	319-86-8	0.055	ND
ALDRIN	309-00-2	0.055	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.055	ND
ENDOSULFAN I	959-98-8	0.055	ND
4,4'-DDE	72-55-9	0.055	ND
DIELDRIN	60-57-1	0.055	ND
ENDRIN	72-20-8	0.055	ND
4,4'-DDD	72-54-8	0.055	ND
ENDOSULFAN II	33212-65-9	0.055	ND
4,4'-DDT	50-29-3	0.055	ND
ENDRIN ALDEHYDE	7421-93-4	0.055	ND
ENDOSULFAN SULFATE	1031-07-8	0.055	ND
METHOXYCHLOR	72-43-5	0.055	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AO
DATE: 5-28-98

APPROVED BY: KAK
DATE: 5/28/98

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 21 MAY 1998
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND, CA	Client Project No.: 486.0105.015
Instrument Model No.: MSA ESCORT	Sampler (Signature): William Klost
Pump Serial No.: MSA 3756	Total Sample Volume: 0.904 m³

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2000 Rotameter Reading: 2.2

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: 14824

Adsorbent: XAD-2 Sample Number: 3756-521

Sampling Data:

Start Time: 843 Stop Time: 1615

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
0843	2.2					UPWIND
1615	2.4					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 21 MAY 1998
Site: ~~RICHMOND~~ 2RTC	Time Period Sampled:
Project Location: RICHMOND, CA	Client Project No.: 486010305
Instrument Model No.: MSA ESCORT	Sampler (Signature): [illegible]
Pump Serial No.: MSA 10991	Total Sample Volume: 0.916 m^3
Calibrated By: RAK	
Bubble Flow Meter (mL/min): 2000	Rotameter Reading: 2.3
Adsorbent Cartridge Information:	
Type/Lot # :	Sample ID: 14825
Adsorbent: XAD-2	Sample Number: 10991-521
Sampling Data:	
Start Time: 819	Stop Time: 1557

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
0819	2.2					EXCAVATOR
1557	2.2					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 21 MAY 1998
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND, CA	Client Project No.: 486,0103.015
Instrument Model No.: MSA ESCORT	Sampler (Signature): William Mast
Pump Serial No.: MSA 3740	Total Sample Volume: 0.898 m³

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2000

Rotameter Reading: 2.1

Adsorbent Cartridge Information:

Type/Lot # :

Adsorbent: XAD-2

Sample ID: 14823

Sample Number: 3740-521

Sampling Data:

Start Time: 833

Stop Time: 1602

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
0833	2.2					DOWN WIND
1602	2.6					

K PRIME, INC.

CHAIN OF CUSTODY RECORD

CONSULTING ANALYTICAL CHEMISTS 4197 Lakeside Drive, Suite 170, Richmond, CA 94806 FAX: (510) 222/4817 PHONE: (510) 222-4815

CAUTION

Client/Project ID	Address/Phone	ANALYSES	KPI Project No.
PES / LRTC	415-899-1600		9418
Project Location: RICHMOND, CA	Client Project No.: 486.0103.015		
Contact: WILL MAST	Sampler (Signature): William Mast		

Sample Identification No.	Date	Time	Lab Sample No.	Type of Sample	No. of Containers	8080							Expected Turnaround Time	Remarks
10991-521	5.21.98	1557	14825	AIR	1	X							Wed. 12:00	
3740-521	↓	1602	14823	↓	1	X							↓	
3756-521	↓	1615	14824	↓	1	X							↓	☆
980521-61	5.21.98	1520	14826	SOIL	1	X							Need by Tues, 5:00	CAUTION - MAY BE DDT PRODUCT
-62	↓	↓	14827	↓	1	X							↓	↓
-63	↓	↓	14828	↓	1	X							↓	↓
-64	↓	↓	14829	↓	1	X							↓	↓
-65	↓	↓	14830	↓	1	X							↓	↓ ☆
-66	↓	↓	14831	↓	1	X							↓	↓

CAUTION

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
William Mast	5-22-98	1007	[illegible]	5-22-98	1055
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time

Disposal Method			
Disposed by: (Signature)	Date	Time	White Copy : Accompanies Samples Yellow Copy : Sampler

K PRIME, Inc.

CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 08.17.98

TO: MR. WILL MAST
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Acct: 9418
Project: 486.0103.015

Phone: 415.899.1600
FAX: 415.899.1601

FROM: Richard A. Kagel, Ph.D. RAK 8/17/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.015" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
10994-79	AIR	07.09.98	15673
3775-79	AIR	07.09.98	15674
10991-79	AIR	07.09.98	15675
10994-715	AIR	07.15.98	15676
3775-715	AIR	07.15.98	15677
10991-715	AIR	07.15.98	15678
10994-716	AIR	07.16.98	15679
10991-716	AIR	07.16.98	15680
10715-717	AIR	07.17.98	15681
10994-717	AIR	07.17.98	15682
10991-717	AIR	07.17.98	15683
10991-720	AIR	07.20.98	15684
10715-720	AIR	07.20.98	15685
10994-720	AIR	07.20.98	15686
10715-721	AIR	07.21.98	15687
10994-721	AIR	07.21.98	15688
10991-724	AIR	07.24.98	15689
10994-724	AIR	07.24.98	15690
10715-724	AIR	07.24.98	15691
10994-727	AIR	07.27.98	15692
10715-727	AIR	07.27.98	15693
10991-727	AIR	07.27.98	15694
10715-729	AIR	07.29.98	15695
10991-729	AIR	07.29.98	15696

10994-729	AIR	07.29.98	15697
10715-731	AIR	07.31.98	15698
10991-731	AIR	07.31.98	15699
10715-83	AIR	08.03.98	15700
10994-83	AIR	08.03.98	15701
10994-84	AIR	08.04.98	15702
10991-84	AIR	08.04.98	15703

These samples were received in our laboratory on 08.06.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-79
LAB NO: 15673
SAMPLE TYPE: AIR
DATE SAMPLED: 7/9/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 360
SAMPLE VOLUME (cu.m): 0.72

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/12/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.069	ND
B-BHC	319-85-7	0.069	ND
LINDANE	58-89-9	0.069	ND
HEPTACHLOR	76-44-8	0.069	ND
D-BHC	319-86-8	0.069	ND
ALDRIN	309-00-2	0.069	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.069	ND
ENDOSULFAN I	959-98-8	0.069	ND
4,4'-DDE	72-55-9	0.069	ND
DIELDRIN	60-57-1	0.069	ND
ENDRIN	72-20-8	0.069	ND
4,4'-DDD	72-54-8	0.069	ND
ENDOSULFAN II	33212-65-9	0.069	ND
4,4'-DDT	50-29-3	0.069	ND
ENDRIN ALDEHYDE	7421-93-4	0.069	ND
ENDOSULFAN SULFATE	1031-07-8	0.069	ND
METHOXYCHLOR	72-43-5	0.069	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: DB
DATE: 8.17.98

APPROVED BY: [illegible]
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 3775-79
LAB NO: 15674
SAMPLE TYPE: AIR
DATE SAMPLED: 7/9/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 346
SAMPLE VOLUME (cu.m): 0.692

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/12/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.072	ND
B-BHC	319-85-7	0.072	ND
LINDANE	58-89-9	0.072	ND
HEPTACHLOR	76-44-8	0.072	ND
D-BHC	319-86-8	0.072	ND
ALDRIN	309-00-2	0.072	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.072	ND
ENDOSULFAN I	959-98-8	0.072	ND
4,4'-DDE	72-55-9	0.072	ND
DIELDRIN	60-57-1	0.072	ND
ENDRIN	72-20-8	0.072	ND
4,4'-DDD	72-54-8	0.072	ND
ENDOSULFAN II	33212-65-9	0.072	ND
4,4'-DDT	50-29-3	0.072	ND
ENDRIN ALDEHYDE	7421-93-4	0.072	ND
ENDOSULFAN SULFATE	1031-07-8	0.072	ND
METHOXYCHLOR	72-43-5	0.072	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8·17·98

APPROVED BY: [illegible]
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10991-79
LAB NO:	15675
SAMPLE TYPE:	AIR
DATE SAMPLED:	7/9/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	353
SAMPLE VOLUME (cu.m):	0.706

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	8/12/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.071	ND
B-BHC	319-85-7	0.071	ND
LINDANE	58-89-9	0.071	ND
HEPTACHLOR	76-44-8	0.071	ND
D-BHC	319-86-8	0.071	ND
ALDRIN	309-00-2	0.071	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.071	ND
ENDOSULFAN I	959-98-8	0.071	ND
4,4'-DDE	72-55-9	0.071	ND
DIELDRIN	60-57-1	0.071	ND
ENDRIN	72-20-8	0.071	ND
4,4'-DDD	72-54-8	0.071	ND
ENDOSULFAN II	33212-65-9	0.071	ND
4,4'-DDT	50-29-3	0.071	ND
ENDRIN ALDEHYDE	7421-93-4	0.071	ND
ENDOSULFAN SULFATE	1031-07-8	0.071	ND
METHOXYCHLOR	72-43-5	0.071	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8-17-98

APPROVED BY: BAK
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-715
LAB NO: 15676
SAMPLE TYPE: AIR
DATE SAMPLED: 7/15/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 258
SAMPLE VOLUME (cu.m): 0.516

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/12/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.097	ND
B-BHC	319-85-7	0.097	ND
LINDANE	58-89-9	0.097	ND
HEPTACHLOR	76-44-8	0.097	ND
D-BHC	319-86-8	0.097	ND
ALDRIN	309-00-2	0.097	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.097	ND
ENDOSULFAN I	959-98-8	0.097	ND
4,4'-DDE	72-55-9	0.097	ND
DIELDRIN	60-57-1	0.097	ND
ENDRIN	72-20-8	0.097	ND
4,4'-DDD	72-54-8	0.097	ND
ENDOSULFAN II	33212-65-9	0.097	ND
4,4'-DDT	50-29-3	0.097	ND
ENDRIN ALDEHYDE	7421-93-4	0.097	ND
ENDOSULFAN SULFATE	1031-07-8	0.097	ND
METHOXYCHLOR	72-43-5	0.097	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AG
DATE: 8.17.98

APPROVED BY: RAK
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	3775-715
LAB NO:	15677
SAMPLE TYPE:	AIR
DATE SAMPLED:	7/15/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	259
SAMPLE VOLUME (cu.m):	0.518

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	8/13/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.097	ND
B-BHC	319-85-7	0.097	ND
LINDANE	58-89-9	0.097	ND
HEPTACHLOR	76-44-8	0.097	ND
D-BHC	319-86-8	0.097	ND
ALDRIN	309-00-2	0.097	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.097	ND
ENDOSULFAN I	959-98-8	0.097	ND
4,4'-DDE	72-55-9	0.097	ND
DIELDRIN	60-57-1	0.097	ND
ENDRIN	72-20-8	0.097	ND
4,4'-DDD	72-54-8	0.097	ND
ENDOSULFAN II	33212-65-9	0.097	ND
4,4'-DDT	50-29-3	0.097	ND
ENDRIN ALDEHYDE	7421-93-4	0.097	ND
ENDOSULFAN SULFATE	1031-07-8	0.097	ND
METHOXYCHLOR	72-43-5	0.097	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AS
DATE: 8-17-98

APPROVED BY: [illegible]
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10991-715
LAB NO: 15678
SAMPLE TYPE: AIR
DATE SAMPLED: 7/15/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 258
SAMPLE VOLUME (cu.m): 0.516

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.097	ND
B-BHC	319-85-7	0.097	ND
LINDANE	58-89-9	0.097	ND
HEPTACHLOR	76-44-8	0.097	ND
D-BHC	319-86-8	0.097	ND
ALDRIN	309-00-2	0.097	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.097	ND
ENDOSULFAN I	959-98-8	0.097	ND
4,4'-DDE	72-55-9	0.097	ND
DIELDRIN	60-57-1	0.097	ND
ENDRIN	72-20-8	0.097	ND
4,4'-DDD	72-54-8	0.097	ND
ENDOSULFAN II	33212-65-9	0.097	ND
4,4'-DDT	50-29-3	0.097	ND
ENDRIN ALDEHYDE	7421-93-4	0.097	ND
ENDOSULFAN SULFATE	1031-07-8	0.097	ND
METHOXYCHLOR	72-43-5	0.097	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AO
DATE: 8.17.98

APPROVED BY: MAK
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-716
LAB NO: 15679
SAMPLE TYPE: AIR
DATE SAMPLED: 7/16/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 434
SAMPLE VOLUME (cu.m): 0.868

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.058	ND
B-BHC	319-85-7	0.058	ND
LINDANE	58-89-9	0.058	ND
HEPTACHLOR	76-44-8	0.058	ND
D-BHC	319-86-8	0.058	ND
ALDRIN	309-00-2	0.058	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.058	ND
ENDOSULFAN I	959-98-8	0.058	ND
4,4'-DDE	72-55-9	0.058	ND
DIELDRIN	60-57-1	0.058	ND
ENDRIN	72-20-8	0.058	ND
4,4'-DDD	72-54-8	0.058	ND
ENDOSULFAN II	33212-65-9	0.058	ND
4,4'-DDT	50-29-3	0.058	ND
ENDRIN ALDEHYDE	7421-93-4	0.058	ND
ENDOSULFAN SULFATE	1031-07-8	0.058	ND
METHOXYCHLOR	72-43-5	0.058	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AS
DATE: 8.17.98

APPROVED BY: RMC
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10991-716
LAB NO:	15680
SAMPLE TYPE:	AIR
DATE SAMPLED:	7/16/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	446
SAMPLE VOLUME (cu.m):	0.892

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	8/13/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.056	ND
B-BHC	319-85-7	0.056	ND
LINDANE	58-89-9	0.056	ND
HEPTACHLOR	76-44-8	0.056	ND
D-BHC	319-86-8	0.056	ND
ALDRIN	309-00-2	0.056	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.056	ND
ENDOSULFAN I	959-98-8	0.056	ND
4,4'-DDE	72-55-9	0.056	ND
DIELDRIN	60-57-1	0.056	ND
ENDRIN	72-20-8	0.056	ND
4,4'-DDD	72-54-8	0.056	ND
ENDOSULFAN II	33212-65-9	0.056	ND
4,4'-DDT	50-29-3	0.056	ND
ENDRIN ALDEHYDE	7421-93-4	0.056	ND
ENDOSULFAN SULFATE	1031-07-8	0.056	ND
METHOXYCHLOR	72-43-5	0.056	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8.17.98

APPROVED BY: LMC
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10715-717
LAB NO:	15681
SAMPLE TYPE:	AIR
DATE SAMPLED:	7/17/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	355
SAMPLE VOLUME (cu.m):	0.71

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	8/13/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.070	ND
B-BHC	319-85-7	0.070	ND
LINDANE	58-89-9	0.070	ND
HEPTACHLOR	76-44-8	0.070	ND
D-BHC	319-86-8	0.070	ND
ALDRIN	309-00-2	0.070	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.070	ND
ENDOSULFAN I	959-98-8	0.070	ND
4,4'-DDE	72-55-9	0.070	ND
DIELDRIN	60-57-1	0.070	ND
ENDRIN	72-20-8	0.070	ND
4,4'-DDD	72-54-8	0.070	ND
ENDOSULFAN II	33212-65-9	0.070	ND
4,4'-DDT	50-29-3	0.070	ND
ENDRIN ALDEHYDE	7421-93-4	0.070	ND
ENDOSULFAN SULFATE	1031-07-8	0.070	ND
METHOXYCHLOR	72-43-5	0.070	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8.17.98

APPROVED BY: RMC
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-717
LAB NO: 15682
SAMPLE TYPE: AIR
DATE SAMPLED: 7/17/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 355
SAMPLE VOLUME (cu.m): 0.71

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.070	ND
B-BHC	319-85-7	0.070	ND
LINDANE	58-89-9	0.070	ND
HEPTACHLOR	76-44-8	0.070	ND
D-BHC	319-86-8	0.070	ND
ALDRIN	309-00-2	0.070	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.070	ND
ENDOSULFAN I	959-98-8	0.070	ND
4,4'-DDE	72-55-9	0.070	ND
DIELDRIN	60-57-1	0.070	ND
ENDRIN	72-20-8	0.070	ND
4,4'-DDD	72-54-8	0.070	ND
ENDOSULFAN II	33212-65-9	0.070	ND
4,4'-DDT	50-29-3	0.070	ND
ENDRIN ALDEHYDE	7421-93-4	0.070	ND
ENDOSULFAN SULFATE	1031-07-8	0.070	ND
METHOXYCHLOR	72-43-5	0.070	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8-19-98

APPROVED BY: MK
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10991-717
LAB NO: 15683
SAMPLE TYPE: AIR
DATE SAMPLED: 7/17/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 370
SAMPLE VOLUME (cu.m): 0.74

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.068	ND
B-BHC	319-85-7	0.068	ND
LINDANE	58-89-9	0.068	ND
HEPTACHLOR	76-44-8	0.068	ND
D-BHC	319-86-8	0.068	ND
ALDRIN	309-00-2	0.068	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.068	ND
ENDOSULFAN I	959-98-8	0.068	ND
4,4'-DDE	72-55-9	0.068	ND
DIELDRIN	60-57-1	0.068	ND
ENDRIN	72-20-8	0.068	ND
4,4'-DDD	72-54-8	0.068	ND
ENDOSULFAN II	33212-65-9	0.068	ND
4,4'-DDT	50-29-3	0.068	ND
ENDRIN ALDEHYDE	7421-93-4	0.068	ND
ENDOSULFAN SULFATE	1031-07-8	0.068	ND
METHOXYCHLOR	72-43-5	0.068	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8.17.98

APPROVED BY: MAC
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10991-720
LAB NO:	15684
SAMPLE TYPE:	AIR
DATE SAMPLED:	7/20/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	396
SAMPLE VOLUME (cu.m):	0.792

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	8/13/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.063	ND
B-BHC	319-85-7	0.063	ND
LINDANE	58-89-9	0.063	ND
HEPTACHLOR	76-44-8	0.063	ND
D-BHC	319-86-8	0.063	ND
ALDRIN	309-00-2	0.063	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.063	ND
ENDOSULFAN I	959-98-8	0.063	ND
4,4'-DDE	72-55-9	0.063	ND
DIELDRIN	60-57-1	0.063	ND
ENDRIN	72-20-8	0.063	ND
4,4'-DDD	72-54-8	0.063	ND
ENDOSULFAN II	33212-65-9	0.063	ND
4,4'-DDT	50-29-3	0.063	ND
ENDRIN ALDEHYDE	7421-93-4	0.063	ND
ENDOSULFAN SULFATE	1031-07-8	0.063	ND
METHOXYCHLOR	72-43-5	0.063	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8.17.98

APPROVED BY: KMC
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10715-720
LAB NO: 15685
SAMPLE TYPE: AIR
DATE SAMPLED: 7/20/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 395
SAMPLE VOLUME (cu.m): 0.79

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.063	ND
B-BHC	319-85-7	0.063	ND
LINDANE	58-89-9	0.063	ND
HEPTACHLOR	76-44-8	0.063	ND
D-BHC	319-86-8	0.063	ND
ALDRIN	309-00-2	0.063	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.063	ND
ENDOSULFAN I	959-98-8	0.063	ND
4,4'-DDE	72-55-9	0.063	ND
DIELDRIN	60-57-1	0.063	ND
ENDRIN	72-20-8	0.063	ND
4,4'-DDD	72-54-8	0.063	ND
ENDOSULFAN II	33212-65-9	0.063	ND
4,4'-DDT	50-29-3	0.063	ND
ENDRIN ALDEHYDE	7421-93-4	0.063	ND
ENDOSULFAN SULFATE	1031-07-8	0.063	ND
METHOXYCHLOR	72-43-5	0.063	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8·17·98

APPROVED BY: RMK
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-720
LAB NO: 15686
SAMPLE TYPE: AIR
DATE SAMPLED: 7/20/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 397
SAMPLE VOLUME (cu.m): 0.794

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.063	ND
B-BHC	319-85-7	0.063	ND
LINDANE	58-89-9	0.063	ND
HEPTACHLOR	76-44-8	0.063	ND
D-BHC	319-86-8	0.063	ND
ALDRIN	309-00-2	0.063	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.063	ND
ENDOSULFAN I	959-98-8	0.063	ND
4,4'-DDE	72-55-9	0.063	ND
DIELDRIN	60-57-1	0.063	ND
ENDRIN	72-20-8	0.063	ND
4,4'-DDD	72-54-8	0.063	ND
ENDOSULFAN II	33212-65-9	0.063	ND
4,4'-DDT	50-29-3	0.063	ND
ENDRIN ALDEHYDE	7421-93-4	0.063	ND
ENDOSULFAN SULFATE	1031-07-8	0.063	ND
METHOXYCHLOR	72-43-5	0.063	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AG
DATE: 8.17.98

APPROVED BY: MKS
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10715-721
LAB NO: 15687
SAMPLE TYPE: AIR
DATE SAMPLED: 7/21/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 180
SAMPLE VOLUME (cu.m): 0.36

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.139	ND
B-BHC	319-85-7	0.139	ND
LINDANE	58-89-9	0.139	ND
HEPTACHLOR	76-44-8	0.139	ND
D-BHC	319-86-8	0.139	ND
ALDRIN	309-00-2	0.139	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.139	ND
ENDOSULFAN I	959-98-8	0.139	ND
4,4'-DDE	72-55-9	0.139	ND
DIELDRIN	60-57-1	0.139	ND
ENDRIN	72-20-8	0.139	ND
4,4'-DDD	72-54-8	0.139	ND
ENDOSULFAN II	33212-65-9	0.139	ND
4,4'-DDT	50-29-3	0.139	ND
ENDRIN ALDEHYDE	7421-93-4	0.139	ND
ENDOSULFAN SULFATE	1031-07-8	0.139	ND
METHOXYCHLOR	72-43-5	0.139	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8.17.98

APPROVED BY: RMC
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-721
LAB NO: 15688
SAMPLE TYPE: AIR
DATE SAMPLED: 7/21/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 180
SAMPLE VOLUME (cu.m): 0.36

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.139	ND
B-BHC	319-85-7	0.139	ND
LINDANE	58-89-9	0.139	ND
HEPTACHLOR	76-44-8	0.139	ND
D-BHC	319-86-8	0.139	ND
ALDRIN	309-00-2	0.139	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.139	ND
ENDOSULFAN I	959-98-8	0.139	ND
4,4'-DDE	72-55-9	0.139	ND
DIELDRIN	60-57-1	0.139	ND
ENDRIN	72-20-8	0.139	ND
4,4'-DDD	72-54-8	0.139	ND
ENDOSULFAN II	33212-65-9	0.139	ND
4,4'-DDT	50-29-3	0.139	ND
ENDRIN ALDEHYDE	7421-93-4	0.139	ND
ENDOSULFAN SULFATE	1031-07-8	0.139	ND
METHOXYCHLOR	72-43-5	0.139	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8.17.98

APPROVED BY: MK
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10991-724
LAB NO: 15689
SAMPLE TYPE: AIR
DATE SAMPLED: 7/24/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 440
SAMPLE VOLUME (cu.m): 0.88

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.057	ND
B-BHC	319-85-7	0.057	ND
LINDANE	58-89-9	0.057	ND
HEPTACHLOR	76-44-8	0.057	ND
D-BHC	319-86-8	0.057	ND
ALDRIN	309-00-2	0.057	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.057	ND
ENDOSULFAN I	959-98-8	0.057	ND
4,4'-DDE	72-55-9	0.057	ND
DIELDRIN	60-57-1	0.057	ND
ENDRIN	72-20-8	0.057	ND
4,4'-DDD	72-54-8	0.057	ND
ENDOSULFAN II	33212-65-9	0.057	ND
4,4'-DDT	50-29-3	0.057	ND
ENDRIN ALDEHYDE	7421-93-4	0.057	ND
ENDOSULFAN SULFATE	1031-07-8	0.057	ND
METHOXYCHLOR	72-43-5	0.057	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8·17·98

APPROVED BY: MK
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-724
LAB NO: 15690
SAMPLE TYPE: AIR
DATE SAMPLED: 7/24/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 440
SAMPLE VOLUME (cu.m): 0.88

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.057	ND
B-BHC	319-85-7	0.057	ND
LINDANE	58-89-9	0.057	ND
HEPTACHLOR	76-44-8	0.057	ND
D-BHC	319-86-8	0.057	ND
ALDRIN	309-00-2	0.057	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.057	ND
ENDOSULFAN I	959-98-8	0.057	ND
4,4'-DDE	72-55-9	0.057	ND
DIELDRIN	60-57-1	0.057	ND
ENDRIN	72-20-8	0.057	ND
4,4'-DDD	72-54-8	0.057	ND
ENDOSULFAN II	33212-65-9	0.057	ND
4,4'-DDT	50-29-3	0.057	ND
ENDRIN ALDEHYDE	7421-93-4	0.057	ND
ENDOSULFAN SULFATE	1031-07-8	0.057	ND
METHOXYCHLOR	72-43-5	0.057	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AG
DATE: 8.19.98

APPROVED BY: RMC
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10715-724
LAB NO: 15691
SAMPLE TYPE: AIR
DATE SAMPLED: 7/24/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 440
SAMPLE VOLUME (cu.m): 0.88

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.057	ND
B-BHC	319-85-7	0.057	ND
LINDANE	58-89-9	0.057	ND
HEPTACHLOR	76-44-8	0.057	ND
D-BHC	319-86-8	0.057	ND
ALDRIN	309-00-2	0.057	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.057	ND
ENDOSULFAN I	959-98-8	0.057	ND
4,4'-DDE	72-55-9	0.057	ND
DIELDRIN	60-57-1	0.057	ND
ENDRIN	72-20-8	0.057	ND
4,4'-DDD	72-54-8	0.057	ND
ENDOSULFAN II	33212-65-9	0.057	ND
4,4'-DDT	50-29-3	0.057	ND
ENDRIN ALDEHYDE	7421-93-4	0.057	ND
ENDOSULFAN SULFATE	1031-07-8	0.057	ND
METHOXYCHLOR	72-43-5	0.057	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: RB
DATE: 8.17.98

APPROVED BY: RMK
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-727
LAB NO: 15692
SAMPLE TYPE: AIR
DATE SAMPLED: 7/27/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 480
SAMPLE VOLUME (cu.m): 0.96

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.052	ND
B-BHC	319-85-7	0.052	ND
LINDANE	58-89-9	0.052	ND
HEPTACHLOR	76-44-8	0.052	ND
D-BHC	319-86-8	0.052	ND
ALDRIN	309-00-2	0.052	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.052	ND
ENDOSULFAN I	959-98-8	0.052	ND
4,4'-DDE	72-55-9	0.052	ND
DIELDRIN	60-57-1	0.052	ND
ENDRIN	72-20-8	0.052	ND
4,4'-DDD	72-54-8	0.052	ND
ENDOSULFAN II	33212-65-9	0.052	ND
4,4'-DDT	50-29-3	0.052	ND
ENDRIN ALDEHYDE	7421-93-4	0.052	ND
ENDOSULFAN SULFATE	1031-07-8	0.052	ND
METHOXYCHLOR	72-43-5	0.052	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8.17.98

APPROVED BY: PAK
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10715-727
LAB NO: 15693
SAMPLE TYPE: AIR
DATE SAMPLED: 7/27/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 465
SAMPLE VOLUME (cu.m): 0.93

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.054	ND
B-BHC	319-85-7	0.054	ND
LINDANE	58-89-9	0.054	ND
HEPTACHLOR	76-44-8	0.054	ND
D-BHC	319-86-8	0.054	ND
ALDRIN	309-00-2	0.054	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.054	ND
ENDOSULFAN I	959-98-8	0.054	ND
4,4'-DDE	72-55-9	0.054	ND
DIELDRIN	60-57-1	0.054	ND
ENDRIN	72-20-8	0.054	ND
4,4'-DDD	72-54-8	0.054	ND
ENDOSULFAN II	33212-65-9	0.054	ND
4,4'-DDT	50-29-3	0.054	ND
ENDRIN ALDEHYDE	7421-93-4	0.054	ND
ENDOSULFAN SULFATE	1031-07-8	0.054	ND
METHOXYCHLOR	72-43-5	0.054	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8-17-98

APPROVED BY: RMC
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10991-727
LAB NO: 15694
SAMPLE TYPE: AIR
DATE SAMPLED: 7/27/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 465
SAMPLE VOLUME (cu.m): 0.93

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.054	ND
B-BHC	319-85-7	0.054	ND
LINDANE	58-89-9	0.054	ND
HEPTACHLOR	76-44-8	0.054	ND
D-BHC	319-86-8	0.054	ND
ALDRIN	309-00-2	0.054	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.054	ND
ENDOSULFAN I	959-98-8	0.054	ND
4,4'-DDE	72-55-9	0.054	ND
DIELDRIN	60-57-1	0.054	ND
ENDRIN	72-20-8	0.054	ND
4,4'-DDD	72-54-8	0.054	ND
ENDOSULFAN II	33212-65-9	0.054	ND
4,4'-DDT	50-29-3	0.054	ND
ENDRIN ALDEHYDE	7421-93-4	0.054	ND
ENDOSULFAN SULFATE	1031-07-8	0.054	ND
METHOXYCHLOR	72-43-5	0.054	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8-17-98

APPROVED BY: RAK
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10715-729
LAB NO: 15695
SAMPLE TYPE: AIR
DATE SAMPLED: 7/29/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 464
SAMPLE VOLUME (cu.m): 0.928

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.054	ND
B-BHC	319-85-7	0.054	ND
LINDANE	58-89-9	0.054	ND
HEPTACHLOR	76-44-8	0.054	ND
D-BHC	319-86-8	0.054	ND
ALDRIN	309-00-2	0.054	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.054	ND
ENDOSULFAN I	959-98-8	0.054	ND
4,4'-DDE	72-55-9	0.054	ND
DIELDRIN	60-57-1	0.054	ND
ENDRIN	72-20-8	0.054	ND
4,4'-DDD	72-54-8	0.054	ND
ENDOSULFAN II	33212-65-9	0.054	ND
4,4'-DDT	50-29-3	0.054	ND
ENDRIN ALDEHYDE	7421-93-4	0.054	ND
ENDOSULFAN SULFATE	1031-07-8	0.054	ND
METHOXYCHLOR	72-43-5	0.054	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8.17.98

APPROVED BY: [illegible]
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10991-729
LAB NO: 15696
SAMPLE TYPE: AIR
DATE SAMPLED: 7/29/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 471
SAMPLE VOLUME (cu.m): 0.942

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.053	ND
B-BHC	319-85-7	0.053	ND
LINDANE	58-89-9	0.053	ND
HEPTACHLOR	76-44-8	0.053	ND
D-BHC	319-86-8	0.053	ND
ALDRIN	309-00-2	0.053	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.053	ND
ENDOSULFAN I	959-98-8	0.053	ND
4,4'-DDE	72-55-9	0.053	ND
DIELDRIN	60-57-1	0.053	ND
ENDRIN	72-20-8	0.053	ND
4,4'-DDD	72-54-8	0.053	ND
ENDOSULFAN II	33212-65-9	0.053	ND
4,4'-DDT	50-29-3	0.053	ND
ENDRIN ALDEHYDE	7421-93-4	0.053	ND
ENDOSULFAN SULFATE	1031-07-8	0.053	ND
METHOXYCHLOR	72-43-5	0.053	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8.17.98

APPROVED BY: RAK
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-729
LAB NO: 15697
SAMPLE TYPE: AIR
DATE SAMPLED: 7/29/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 495
SAMPLE VOLUME (cu.m): 0.99

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.051	ND
B-BHC	319-85-7	0.051	ND
LINDANE	58-89-9	0.051	ND
HEPTACHLOR	76-44-8	0.051	ND
D-BHC	319-86-8	0.051	ND
ALDRIN	309-00-2	0.051	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.051	ND
ENDOSULFAN I	959-98-8	0.051	ND
4,4'-DDE	72-55-9	0.051	ND
DIELDRIN	60-57-1	0.051	ND
ENDRIN	72-20-8	0.051	ND
4,4'-DDD	72-54-8	0.051	ND
ENDOSULFAN II	33212-65-9	0.051	ND
4,4'-DDT	50-29-3	0.051	ND
ENDRIN ALDEHYDE	7421-93-4	0.051	ND
ENDOSULFAN SULFATE	1031-07-8	0.051	ND
METHOXYCHLOR	72-43-5	0.051	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8.17.98

APPROVED BY: MMS
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10715-731
LAB NO: 15698
SAMPLE TYPE: AIR
DATE SAMPLED: 7/31/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 255
SAMPLE VOLUME (cu.m): 0.51

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.098	ND
B-BHC	319-85-7	0.098	ND
LINDANE	58-89-9	0.098	ND
HEPTACHLOR	76-44-8	0.098	ND
D-BHC	319-86-8	0.098	ND
ALDRIN	309-00-2	0.098	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.098	ND
ENDOSULFAN I	959-98-8	0.098	ND
4,4'-DDE	72-55-9	0.098	ND
DIELDRIN	60-57-1	0.098	ND
ENDRIN	72-20-8	0.098	ND
4,4'-DDD	72-54-8	0.098	ND
ENDOSULFAN II	33212-65-9	0.098	ND
4,4'-DDT	50-29-3	0.098	ND
ENDRIN ALDEHYDE	7421-93-4	0.098	ND
ENDOSULFAN SULFATE	1031-07-8	0.098	ND
METHOXYCHLOR	72-43-5	0.098	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8.17.98

APPROVED BY: MMK
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10991-731
LAB NO: 15699
SAMPLE TYPE: AIR
DATE SAMPLED: 7/31/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 257
SAMPLE VOLUME (cu.m): 0.514

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.097	ND
B-BHC	319-85-7	0.097	ND
LINDANE	58-89-9	0.097	ND
HEPTACHLOR	76-44-8	0.097	ND
D-BHC	319-86-8	0.097	ND
ALDRIN	309-00-2	0.097	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.097	ND
ENDOSULFAN I	959-98-8	0.097	ND
4,4'-DDE	72-55-9	0.097	ND
DIELDRIN	60-57-1	0.097	ND
ENDRIN	72-20-8	0.097	ND
4,4'-DDD	72-54-8	0.097	ND
ENDOSULFAN II	33212-65-9	0.097	ND
4,4'-DDT	50-29-3	0.097	ND
ENDRIN ALDEHYDE	7421-93-4	0.097	ND
ENDOSULFAN SULFATE	1031-07-8	0.097	ND
METHOXYCHLOR	72-43-5	0.097	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: RB
DATE: 8.17.98

APPROVED BY: BMK
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10715-83
LAB NO:	15700
SAMPLE TYPE:	AIR
DATE SAMPLED:	8/3/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	430
SAMPLE VOLUME (cu.m):	0.86

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	8/13/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.058	ND
B-BHC	319-85-7	0.058	ND
LINDANE	58-89-9	0.058	ND
HEPTACHLOR	76-44-8	0.058	ND
D-BHC	319-86-8	0.058	ND
ALDRIN	309-00-2	0.058	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.058	ND
ENDOSULFAN I	959-98-8	0.058	ND
4,4'-DDE	72-55-9	0.058	ND
DIELDRIN	60-57-1	0.058	ND
ENDRIN	72-20-8	0.058	ND
4,4'-DDD	72-54-8	0.058	ND
ENDOSULFAN II	33212-65-9	0.058	ND
4,4'-DDT	50-29-3	0.058	ND
ENDRIN ALDEHYDE	7421-93-4	0.058	ND
ENDOSULFAN SULFATE	1031-07-8	0.058	ND
METHOXYCHLOR	72-43-5	0.058	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8.17.98

APPROVED BY: AMC
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-83
LAB NO: 15701
SAMPLE TYPE: AIR
DATE SAMPLED: 8/3/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 425
SAMPLE VOLUME (cu.m): 0.85

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.059	ND
B-BHC	319-85-7	0.059	ND
LINDANE	58-89-9	0.059	ND
HEPTACHLOR	76-44-8	0.059	ND
D-BHC	319-86-8	0.059	ND
ALDRIN	309-00-2	0.059	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.059	ND
ENDOSULFAN I	959-98-8	0.059	ND
4,4'-DDE	72-55-9	0.059	ND
DIELDRIN	60-57-1	0.059	ND
ENDRIN	72-20-8	0.059	ND
4,4'-DDD	72-54-8	0.059	ND
ENDOSULFAN II	33212-65-9	0.059	ND
4,4'-DDT	50-29-3	0.059	ND
ENDRIN ALDEHYDE	7421-93-4	0.059	ND
ENDOSULFAN SULFATE	1031-07-8	0.059	ND
METHOXYCHLOR	72-43-5	0.059	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AO
DATE: 8.17.98

APPROVED BY: MM
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-84
LAB NO: 15702
SAMPLE TYPE: AIR
DATE SAMPLED: 8/4/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 405
SAMPLE VOLUME (cu.m): 0.81

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.062	ND
B-BHC	319-85-7	0.062	ND
LINDANE	58-89-9	0.062	ND
HEPTACHLOR	76-44-8	0.062	ND
D-BHC	319-86-8	0.062	ND
ALDRIN	309-00-2	0.062	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.062	ND
ENDOSULFAN I	959-98-8	0.062	ND
4,4'-DDE	72-55-9	0.062	ND
DIELDRIN	60-57-1	0.062	ND
ENDRIN	72-20-8	0.062	ND
4,4'-DDD	72-54-8	0.062	ND
ENDOSULFAN II	33212-65-9	0.062	ND
4,4'-DDT	50-29-3	0.062	ND
ENDRIN ALDEHYDE	7421-93-4	0.062	ND
ENDOSULFAN SULFATE	1031-07-8	0.062	ND
METHOXYCHLOR	72-43-5	0.062	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AS
DATE: 8.19.98

APPROVED BY: MAK
DATE: 8/17/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10991-84
LAB NO: 15703
SAMPLE TYPE: AIR
DATE SAMPLED: 8/4/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 405
SAMPLE VOLUME (cu.m): 0.81

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 8/13/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.062	ND
B-BHC	319-85-7	0.062	ND
LINDANE	58-89-9	0.062	ND
HEPTACHLOR	76-44-8	0.062	ND
D-BHC	319-86-8	0.062	ND
ALDRIN	309-00-2	0.062	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.062	ND
ENDOSULFAN I	959-98-8	0.062	ND
4,4'-DDE	72-55-9	0.062	ND
DIELDRIN	60-57-1	0.062	ND
ENDRIN	72-20-8	0.062	ND
4,4'-DDD	72-54-8	0.062	ND
ENDOSULFAN II	33212-65-9	0.062	ND
4,4'-DDT	50-29-3	0.062	ND
ENDRIN ALDEHYDE	7421-93-4	0.062	ND
ENDOSULFAN SULFATE	1031-07-8	0.062	ND
METHOXYCHLOR	72-43-5	0.062	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 8.17.98

APPROVED BY: RMK
DATE: 8/17/98

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 9 JUL 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486 0103 015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10991	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: 2.2

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: 10994-79

Adsorbent: XAD-2 Sample Number: 15673

Sampling Data:

Start Time: 09:40 Stop Time: 15:40

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
15:40	2.2					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET UPGRADIENT/BACKGROUND

Client/Project ID: PES	Date/s Sampled: 9 JULY 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND, CA	Client Project No.: 4860103 015
Instrument Model No.: MSA-ESCOR	Sampler (Signature):
Pump Serial No.: 3775	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: 2.1

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: 3775-79

Adsorbent: XAD-2 Sample Number: 15674

Sampling Data:

Start Time: 09:44 Stop Time: 15:30

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
15:30	2.1					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 9 JULY 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND, CA	Client Project No.: 486 0103 015
Instrument Model No.: MSA-ESCORT	Sampler (Signature):
Pump Serial No.: 10994	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2000 Rotameter Reading: 2.1

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: 10991-79

Adsorbent: XAD-2 Sample Number: 15675

Sampling Data:

Start Time: 09:42 Stop Time: 15:35

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
15:35	2.1					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 7-15-98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486010 3 015
Instrument Model No.: MSA - ESCORT	Sampler (Signature):
Pump Serial No.: 10944	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2000 Rotameter Reading: 2.1

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: 10994-715

Adsorbent: XAD-2 Sample Number: 15676

Sampling Data:

Start Time: 10:44 Stop Time: 15:02

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
15:02	2.1					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 7-15-98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486 0103 015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [illegible]
Pump Serial No.: 3755 *	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: 2.1

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: 3755-715

Adsorbent: XAD-2 Sample Number: 15677

Sampling Data:

Start Time: 10:50 Stop Time: 15:09

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
15:09	2.1					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 7-15-98
Site: LRJC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 48C0103 015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): Dan Lymave
Pump Serial No.: 10991	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2000 Rotameter Reading: 2.2

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: 10991-715

Adsorbent: XAD-2 Sample Number: 15678

Sampling Data:

Start Time: 10:48 Stop Time: 15:06

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
15:06	1.4					

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SAMPLING DATA SHEET

Client/Project ID: PES 1

Date/s Sampled: 7/16/98

Site: LRTC

Time Period Sampled:

Project Location: Richmond, CA

Client Project No.:

Instrument Model No.: MSA Escort

Sampler (Signature):

Pump Serial No.: MSA 10994

Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2000

Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10994-716

Adsorbent: XAD-2

Sample Number: 15679

Sampling Data:

Start Time: 0810

Stop Time: 1524

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
0810	2.2					~~Upwind~~
1056	2.2					
1524	2.2					

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SAMPLING DATA SHEET

Client/Project ID: PES 1

Date/s Sampled: 7/16/98

Site: LRTC

Time Period Sampled:

Project Location: Richmond, CA

Client Project No.:

Instrument Model No.: MSA Escort

Sampler (Signature):

Pump Serial No.: MSA 10991

Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2000

Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10991-716

Adsorbent: XAD-2

Sample Number: 15680

Sampling Data:

Start Time: 0800

Stop Time: 1526

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
0800	2.2					~150-200 yd Powerwood
1054	2.2					
1526	2.2					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 17 JULY
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486.0103.015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10715	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: 2.3

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: 10715-717

Adsorbent: XAD-2 Sample Number: 15681

Sampling Data:

Start Time: 8:40 Stop Time: 14:35

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
14:35	2.2					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 17 JULY
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486.0103.015
Instrument Model No.: MSA - ESCORT	Sampler (Signature): DON SEYMOUR
Pump Serial No.: 10994	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: 2.1

Adsorbent Cartridge Information:

Type/Lot # : XAD-2 Sample ID: 10994-717

Adsorbent: Sample Number: 15682

Sampling Data:

Start Time: 08:35 Stop Time: 14:30

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
14:30	2.1					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 17 JULY 98
Site: LRTC	Time Period Sampled:
Project Location: RICMOND	Client Project No.: 486 0103.015
Instrument Model No.: MSA ESCORT	Sampler (Signature):
Pump Serial No.: 10991	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: 2.4

Adsorbent Cartridge Information:

Type/Lot # : XAD-2 Sample ID: 10991-217

Adsorbent: Sample Number: 15683

Sampling Data:

Start Time: 08:30 Stop Time: 14:40

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
14:40	2.5					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 7-20-98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 4860103015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): Don Lyman
Pump Serial No.: 10991	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: 2.3

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: 10991-720

Adsorbent: XAD-2 Sample Number: 15684

Sampling Data:

Start Time: 07:44 Stop Time: 14:20

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
14:20	2.2					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 7/20/98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 4860103015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): Don Heyman
Pump Serial No.: 10715	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: 2.3

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: 10715-720

Adsorbent: XAD-2 Sample Number: 15685

Sampling Data:

Start Time: 07:40 Stop Time: 14:15

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
14:15	2.3					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 7/20/98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486 0103 015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [illegible]
Pump Serial No.: 10994	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: 2.1

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: 10994-720

Adsorbent: XAD-2 Sample Number: 15686

Sampling Data:

Start Time: 07:48 Stop Time: 14:25

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
14:25	2.1					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 21 JULY 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486 0103015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10715	Total Sample Volume:

Calibrated By: RAIC

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10715-21

Adsorbent: XAD-2

Sample Number: 15687

Sampling Data:

Start Time: 12:35 Stop Time: 15:35

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
12:35	2.5					
15:35	2.6					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 21 JULY 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486 0103 015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10994	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10994-721

Adsorbent: XAD-2

Sample Number: 15688

Sampling Data:

Start Time: 12:30 Stop Time: 15:30

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
12:30	2.2					
15:30	2.2					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 24 JULY 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486 0103 015
Instrument Model No.: MSA - ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10991	Total Sample Volume:

Calibrated By: ZAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____ Sample ID: 10991-724

Adsorbent: XAD-2 Sample Number: 15689

Sampling Data:

Start Time: 07:50 Stop Time: 15:10

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
07:50	2.3					
15:10	2.2					

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SAMPLING DATA SHEET

Client/Project ID: LRTC /PES	Date/s Sampled: 24 JULY 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486 0103015
Instrument Model No.: MSA ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10994	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____ Sample ID: 10994-724

Adsorbent: XAD-2 Sample Number: 15690

Sampling Data:

Start Time: 07:40 Stop Time: 15:00

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
07:40	2.2					
15:00	2.2					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 24 JULY 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486 0103015
Instrument Model No.: MSA · ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10715	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Adsorbent: XAD-2

Sample ID: 10715-724

Sample Number: 15691

Sampling Data:

Start Time: 07:45 Stop Time: 15:05

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
07:45	2.4					
15:05	2.4					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 27 JULY 1998
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486 0103 015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [illegible]
Pump Serial No.: 10994	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____ Sample ID: 10994-727

Adsorbent: XAD-2 Sample Number: 15692

Sampling Data:

Start Time: 07:55 Stop Time: 15:55

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
07:55	2.1					
15:15	2.1					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 27 JUL 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486010301 5
Instrument Model No.: MSA-ESCORT	Sampler (Signature): Don Lymore
Pump Serial No.: 10715	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____ Sample ID: 10715-727

Adsorbent: XAD-2 Sample Number: 15693

Sampling Data:

Start Time: 07:45 Stop Time: 15:30

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
07:45	2.3					
15:30	2.3					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 27 July 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486 0105015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10991	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____ Sample ID: 10991-727

Adsorbent: XAD-2 Sample Number: 15694

Sampling Data:

Start Time: 07:50 Stop Time: 15:35

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
07:50	2.3					
15:35	2.3					

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SAMPLING DATA SHEET

Client/Project ID: PES

Date/s Sampled: 7/29/98

Site: LRTC

Time Period Sampled:

Project Location: Richmond, CA

Client Project No.:

Instrument Model No.: MSA Escort

Sampler (Signature):

Pump Serial No.: MSA 10715

Total Sample Volume:

Calibrated By:

Bubble Flow Meter (mL/min): 2000

Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10715-729

Adsorbent: XAD-2

Sample Number: 15695

Sampling Data:

Start Time: 0746

Stop Time:

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
0746	2.2					
1001	2.2					
1251	2.2					
1530	2.2					

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SAMPLING DATA SHEET

Client/Project ID: BPES	Date/s Sampled: 7/29/98
Site: LRTC	Time Period Sampled:
Project Location: Richmond, CA	Client Project No.:
Instrument Model No.: MSA Escort	Sampler (Signature):
Pump Serial No.: MSA 10991	Total Sample Volume:
Calibrated By:	
Bubble Flow Meter (mL/min): 2000	Rotameter Reading:
Adsorbent Cartridge Information:	
Type/Lot # :	Sample ID: 10991-729
Adsorbent: XAD-2	Sample Number: 15696
Sampling Data:	
Start Time: 0739	Stop Time:

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
0739	2.2					
1000	2.2					
1245	2.2					
1530	2.2					

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SAMPLING DATA SHEET

Client/Project ID: PES

Date/s Sampled: 7/29/98

Site: LRTC

Time Period Sampled:

Project Location: Richmond, CA

Client Project No.:

Instrument Model No.: MSA Escort

Sampler (Signature):

Pump Serial No.: MSA 10994

Total Sample Volume:

Calibrated By:

Bubble Flow Meter (mL/min): 2000

Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10994-729

Adsorbent: XAD-2

Sample Number: 15697

Sampling Data:

Start Time: 0745

Stop Time: 1600

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
0745	2.2					
1000	2.2					
1250	2.2					
1530	2.2					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 31 JULY 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 4860103015
Instrument Model No.: MSA - ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10715	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: 2.4

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: 15698

Adsorbent: XAD-2 Sample Number: 10715-731

Sampling Data:

Start Time: 10:45 Stop Time: 15:00

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
10:45	2.4					
15:00	2.4					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 31 JULY 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486010301 5
Instrument Model No.: MSA ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10991	Total Sample Volume:
Calibrated By: RAK	
Bubble Flow Meter (mL/min): 2,000	Rotameter Reading: 2.2
Adsorbent Cartridge Information:	
Type/Lot # :	Sample ID: 15699
Adsorbent: XAD-2	Sample Number: 10991-731
Sampling Data:	
Start Time: 10:48	Stop Time: 15:05

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
10:48	2.2					
15:05	2.2					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 3 AUGUST
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486 0103 015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10715	Total Sample Volume:
Calibrated By: RAK	
Bubble Flow Meter (mL/min): 2,000	Rotameter Reading:
Adsorbent Cartridge Information:	
Type/Lot #: XAD-2	Sample ID: 10715-83
Adsorbent:	Sample Number: 15700
Sampling Data:	
Start Time: 07:50	Stop Time: 13:37*

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
07:50	2.4					
12:00	2.4					
15:00	/				*	LOW BATTERY, MONITOR
						STOPPED OPERATING AT
						13:37 BASED ON
						RUN TIME METER

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 8/3/98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486 0103015
Instrument Model No.: MSA - ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10994	Total Sample Volume:
Calibrated By: RAK	
Bubble Flow Meter (mL/min): 2,000	Rotameter Reading:
Adsorbent Cartridge Information:	
Type/Lot # :	Sample ID: 15701
Adsorbent: XAD-2	Sample Number: 10994-83
Sampling Data:	
Start Time: 07:55	Stop Time: 15:00

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
07:55	2.2					
12:05	2.2					
15:00	2.2					

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SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 4 AUGUST 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 486 0103015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): Don Lyman
Pump Serial No.: 10994	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10994-84

Adsorbent: XAD-2

Sample Number: 15702

Sampling Data:

Start Time: 08:00 Stop Time: 14:45

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:00	2.1					
14:45	2.3					

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SAMPLING DATA SHEET

Client/Project ID: P2S	Date/s Sampled: 4 AUGUST 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 4860103015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [illegible]
Pump Serial No.: 10991	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000

Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____

Adsorbent: XAD-2

Sample ID: 15703

Sample Number: 10991-84

Sampling Data:

Start Time: 08:05

Stop Time: 14:50

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:05	2.2					
14:50	2.2					

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CHAIN OF CUSTODY RECORD

CONSULTING ANALYTICAL CHEMISTS 4197 Lakeside Drive, Suite 170, Richmond, CA 94806 FAX: (510) 222/4817 PHONE: (510) 222-4815

Client/Project ID: PES Environmental

Address/Phone: 1682 Novato Blvd Suite 100, Novato, CA 94947 415-899-1600

KPI Project No.: 9418

Project Location: LRTC

Client Project No.: 4860103015

Contact: Will Mast

Sampler (Signature):

ANALYSES: 8080 (Pesticide)

Sample Identification No.	Date	Time	Lab Sample No.	Type of Sample	No. of Containers	8080 (Pesticide)							Expected Turnaround Time	Remarks
10991-731	7/31/98		15699	XAD Tube	1	X							7-day	
10715-83	8/3/98		15700		1									
10994-83	8/3/98		15701		1									
10994-84	8/4/98		15702		1									
10991-84	8/4/98		15703		1									

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
	8/6/98	1:30	K. PRIME MERS WORDEN	8/6/98	1:30p
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time

Disposal Method

Disposed by: (Signature) Date Time

White Copy : Accompanies Samples
Yellow Copy : Sampler

K PRIME, INC.

CHAIN OF CUSTODY RECORD

CONSULTING ANALYTICAL CHEMISTS 4197 Lakeside Drive, Suite 170, Richmond, CA 94806 FAX: (510) 222/4817 PHONE: (510) 222-4815

Client/Project ID: PES Environmental

Address/Phone: 1682 Novato Blvd Suite 100, Novato, CA 94947 415-899-1600

KPI Project No.: 9418

Project Location: LRTC

Client Project No.: 4860103615

Contact: Will Mast

Sampler (Signature):

ANALYSES

Sample Identification No.	Date	Time	Lab Sample No.	Type of Sample	No. of Containers	8080 (Pesticide)						Expected Turnaround Time	Remarks
10994-720	7/20/98		15686	XAD Tube	1	X						7-day	
10715-721	7/21/98		15687		1								
10994-721	7/21/98		15688		1								
10991-724	7/24/98		15689		1								
10994-724	7/24/98		15690		1								
10715-724	7/24/98		15691		1								
10994-727	7/27/98		15692		1								
10715-727	7/27/98		15693		1								
10991-727	7/27/98		15694		1								
10715-729	7/29/98		15695		1								
10991-729	7/29/98		15696		1								
10994-729	7/29/98		15697		1								
10715-731	7/31/98		15698		1								

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
	8/6/98	1:30	K PRIME NELS WORDEN	8/6/98	1:30p
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time

Disposal Method

Disposed by: (Signature) Date Time

White Copy : Accompanies Samples
Yellow Copy : Sampler

K PRIME, INC.

CHAIN OF CUSTODY RECORD

CONSULTING ANALYTICAL CHEMISTS 4197 Lakeside Drive, Suite 170, Richmond, CA 94806 FAX: (510) 222/4817 PHONE: (510) 222-4815

Client/Project ID: PES Environmental

Address/Phone: 1682 Novato Blvd Suite 100, Novato, CA 94947 415 899 1600

ANALYSES

KPI Project No.: 9418

Project Location: LRTC

Client Project No.: 4860103015

Contact: Will Mast

Sampler: (Signature)

Sample Identification No.	Date	Time	Lab Sample No.	Type of Sample	No. of Containers	8080 (Pesticide)							Expected Turnaround Time	Remarks
10994-79	7/9/98		15673	X4DTube	1	X							7-day	
3775-79	7/9/98		15674		1									
10991-79	7/9/98		15675		1									
10994-715	7/15/98		15676		1									
3775-715	7/15/98		15677		1									
10991-715	7/15/98		15678		1									
10994-716	7/16/98		15679		1									
10991-716	7/16/98		15680		1									
10715-717	7/17/98		15681		1									
10994-717	7/17/98		15682		1									
10991-717	7/17/98		15683		1									
10991-720	7/20/98		15684		1									
10715-720	7/20/98		15685		1									

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
	8/6/98	1:30	K PRIME NELS WORDEN	8/6/98	1:30p
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time

Disposal Method

Disposed by: (Signature) Date Time

White Copy : Accompanies Samples
Yellow Copy : Sampler

K PRIME, Inc.

CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 10.06.98

TO: Mr. BILL FRIZEL
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Acct: 9418
Project: 486.0103.015

Phone: 415.899.1600
FAX: 415.899.1601

FROM: Richard A. Kagel, Ph.D. RAK 10/6/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.015" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
10715-85	AIR	08.05.98	16261
10991-85	AIR	08.05.98	16262
10994-86	AIR	08.06.98	16263
10715-86	AIR	08.06.98	16264
10991-86	AIR	08.06.98	16265
10991-87	AIR	08.07.98	16266
10994-87	AIR	08.07.98	16267
10715-87	AIR	08.07.98	16268
10715-812	AIR	08.12.98	16269
10991-812	AIR	08.12.98	16270
10715-813	AIR	08.13.98	16271
10994-813	AIR	08.13.98	16272

These samples were received in our laboratory on 09.11.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10715-85
LAB NO:	16261
SAMPLE TYPE:	AIR
DATE SAMPLED:	8/5/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	385
SAMPLE VOLUME (cu.m):	0.77

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/24/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.065	ND
B-BHC	319-85-7	0.065	ND
LINDANE	58-89-9	0.065	ND
HEPTACHLOR	76-44-8	0.065	ND
D-BHC	319-86-8	0.065	ND
ALDRIN	309-00-2	0.065	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.065	ND
ENDOSULFAN I	959-98-8	0.065	ND
4,4'-DDE	72-55-9	0.065	ND
DIELDRIN	60-57-1	0.065	ND
ENDRIN	72-20-8	0.065	ND
4,4'-DDD	72-54-8	0.065	ND
ENDOSULFAN II	33212-65-9	0.065	ND
4,4'-DDT	50-29-3	0.065	ND
ENDRIN ALDEHYDE	7421-93-4	0.065	ND
ENDOSULFAN SULFATE	1031-07-8	0.065	ND
METHOXYCHLOR	72-43-5	0.065	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 9.30.98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10991-85
LAB NO:	16262
SAMPLE TYPE:	AIR
DATE SAMPLED:	8/5/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	375
SAMPLE VOLUME (cu.m):	0.75

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/25/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.067	ND
B-BHC	319-85-7	0.067	ND
LINDANE	58-89-9	0.067	ND
HEPTACHLOR	76-44-8	0.067	ND
D-BHC	319-86-8	0.067	ND
ALDRIN	309-00-2	0.067	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.067	ND
ENDOSULFAN I	959-98-8	0.067	ND
4,4'-DDE	72-55-9	0.067	ND
DIELDRIN	60-57-1	0.067	ND
ENDRIN	72-20-8	0.067	ND
4,4'-DDD	72-54-8	0.067	ND
ENDOSULFAN II	33212-65-9	0.067	ND
4,4'-DDT	50-29-3	0.067	ND
ENDRIN ALDEHYDE	7421-93-4	0.067	ND
ENDOSULFAN SULFATE	1031-07-8	0.067	ND
METHOXYCHLOR	72-43-5	0.067	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 9.30.98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10994-86
LAB NO:	16263
SAMPLE TYPE:	AIR
DATE SAMPLED:	8/6/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	320
SAMPLE VOLUME (cu.m):	0.64

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/25/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.078	ND
B-BHC	319-85-7	0.078	ND
LINDANE	58-89-9	0.078	ND
HEPTACHLOR	76-44-8	0.078	ND
D-BHC	319-86-8	0.078	ND
ALDRIN	309-00-2	0.078	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.078	ND
ENDOSULFAN I	959-98-8	0.078	ND
4,4'-DDE	72-55-9	0.078	ND
DIELDRIN	60-57-1	0.078	ND
ENDRIN	72-20-8	0.078	ND
4,4'-DDD	72-54-8	0.078	ND
ENDOSULFAN II	33212-65-9	0.078	ND
4,4'-DDT	50-29-3	0.078	ND
ENDRIN ALDEHYDE	7421-93-4	0.078	ND
ENDOSULFAN SULFATE	1031-07-8	0.078	ND
METHOXYCHLOR	72-43-5	0.078	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 9.30.98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10715-86
LAB NO: 16264
SAMPLE TYPE: AIR
DATE SAMPLED: 8/6/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 320
SAMPLE VOLUME (cu.m): 0.64

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/25/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.078	ND
B-BHC	319-85-7	0.078	ND
LINDANE	58-89-9	0.078	ND
HEPTACHLOR	76-44-8	0.078	ND
D-BHC	319-86-8	0.078	ND
ALDRIN	309-00-2	0.078	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.078	ND
ENDOSULFAN I	959-98-8	0.078	ND
4,4'-DDE	72-55-9	0.078	ND
DIELDRIN	60-57-1	0.078	ND
ENDRIN	72-20-8	0.078	ND
4,4'-DDD	72-54-8	0.078	ND
ENDOSULFAN II	33212-65-9	0.078	ND
4,4'-DDT	50-29-3	0.078	ND
ENDRIN ALDEHYDE	7421-93-4	0.078	ND
ENDOSULFAN SULFATE	1031-07-8	0.078	ND
METHOXYCHLOR	72-43-5	0.078	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 9-30-98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10991-86
LAB NO:	16265
SAMPLE TYPE:	AIR
DATE SAMPLED:	8/6/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	320
SAMPLE VOLUME (cu.m):	0.64

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/25/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.078	ND
B-BHC	319-85-7	0.078	ND
LINDANE	58-89-9	0.078	ND
HEPTACHLOR	76-44-8	0.078	ND
D-BHC	319-86-8	0.078	ND
ALDRIN	309-00-2	0.078	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.078	ND
ENDOSULFAN I	959-98-8	0.078	ND
4,4'-DDE	72-55-9	0.078	ND
DIELDRIN	60-57-1	0.078	ND
ENDRIN	72-20-8	0.078	ND
4,4'-DDD	72-54-8	0.078	ND
ENDOSULFAN II	33212-65-9	0.078	ND
4,4'-DDT	50-29-3	0.078	ND
ENDRIN ALDEHYDE	7421-93-4	0.078	ND
ENDOSULFAN SULFATE	1031-07-8	0.078	ND
METHOXYCHLOR	72-43-5	0.078	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 9.30.98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10991-87
LAB NO:	16266
SAMPLE TYPE:	AIR
DATE SAMPLED:	8/7/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	480
SAMPLE VOLUME (cu.m):	0.96

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/25/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.052	ND
B-BHC	319-85-7	0.052	ND
LINDANE	58-89-9	0.052	ND
HEPTACHLOR	76-44-8	0.052	ND
D-BHC	319-86-8	0.052	ND
ALDRIN	309-00-2	0.052	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.052	ND
ENDOSULFAN I	959-98-8	0.052	ND
4,4'-DDE	72-55-9	0.052	ND
DIELDRIN	60-57-1	0.052	ND
ENDRIN	72-20-8	0.052	ND
4,4'-DDD	72-54-8	0.052	ND
ENDOSULFAN II	33212-65-9	0.052	ND
4,4'-DDT	50-29-3	0.052	ND
ENDRIN ALDEHYDE	7421-93-4	0.052	ND
ENDOSULFAN SULFATE	1031-07-8	0.052	ND
METHOXYCHLOR	72-43-5	0.052	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: RB
DATE: 9.30.98

APPROVED BY: RAC
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10994-87
LAB NO:	16267
SAMPLE TYPE:	AIR
DATE SAMPLED:	8/7/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	480
SAMPLE VOLUME (cu.m):	0.96

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/25/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.052	ND
B-BHC	319-85-7	0.052	ND
LINDANE	58-89-9	0.052	ND
HEPTACHLOR	76-44-8	0.052	ND
D-BHC	319-86-8	0.052	ND
ALDRIN	309-00-2	0.052	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.052	ND
ENDOSULFAN I	959-98-8	0.052	ND
4,4'-DDE	72-55-9	0.052	ND
DIELDRIN	60-57-1	0.052	ND
ENDRIN	72-20-8	0.052	ND
4,4'-DDD	72-54-8	0.052	0.094
ENDOSULFAN II	33212-65-9	0.052	ND
4,4'-DDT	50-29-3	0.052	ND
ENDRIN ALDEHYDE	7421-93-4	0.052	ND
ENDOSULFAN SULFATE	1031-07-8	0.052	ND
METHOXYCHLOR	72-43-5	0.052	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 9.30.98

APPROVED BY: MK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10715-87
LAB NO:	16268
SAMPLE TYPE:	AIR
DATE SAMPLED:	8/7/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	480
SAMPLE VOLUME (cu.m):	0.96

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/25/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.052	ND
B-BHC	319-85-7	0.052	ND
LINDANE	58-89-9	0.052	ND
HEPTACHLOR	76-44-8	0.052	ND
D-BHC	319-86-8	0.052	ND
ALDRIN	309-00-2	0.052	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.052	ND
ENDOSULFAN I	959-98-8	0.052	ND
4,4'-DDE	72-55-9	0.052	ND
DIELDRIN	60-57-1	0.052	ND
ENDRIN	72-20-8	0.052	ND
4,4'-DDD	72-54-8	0.052	ND
ENDOSULFAN II	33212-65-9	0.052	ND
4,4'-DDT	50-29-3	0.052	ND
ENDRIN ALDEHYDE	7421-93-4	0.052	ND
ENDOSULFAN SULFATE	1031-07-8	0.052	ND
METHOXYCHLOR	72-43-5	0.052	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AS
DATE: 9.30.98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10715-812
LAB NO: 16269
SAMPLE TYPE: AIR
DATE SAMPLED: 8/12/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 480
SAMPLE VOLUME (cu.m): 0.96

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/25/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.052	ND
B-BHC	319-85-7	0.052	ND
LINDANE	58-89-9	0.052	ND
HEPTACHLOR	76-44-8	0.052	ND
D-BHC	319-86-8	0.052	ND
ALDRIN	309-00-2	0.052	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.052	ND
ENDOSULFAN I	959-98-8	0.052	ND
4,4'-DDE	72-55-9	0.052	ND
DIELDRIN	60-57-1	0.052	ND
ENDRIN	72-20-8	0.052	ND
4,4'-DDD	72-54-8	0.052	ND
ENDOSULFAN II	33212-65-9	0.052	ND
4,4'-DDT	50-29-3	0.052	ND
ENDRIN ALDEHYDE	7421-93-4	0.052	ND
ENDOSULFAN SULFATE	1031-07-8	0.052	ND
METHOXYCHLOR	72-43-5	0.052	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: RG
DATE: 9.30.98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10991-812
LAB NO: 16270
SAMPLE TYPE: AIR
DATE SAMPLED: 8/12/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 480
SAMPLE VOLUME (cu.m): 0.96

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/25/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.052	ND
B-BHC	319-85-7	0.052	ND
LINDANE	58-89-9	0.052	ND
HEPTACHLOR	76-44-8	0.052	ND
D-BHC	319-86-8	0.052	ND
ALDRIN	309-00-2	0.052	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.052	ND
ENDOSULFAN I	959-98-8	0.052	ND
4,4'-DDE	72-55-9	0.052	ND
DIELDRIN	60-57-1	0.052	ND
ENDRIN	72-20-8	0.052	ND
4,4'-DDD	72-54-8	0.052	ND
ENDOSULFAN II	33212-65-9	0.052	ND
4,4'-DDT	50-29-3	0.052	ND
ENDRIN ALDEHYDE	7421-93-4	0.052	ND
ENDOSULFAN SULFATE	1031-07-8	0.052	ND
METHOXYCHLOR	72-43-5	0.052	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 9.30.98

APPROVED BY: RMS
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10715-813
LAB NO:	16271
SAMPLE TYPE:	AIR
DATE SAMPLED:	8/13/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	525
SAMPLE VOLUME (cu.m):	1.05

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/25/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.048	ND
B-BHC	319-85-7	0.048	ND
LINDANE	58-89-9	0.048	ND
HEPTACHLOR	76-44-8	0.048	ND
D-BHC	319-86-8	0.048	ND
ALDRIN	309-00-2	0.048	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.048	ND
ENDOSULFAN I	959-98-8	0.048	ND
4,4'-DDE	72-55-9	0.048	ND
DIELDRIN	60-57-1	0.048	ND
ENDRIN	72-20-8	0.048	ND
4,4'-DDD	72-54-8	0.048	ND
ENDOSULFAN II	33212-65-9	0.048	ND
4,4'-DDT	50-29-3	0.048	ND
ENDRIN ALDEHYDE	7421-93-4	0.048	ND
ENDOSULFAN SULFATE	1031-07-8	0.048	ND
METHOXYCHLOR	72-43-5	0.048	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 9.30.98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10994-813
LAB NO:	16272
SAMPLE TYPE:	AIR
DATE SAMPLED:	8/13/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	525
SAMPLE VOLUME (cu.m):	1.05

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/25/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.048	ND
B-BHC	319-85-7	0.048	ND
LINDANE	58-89-9	0.048	ND
HEPTACHLOR	76-44-8	0.048	ND
D-BHC	319-86-8	0.048	ND
ALDRIN	309-00-2	0.048	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.048	ND
ENDOSULFAN I	959-98-8	0.048	ND
4,4'-DDE	72-55-9	0.048	ND
DIELDRIN	60-57-1	0.048	ND
ENDRIN	72-20-8	0.048	ND
4,4'-DDD	72-54-8	0.048	ND
ENDOSULFAN II	33212-65-9	0.048	ND
4,4'-DDT	50-29-3	0.048	ND
ENDRIN ALDEHYDE	7421-93-4	0.048	ND
ENDOSULFAN SULFATE	1031-07-8	0.048	ND
METHOXYCHLOR	72-43-5	0.048	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 9.30.98

APPROVED BY: MAK
DATE: 10/6/98

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 5 AUGUST 98
Site: LRTC	Time Period Sampled: /
Project Location: RICHMOND	Client Project No.: 486 01 03015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10715	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10715-85

Adsorbent: XAD-2

Sample Number: 16261

Sampling Data:

Start Time: 08:15 Stop Time: 14:40

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:15	2.4					
14:40	2.5					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 5 AUGUST 98
Site: LRTC	Time Period Sampled: /
Project Location: RICHMOND	Client Project No.: 4860103015
Instrument Model No.: MSA - ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10991	Total Sample Volume: /

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: /

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: 10991-85

Adsorbent: XAD-2 Sample Number: 16262

Sampling Data:

Start Time: 08:30 Stop Time: 14:45

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:30	2.4					
14:45	2.3					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES

Date/s Sampled: 8/6/98

Site: LRTC

Time Period Sampled:

Project Location: Richmond

Client Project No.: 4869109015

Instrument Model No.:

Sampler (Signature):

Pump Serial No.: MSA 10994

Total Sample Volume:

Calibrated By: _____

Bubble Flow Meter (mL/min): _____

Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____

Sample ID: 16263

Adsorbent: XAD-2

Sample Number: 10994-86

Sampling Data:

Start Time: 11:10

Stop Time: 4:30

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
11:10	2.1					
4:30	2.1					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES Environmental

Date/s Sampled: 8/6/98

Site: LRTC

Time Period Sampled:

Project Location: Richmond

Client Project No.: 4860103015

Instrument Model No.:

Sampler (Signature):

Pump Serial No.: MSA 10715

Total Sample Volume:

Calibrated By: _____

Bubble Flow Meter (mL/min): _____

Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____

Sample ID: 16264

Adsorbent: XAD-2

Sample Number: 10715-86

Sampling Data:

Start Time: 11:10

Stop Time: 4:30

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
11:10	2.2					
4:30	2.2					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES Environmental

Date/s Sampled: 8/6/98

Site: LRTC

Time Period Sampled:

Project Location: Richmond

Client Project No.: 4860103015

Instrument Model No.:

Sampler (Signature):

Pump Serial No.: MSA 10991

Total Sample Volume:

Calibrated By: _____

Bubble Flow Meter (mL/min): _____

Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____

Sample ID: 16265

Adsorbent: XAD-2

Sample Number: 10991-86

Sampling Data:

Start Time: 11:10

Stop Time: 4:30

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
11:10	2.2					
4:30	2.2					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES Environmental

Date/s Sampled: 8/7/98

Site: LRTC

Time Period Sampled:

Project Location: Richmond

Client Project No.: 4860103015

Instrument Model No.:

Sampler (Signature):

Pump Serial No.: MAS 10991

Total Sample Volume:

Calibrated By: _____

Bubble Flow Meter (mL/min): _____

Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____

Sample ID: 16266

Adsorbent: XAD-2

Sample Number: 10991-87

Sampling Data:

Start Time: 7:30

Stop Time: 15:30

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
7:30	2.2					
12:00	2.2					
15:30	2.2					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES Environmental

Date/s Sampled: 8/7/98

Site: LRTC

Time Period Sampled:

Project Location: Richmond

Client Project No.: 4860103015

Instrument Model No.:

Sampler (Signature):

Pump Serial No.: MAS -10994

Total Sample Volume:

Calibrated By: _____

Bubble Flow Meter (mL/min): _____

Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____

Sample ID: 10994-87

Adsorbent: XAD-2

Sample Number: 16267

Sampling Data:

Start Time: 7:30

Stop Time: 15:30

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
7:30	2.2					
12:00	2.2					
15:30	2.2					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES Environmental

Date/s Sampled: 8/7/98

Site: LRTC

Time Period Sampled:

Project Location: Richmond

Client Project No.: 4860103015

Instrument Model No.:

Sampler (Signature):

Pump Serial No.: MAS - 10725

Total Sample Volume:

Calibrated By: _____

Bubble Flow Meter (mL/min): _____

Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____

Sample ID: 10715-87

Adsorbent: XAD - 2

Sample Number: 16268

Sampling Data:

Start Time: 7:30

Stop Time: 15:30

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
7:30	2.1					
12:00	2.1					
15:30	2.2					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 8/12/98
Site: LRTC	Time Period Sampled:
Project Location: Richmond	Client Project No.: 4860103015
Instrument Model No.: MAS-Escort	Sampler (Signature):
Pump Serial No.: MAS-10715	Total Sample Volume:

Calibrated By: _____

Bubble Flow Meter (mL/min): _____ Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____ Sample ID: 10715-812

Adsorbent: XAD-2 Sample Number: 16269

Sampling Data:

Start Time: 0900 Stop Time: 1600

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
0900	2					
1600	[illegible]					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES

Date/s Sampled: 8/12/98

Site: LRTC

Time Period Sampled:

Project Location: Richmond

Client Project No.: 486010301 5

Instrument Model No.: MAS-Escort

Sampler (Signature):

Pump Serial No.: MAS-1091

Total Sample Volume:

Calibrated By: _____

Bubble Flow Meter (mL/min): _____

Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____

Sample ID: 1099-812

Adsorbent: XAD-2

Sample Number: 16270

Sampling Data:

Start Time: 800

Stop Time: 1600

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
800	2.2					
1600	2.2					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PTS Environmental	Date/s Sampled: 8/13/98
Site: LRTC	Time Period Sampled:
Project Location: Richmond	Client Project No.: 4860103015
Instrument Model No.:	Sampler (Signature):
Pump Serial No.: MSA-10715	Total Sample Volume:

Calibrated By: _____

Bubble Flow Meter (mL/min): _____ Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____ Sample ID: 10715-813

Adsorbent: XAD-2 Sample Number: 16271

Sampling Data:

Start Time: 7:30 Stop Time: _____

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
7:30	2.3					
1615	2.8					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES Environmental	Date/s Sampled: 8/13/98
Site: LRTC	Time Period Sampled:
Project Location:	Client Project No.: 4860103015
Instrument Model No.: MSA Escort	Sampler (Signature):
Pump Serial No.: MSA - 10994	Total Sample Volume:

Calibrated By: _____

Bubble Flow Meter (mL/min): _____ Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____ Sample ID: 10994-813

Adsorbent: XAD-2 Sample Number: 16272

Sampling Data:

Start Time: 7:30 Stop Time: _____

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
7:30	2.2					
16:15	2.2					

PES ENVIRONMENTAL, Inc.
Engineering & Environmental Services

CHAIN OF CUSTODY RECORD

KPI PROJ # 9418

1682 NOVATO BOULEVARD, SUITE 100
NOVATO, CALIFORNIA 94947
(415) 899-1600 FAX (415) 899-1601

SAMPLERS: DJS

JOB NUMBER: 8·486 0103015

NAME / LOCATION: LRTC

PROJECT MANAGER: BILL FRIZZEL

RECORDER: [signature]

DATE YR	MO	DY	TIME	SAMPLE NUMBER / DESIGNATION	SOURCE CODE	MATRIX: AIR	Water	Sedim't	Soil	Oil	# CONTAINERS & PRESERV.: Unpres.	H_2SO_4	HNO_3	HCl	Filtered	KPI SMP#	DEPTH IN FEET	COL MTD CD	QA CODE	ANALYSIS REQUESTED: EPA 601 / 8010	EPA 602 / 8020 (BTEX)	EPA 624 / 8240	EPA 625 / 8270	TPHg by 5030 / 8015 (mod)	TPHd by 3550 / 8015 (mod)	8080 (PESTICIDES)
98	08	05	—	10715-85	60	X					1					16261										X
98	08	05	—	10991-85												16262										
98	08	06	—	10994-86												16263										
98	08	06	—	10715-86												16264										
98	08	06	—	10991-86												16265										
98	08	07	—	10991-87												16266										
98	08	07	—	10994-87												16267										
98	08	07	—	10715-87												16268										
98	08	12	—	10715-812												16269										
98	08	12	—	10991-812												16270										
98	08	13	—	10715-813												16271										
98	08	13	—	~~10715-813~~												16272										

10994-813 gb 14Sep98

NOTE
STANDARD TAT

CHAIN OF CUSTODY RECORD

RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
[signature]	Enal (VTC)	9/11/98	1:00
Enal (VTC)	[signature]	9.11.98	350

DISPATCHED BY: (Signature)	DATE	TIME	RECEIVED FOR LAB BY: (Signature)	DATE	TIME

METHOD OF SHIPMENT:

K PRIME, Inc.
CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 10.06.98

TO: Mr. BILL FRIZELL
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct: 9418
Project: 486.0103.015

FROM: Richard A. Kagel, Ph.D. RAK 10/6/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.015" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
10991-825	AIR	08.25.98	16273
10994-825	AIR	08.25.98	16274
10991-828	AIR	08.28.98	16275
10994-828	AIR	08.28.98	16276
10991-831	AIR	08.31.98	16277
10994-831	AIR	08.31.98	16278
10991-91	AIR	09.01.98	16279
10994-91	AIR	09.01.98	16280
10991-92	AIR	09.02.98	16281
10994-92	AIR	09.02.98	16282
10991-93	AIR	09.03.98	16283
10994-93	AIR	09.03.98	16284

These samples were received in our laboratory on 09.11.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10991-825
LAB NO: 16273
SAMPLE TYPE: AIR
DATE SAMPLED: 8/25/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 420
SAMPLE VOLUME (cu.m): 0.84

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/25/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.060	ND
B-BHC	319-85-7	0.060	ND
LINDANE	58-89-9	0.060	ND
HEPTACHLOR	76-44-8	0.060	ND
D-BHC	319-86-8	0.060	ND
ALDRIN	309-00-2	0.060	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.060	ND
ENDOSULFAN I	959-98-8	0.060	ND
4,4'-DDE	72-55-9	0.060	ND
DIELDRIN	60-57-1	0.060	ND
ENDRIN	72-20-8	0.060	ND
4,4'-DDD	72-54-8	0.060	0.060
ENDOSULFAN II	33212-65-9	0.060	ND
4,4'-DDT	50-29-3	0.060	ND
ENDRIN ALDEHYDE	7421-93-4	0.060	ND
ENDOSULFAN SULFATE	1031-07-8	0.060	ND
METHOXYCHLOR	72-43-5	0.060	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10-1-98

APPROVED BY: MAM
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10994-825
LAB NO:	16274
SAMPLE TYPE:	AIR
DATE SAMPLED:	8/25/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	420
SAMPLE VOLUME (cu.m):	0.84

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/25/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.060	ND
B-BHC	319-85-7	0.060	ND
LINDANE	58-89-9	0.060	ND
HEPTACHLOR	76-44-8	0.060	ND
D-BHC	319-86-8	0.060	ND
ALDRIN	309-00-2	0.060	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.060	ND
ENDOSULFAN I	959-98-8	0.060	ND
4,4'-DDE	72-55-9	0.060	ND
DIELDRIN	60-57-1	0.060	ND
ENDRIN	72-20-8	0.060	ND
4,4'-DDD	72-54-8	0.060	ND
ENDOSULFAN II	33212-65-9	0.060	ND
4,4'-DDT	50-29-3	0.060	ND
ENDRIN ALDEHYDE	7421-93-4	0.060	ND
ENDOSULFAN SULFATE	1031-07-8	0.060	ND
METHOXYCHLOR	72-43-5	0.060	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10.1.98

APPROVED BY: MAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10991-828
LAB NO:	16275
SAMPLE TYPE:	AIR
DATE SAMPLED:	8/28/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	390
SAMPLE VOLUME (cu.m):	0.78

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/25/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.064	ND
B-BHC	319-85-7	0.064	ND
LINDANE	58-89-9	0.064	ND
HEPTACHLOR	76-44-8	0.064	ND
D-BHC	319-86-8	0.064	ND
ALDRIN	309-00-2	0.064	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.064	ND
ENDOSULFAN I	959-98-8	0.064	ND
4,4'-DDE	72-55-9	0.064	ND
DIELDRIN	60-57-1	0.064	ND
ENDRIN	72-20-8	0.064	ND
4,4'-DDD	72-54-8	0.064	ND
ENDOSULFAN II	33212-65-9	0.064	ND
4,4'-DDT	50-29-3	0.064	ND
ENDRIN ALDEHYDE	7421-93-4	0.064	ND
ENDOSULFAN SULFATE	1031-07-8	0.064	ND
METHOXYCHLOR	72-43-5	0.064	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10.1.98

APPROVED BY: BAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10994-828
LAB NO:	16276
SAMPLE TYPE:	AIR
DATE SAMPLED:	8/28/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	390
SAMPLE VOLUME (cu.m):	0.78

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/25/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.064	ND
B-BHC	319-85-7	0.064	ND
LINDANE	58-89-9	0.064	ND
HEPTACHLOR	76-44-8	0.064	ND
D-BHC	319-86-8	0.064	ND
ALDRIN	309-00-2	0.064	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.064	ND
ENDOSULFAN I	959-98-8	0.064	ND
4,4'-DDE	72-55-9	0.064	ND
DIELDRIN	60-57-1	0.064	ND
ENDRIN	72-20-8	0.064	ND
4,4'-DDD	72-54-8	0.064	ND
ENDOSULFAN II	33212-65-9	0.064	ND
4,4'-DDT	50-29-3	0.064	ND
ENDRIN ALDEHYDE	7421-93-4	0.064	ND
ENDOSULFAN SULFATE	1031-07-8	0.064	ND
METHOXYCHLOR	72-43-5	0.064	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10·1·98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10991-831
LAB NO:	16277
SAMPLE TYPE:	AIR
DATE SAMPLED:	8/31/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	390
SAMPLE VOLUME (cu.m):	0.78

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/26/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.064	ND
B-BHC	319-85-7	0.064	ND
LINDANE	58-89-9	0.064	ND
HEPTACHLOR	76-44-8	0.064	ND
D-BHC	319-86-8	0.064	ND
ALDRIN	309-00-2	0.064	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.064	ND
ENDOSULFAN I	959-98-8	0.064	ND
4,4'-DDE	72-55-9	0.064	ND
DIELDRIN	60-57-1	0.064	ND
ENDRIN	72-20-8	0.064	ND
4,4'-DDD	72-54-8	0.064	ND
ENDOSULFAN II	33212-65-9	0.064	ND
4,4'-DDT	50-29-3	0.064	ND
ENDRIN ALDEHYDE	7421-93-4	0.064	ND
ENDOSULFAN SULFATE	1031-07-8	0.064	ND
METHOXYCHLOR	72-43-5	0.064	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10.1.98

APPROVED BY: MAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-831
LAB NO: 16278
SAMPLE TYPE: AIR
DATE SAMPLED: 8/31/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 390
SAMPLE VOLUME (cu.m): 0.78

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/26/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.064	ND
B-BHC	319-85-7	0.064	ND
LINDANE	58-89-9	0.064	ND
HEPTACHLOR	76-44-8	0.064	ND
D-BHC	319-86-8	0.064	ND
ALDRIN	309-00-2	0.064	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.064	ND
ENDOSULFAN I	959-98-8	0.064	ND
4,4'-DDE	72-55-9	0.064	ND
DIELDRIN	60-57-1	0.064	ND
ENDRIN	72-20-8	0.064	ND
4,4'-DDD	72-54-8	0.064	ND
ENDOSULFAN II	33212-65-9	0.064	ND
4,4'-DDT	50-29-3	0.064	ND
ENDRIN ALDEHYDE	7421-93-4	0.064	ND
ENDOSULFAN SULFATE	1031-07-8	0.064	ND
METHOXYCHLOR	72-43-5	0.064	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10-1-98

APPROVED BY: MAC
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10991-91
LAB NO:	16279
SAMPLE TYPE:	AIR
DATE SAMPLED:	9/1/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	390
SAMPLE VOLUME (cu.m):	0.78

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/26/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.064	ND
B-BHC	319-85-7	0.064	ND
LINDANE	58-89-9	0.064	ND
HEPTACHLOR	76-44-8	0.064	ND
D-BHC	319-86-8	0.064	ND
ALDRIN	309-00-2	0.064	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.064	ND
ENDOSULFAN I	959-98-8	0.064	ND
4,4'-DDE	72-55-9	0.064	ND
DIELDRIN	60-57-1	0.064	ND
ENDRIN	72-20-8	0.064	ND
4,4'-DDD	72-54-8	0.064	ND
ENDOSULFAN II	33212-65-9	0.064	ND
4,4'-DDT	50-29-3	0.064	ND
ENDRIN ALDEHYDE	7421-93-4	0.064	ND
ENDOSULFAN SULFATE	1031-07-8	0.064	ND
METHOXYCHLOR	72-43-5	0.064	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10.1.98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-91
LAB NO: 16280
SAMPLE TYPE: AIR
DATE SAMPLED: 9/1/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 390
SAMPLE VOLUME (cu.m): 0.78

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/26/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.064	ND
B-BHC	319-85-7	0.064	ND
LINDANE	58-89-9	0.064	ND
HEPTACHLOR	76-44-8	0.064	ND
D-BHC	319-86-8	0.064	ND
ALDRIN	309-00-2	0.064	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.064	ND
ENDOSULFAN I	959-98-8	0.064	ND
4,4'-DDE	72-55-9	0.064	ND
DIELDRIN	60-57-1	0.064	ND
ENDRIN	72-20-8	0.064	ND
4,4'-DDD	72-54-8	0.064	ND
ENDOSULFAN II	33212-65-9	0.064	ND
4,4'-DDT	50-29-3	0.064	ND
ENDRIN ALDEHYDE	7421-93-4	0.064	ND
ENDOSULFAN SULFATE	1031-07-8	0.064	ND
METHOXYCHLOR	72-43-5	0.064	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10.1.98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10991-92
LAB NO: 16281
SAMPLE TYPE: AIR
DATE SAMPLED: 9/2/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 345
SAMPLE VOLUME (cu.m): 0.69

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/26/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.072	ND
B-BHC	319-85-7	0.072	ND
LINDANE	58-89-9	0.072	ND
HEPTACHLOR	76-44-8	0.072	ND
D-BHC	319-86-8	0.072	ND
ALDRIN	309-00-2	0.072	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.072	ND
ENDOSULFAN I	959-98-8	0.072	ND
4,4'-DDE	72-55-9	0.072	ND
DIELDRIN	60-57-1	0.072	ND
ENDRIN	72-20-8	0.072	ND
4,4'-DDD	72-54-8	0.072	ND
ENDOSULFAN II	33212-65-9	0.072	ND
4,4'-DDT	50-29-3	0.072	ND
ENDRIN ALDEHYDE	7421-93-4	0.072	ND
ENDOSULFAN SULFATE	1031-07-8	0.072	ND
METHOXYCHLOR	72-43-5	0.072	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10.1.98

APPROVED BY: RMK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10994-92
LAB NO:	16282
SAMPLE TYPE:	AIR
DATE SAMPLED:	9/2/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	345
SAMPLE VOLUME (cu.m):	0.69

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/26/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.072	ND
B-BHC	319-85-7	0.072	ND
LINDANE	58-89-9	0.072	ND
HEPTACHLOR	76-44-8	0.072	ND
D-BHC	319-86-8	0.072	ND
ALDRIN	309-00-2	0.072	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.072	ND
ENDOSULFAN I	959-98-8	0.072	ND
4,4'-DDE	72-55-9	0.072	ND
DIELDRIN	60-57-1	0.072	ND
ENDRIN	72-20-8	0.072	ND
4,4'-DDD	72-54-8	0.072	ND
ENDOSULFAN II	33212-65-9	0.072	ND
4,4'-DDT	50-29-3	0.072	ND
ENDRIN ALDEHYDE	7421-93-4	0.072	ND
ENDOSULFAN SULFATE	1031-07-8	0.072	ND
METHOXYCHLOR	72-43-5	0.072	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10.1.98

APPROVED BY: BAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10991-93
LAB NO: 16283
SAMPLE TYPE: AIR
DATE SAMPLED: 9/3/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 395
SAMPLE VOLUME (cu.m): 0.79

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/26/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.063	ND
B-BHC	319-85-7	0.063	ND
LINDANE	58-89-9	0.063	ND
HEPTACHLOR	76-44-8	0.063	ND
D-BHC	319-86-8	0.063	ND
ALDRIN	309-00-2	0.063	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.063	ND
ENDOSULFAN I	959-98-8	0.063	ND
4,4'-DDE	72-55-9	0.063	ND
DIELDRIN	60-57-1	0.063	ND
ENDRIN	72-20-8	0.063	ND
4,4'-DDD	72-54-8	0.063	ND
ENDOSULFAN II	33212-65-9	0.063	ND
4,4'-DDT	50-29-3	0.063	ND
ENDRIN ALDEHYDE	7421-93-4	0.063	ND
ENDOSULFAN SULFATE	1031-07-8	0.063	ND
METHOXYCHLOR	72-43-5	0.063	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10.1.98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10994-93
LAB NO:	16284
SAMPLE TYPE:	AIR
DATE SAMPLED:	9/3/98
TIME SAMPLED:	NA
SAMPLING DURATION (MINUTES):	395
SAMPLE VOLUME (cu.m):	0.79

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/26/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.063	ND
B-BHC	319-85-7	0.063	ND
LINDANE	58-89-9	0.063	ND
HEPTACHLOR	76-44-8	0.063	ND
D-BHC	319-86-8	0.063	ND
ALDRIN	309-00-2	0.063	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.063	ND
ENDOSULFAN I	959-98-8	0.063	ND
4,4'-DDE	72-55-9	0.063	ND
DIELDRIN	60-57-1	0.063	ND
ENDRIN	72-20-8	0.063	ND
4,4'-DDD	72-54-8	0.063	ND
ENDOSULFAN II	33212-65-9	0.063	ND
4,4'-DDT	50-29-3	0.063	ND
ENDRIN ALDEHYDE	7421-93-4	0.063	ND
ENDOSULFAN SULFATE	1031-07-8	0.063	ND
METHOXYCHLOR	72-43-5	0.063	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AG
DATE: 10.1.98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

25 24500

SAMPLING DATA SHEET

Client/Project ID: PES

Date/s Sampled: 25 AUGUST 98

Site: LRTC

Time Period Sampled:

Project Location: RICHMOND

Client Project No.: 4860103015

Instrument Model No.: MSA - ESCORT

Sampler (Signature): Don Lyman

Pump Serial No.: 10991

Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000

Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10991-825

Adsorbent: XAD-2

Sample Number: 16273

Sampling Data:

Start Time: 08:05

Stop Time: 15:05

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:05	2.4					
15:05	2.5					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: P&S	Date/s Sampled: 25 AUGUST 98
Site: LRTC	Time Period Sampled: /
Project Location: RICHMOND	Client Project No.: 4860103015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10994	Total Sample Volume: /

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000

Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10994-825

Adsorbent: XAD-2

Sample Number: 16274

Sampling Data:

Start Time: 08:00

Stop Time: 15:00

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:00	2.2					
15:00	2.2					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 8-28-98
Site: LRT C	Time Period Sampled: /
Project Location: RICHMOND	Client Project No.: 486 0103015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10991	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10991-828

Adsorbent: XAD-2

Sample Number: 16275

Sampling Data:

Start Time: 08:00 Stop Time: 14:30

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:00	2.3					
14:30	2.5					

K PRIME, INC.
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3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 28 AUGUST 98
Site: LRTC	Time Period Sampled: /
Project Location: RICHMOND	Client Project No.: 4860103 015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10994	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000

Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10994-828

Adsorbent: XAD-2

Sample Number: 16276

Sampling Data:

Start Time: 08:05

Stop Time: 14:35

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:05	2.1					
14:35	2.2					

9-5
948 0455

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES

Date/s Sampled: 31 AUGUST 98

Site: LRTC

Time Period Sampled: /

Project Location: RICHMOND

Client Project No.: 4B6010301 5

Instrument Model No.: MSA-ESCORT

Sampler (Signature): [signature]

Pump Serial No.: 10991

Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000

Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10991-831

Adsorbent: XAD-2

Sample Number: 16277

Sampling Data:

Start Time: 09:00

Stop Time: 15:30

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
09:00	2.4					
15:30	2.3					

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CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES

Date/s Sampled: 31 AUGUST 98

Site: LRTC

Time Period Sampled: /

Project Location: RICHMOND

Client Project No.: 486 0103015

Instrument Model No.: MSA ESCORT

Sampler (Signature): [illegible]

Pump Serial No.: 10994

Total Sample Volume:

Calibrated By: ZAK

Bubble Flow Meter (mL/min): 2,000

Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10994-831

Adsorbent: XAD-2

Sample Number: 16278

Sampling Data:

Start Time: 09:05

Stop Time: 15:35

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
09:05	2.2					
15:35	2.2					

K PRIME, INC.
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3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 1 SEPTEMBER 98
Site: LRTC	Time Period Sampled: /
Project Location: RICHMOND	Client Project No.: 486 0103 015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10941	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # : Sample ID: 10991-91

Adsorbent: XAD-2 Sample Number: 16279

Sampling Data:

Start Time: 08:35 Stop Time: 15:05

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:35	2.4					
15:05	2.3					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 1 SEPTEMBER 98
Site: LRTC	Time Period Sampled: /
Project Location: RICHMOND	Client Project No.: 4860103015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [illegible]
Pump Serial No.: 109941	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10994-91

Adsorbent: XAD-2

Sample Number: 16280

Sampling Data:

Start Time: 08:30 Stop Time: 15:00

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:30	2.2					
15:00	2.2					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 2 SEPTEMBER 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.: 4186 0103 013
Instrument Model No.: MSA - ESCORT	Sampler (Signature): Tom Lymore
Pump Serial No.: 10991	Total Sample Volume:

Calibrated By: RAIC

Bubble Flow Meter (mL/min): 2.000 Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10991-92

Adsorbent: XAD-2

Sample Number: 16281

Sampling Data:

Start Time: 09:00 Stop Time: 14:45

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
09:00	2.3					
14:45	2.3					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 25 SEPTEMBER 98
Site: LRTC	Time Period Sampled: /
Project Location: RICHMOND	Client Project No.: 4860103 015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): Ron Lymar
Pump Serial No.: 10994	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Adsorbent: XAD-2

Sample ID: 10994-92

Sample Number: ~~16281~~ @ 9/14 16282

Sampling Data:

Start Time: 09:05 Stop Time: 14:50

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
09:05	2.1					
14:50	2.2					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 3 SEPTEMBER 98
Site: LRTC	Time Period Sampled: /
Project Location: RICHMOND	Client Project No.: 486 0103 015
Instrument Model No.: 10991	Sampler (Signature): [signature]
Pump Serial No.: MSA-ESCORT	Total Sample Volume:

Calibrated By: RAIC

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot #: XAD-2 Sample ID: 10991-93

Adsorbent: _____ Sample Number: 16283

Sampling Data:

Start Time: 08:45 Stop Time: 15:20

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:45	2.2					
15:20	2.3					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 8 & 3 SEPTEMBER 98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND	Client Project No.:
Instrument Model No.: MSA - ESCORT	Sampler (Signature):
Pump Serial No.: 10944	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2.1 Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10994-43

Adsorbent: XAD-2

Sample Number: 16284

Sampling Data:

Start Time: 08:50 Stop Time: 15:25

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:50	2.1					
15:25	2.1					

PES ENVIRONMENTAL, Inc.
Engineering & Environmental Services

CHAIN OF CUSTODY RECORD

KPI PROJ #9418

1682 NOVATO BOULEVARD, SUITE 100
NOVATO, CALIFORNIA 94947
(415) 899-1600 FAX (415) 899-1601

SAMPLERS: DJS

JOB NUMBER: 4860103015

NAME / LOCATION: LRTC

PROJECT MANAGER: BILL FRIZZEL

RECORDER: Don Eyman

DATE YR	MO	DY	TIME	SAMPLE NUMBER / DESIGNATION	SOURCE CODE	MATRIX: AIR	Water	Sedim't	Soil	Oil	# CONTAINERS & PRESERV.: Unpres.	H_2SO_4	HNO_3	HCl	Filtered	KPI SMP #	DEPTH IN FEET	COL MTD CD	QA CODE	ANALYSIS REQUESTED: EPA 601 / 8010	EPA 602 / 8020 (BTEX)	EPA 624 / 8240	EPA 625 / 8270	TPHg by 5030 / 8015 (mod)	TPHd by 3550 / 8015 (mod)	8080 (PESTICIDES)
98	08	25	—	10991-825	60	X					1					16273										X
98	08	25	—	10994-825	60											16274										
98	08	28	—	10991-828												16275										
98	08	28	—	10994-828												16276										
98	08	31	—	10991-831												16277										
98	08	31	—	10994-831												16278										
98	09	01	—	10991-91												16279										
98	09	01	—	10994-91												16280										
98	09	02	—	10991-92												16281										
98	09	02	—	10994-92												16282										
98	09	03	—	10991-93												16283										
98	09	03	—	10994-93												16284										

NOTE

STANDARD TAT

CHAIN OF CUSTODY RECORD

RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
Don Eyman	Ernst (VTC)	9/11/98	1:00
Ernst (VTC)	Ginger Breslee	9-11-98	3:50

DISPATCHED BY: (Signature)	DATE	TIME	RECEIVED FOR LAB BY: (Signature)	DATE	TIME

METHOD OF SHIPMENT:

K PRIME, Inc.

CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 10.06.98

TO: Mr. BILL FRIZEL
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Acct: 9418
Project: 486.0103.015

Phone: 415.899.1600
FAX: 415.899.1601

FROM: Richard A. Kagel, Ph.D. RAK 10/6/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.015" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
10991-98	AIR	09.08.98	16388
10994-98	AIR	09.08.98	16389
10991-911	AIR	09.11.98	16390
10994-911	AIR	09.11.98	16391
10991-914	AIR	09.14.98	16392
10994-914	AIR	09.14.98	16393
10991-915	AIR	09.15.98	16394
10994-915	AIR	09.15.98	16395

These samples were received in our laboratory on 09.22.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10991-98
LAB NO: 16388
SAMPLE TYPE: AIR
DATE SAMPLED: 9/8/98
TIME SAMPLED: 15:00
SAMPLING DURATION (MINUTES): 390
SAMPLE VOLUME (cu.m): 0.78

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/26/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.064	ND
B-BHC	319-85-7	0.064	ND
LINDANE	58-89-9	0.064	ND
HEPTACHLOR	76-44-8	0.064	ND
D-BHC	319-86-8	0.064	ND
ALDRIN	309-00-2	0.064	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.064	ND
ENDOSULFAN I	959-98-8	0.064	ND
4,4'-DDE	72-55-9	0.064	ND
DIELDRIN	60-57-1	0.064	ND
ENDRIN	72-20-8	0.064	ND
4,4'-DDD	72-54-8	0.064	ND
ENDOSULFAN II	33212-65-9	0.064	ND
4,4'-DDT	50-29-3	0.064	ND
ENDRIN ALDEHYDE	7421-93-4	0.064	ND
ENDOSULFAN SULFATE	1031-07-8	0.064	ND
METHOXYCHLOR	72-43-5	0.064	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10.1.98

APPROVED BY: RAM
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-98
LAB NO: 16389
SAMPLE TYPE: AIR
DATE SAMPLED: 9/8/98
TIME SAMPLED: 15:00
SAMPLING DURATION (MINUTES): 360
SAMPLE VOLUME (cu.m): 0.72

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/26/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.069	ND
B-BHC	319-85-7	0.069	ND
LINDANE	58-89-9	0.069	ND
HEPTACHLOR	76-44-8	0.069	ND
D-BHC	319-86-8	0.069	ND
ALDRIN	309-00-2	0.069	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.069	ND
ENDOSULFAN I	959-98-8	0.069	ND
4,4'-DDE	72-55-9	0.069	ND
DIELDRIN	60-57-1	0.069	ND
ENDRIN	72-20-8	0.069	ND
4,4'-DDD	72-54-8	0.069	ND
ENDOSULFAN II	33212-65-9	0.069	ND
4,4'-DDT	50-29-3	0.069	ND
ENDRIN ALDEHYDE	7421-93-4	0.069	ND
ENDOSULFAN SULFATE	1031-07-8	0.069	ND
METHOXYCHLOR	72-43-5	0.069	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AO
DATE: 10.1.98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10991-911
LAB NO: 16390
SAMPLE TYPE: AIR
DATE SAMPLED: 9/11/98
TIME SAMPLED: 15:00
SAMPLING DURATION (MINUTES): 420
SAMPLE VOLUME (cu.m): 0.84

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/26/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.060	ND
B-BHC	319-85-7	0.060	ND
LINDANE	58-89-9	0.060	ND
HEPTACHLOR	76-44-8	0.060	ND
D-BHC	319-86-8	0.060	ND
ALDRIN	309-00-2	0.060	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.060	ND
ENDOSULFAN I	959-98-8	0.060	ND
4,4'-DDE	72-55-9	0.060	ND
DIELDRIN	60-57-1	0.060	ND
ENDRIN	72-20-8	0.060	ND
4,4'-DDD	72-54-8	0.060	ND
ENDOSULFAN II	33212-65-9	0.060	ND
4,4'-DDT	50-29-3	0.060	ND
ENDRIN ALDEHYDE	7421-93-4	0.060	ND
ENDOSULFAN SULFATE	1031-07-8	0.060	ND
METHOXYCHLOR	72-43-5	0.060	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: HB
DATE: 10-1-98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-911
LAB NO: 16391
SAMPLE TYPE: AIR
DATE SAMPLED: 9/11/98
TIME SAMPLED: 15:05
SAMPLING DURATION (MINUTES): 390
SAMPLE VOLUME (cu.m): 0.78

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/26/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.064	ND
B-BHC	319-85-7	0.064	ND
LINDANE	58-89-9	0.064	ND
HEPTACHLOR	76-44-8	0.064	ND
D-BHC	319-86-8	0.064	ND
ALDRIN	309-00-2	0.064	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.064	ND
ENDOSULFAN I	959-98-8	0.064	ND
4,4'-DDE	72-55-9	0.064	ND
DIELDRIN	60-57-1	0.064	ND
ENDRIN	72-20-8	0.064	ND
4,4'-DDD	72-54-8	0.064	ND
ENDOSULFAN II	33212-65-9	0.064	ND
4,4'-DDT	50-29-3	0.064	ND
ENDRIN ALDEHYDE	7421-93-4	0.064	ND
ENDOSULFAN SULFATE	1031-07-8	0.064	ND
METHOXYCHLOR	72-43-5	0.064	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10.1.98

APPROVED BY: RAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID:	10991-914
LAB NO:	16392
SAMPLE TYPE:	AIR
DATE SAMPLED:	9/14/98
TIME SAMPLED:	16:00
SAMPLING DURATION (MINUTES):	420
SAMPLE VOLUME (cu.m):	0.84

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED:	9/26/98
UNITS:	UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.060	ND
B-BHC	319-85-7	0.060	ND
LINDANE	58-89-9	0.060	ND
HEPTACHLOR	76-44-8	0.060	ND
D-BHC	319-86-8	0.060	ND
ALDRIN	309-00-2	0.060	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.060	ND
ENDOSULFAN I	959-98-8	0.060	ND
4,4'-DDE	72-55-9	0.060	ND
DIELDRIN	60-57-1	0.060	ND
ENDRIN	72-20-8	0.060	ND
4,4'-DDD	72-54-8	0.060	ND
ENDOSULFAN II	33212-65-9	0.060	ND
4,4'-DDT	50-29-3	0.060	ND
ENDRIN ALDEHYDE	7421-93-4	0.060	ND
ENDOSULFAN SULFATE	1031-07-8	0.060	ND
METHOXYCHLOR	72-43-5	0.060	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: BB
DATE: 10·1·98

APPROVED BY: MAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-914
LAB NO: 16393
SAMPLE TYPE: AIR
DATE SAMPLED: 9/14/98
TIME SAMPLED: 16:00
SAMPLING DURATION (MINUTES): 435
SAMPLE VOLUME (cu.m): 0.87

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/26/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.057	ND
B-BHC	319-85-7	0.057	ND
LINDANE	58-89-9	0.057	ND
HEPTACHLOR	76-44-8	0.057	ND
D-BHC	319-86-8	0.057	ND
ALDRIN	309-00-2	0.057	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.057	ND
ENDOSULFAN I	959-98-8	0.057	ND
4,4'-DDE	72-55-9	0.057	ND
DIELDRIN	60-57-1	0.057	ND
ENDRIN	72-20-8	0.057	ND
4,4'-DDD	72-54-8	0.057	ND
ENDOSULFAN II	33212-65-9	0.057	ND
4,4'-DDT	50-29-3	0.057	ND
ENDRIN ALDEHYDE	7421-93-4	0.057	ND
ENDOSULFAN SULFATE	1031-07-8	0.057	ND
METHOXYCHLOR	72-43-5	0.057	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10.1.98

APPROVED BY: KAK
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10991-915
LAB NO: 16394
SAMPLE TYPE: AIR
DATE SAMPLED: 9/15/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 375
SAMPLE VOLUME (cu.m): 0.75

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/26/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.067	ND
B-BHC	319-85-7	0.067	ND
LINDANE	58-89-9	0.067	ND
HEPTACHLOR	76-44-8	0.067	ND
D-BHC	319-86-8	0.067	ND
ALDRIN	309-00-2	0.067	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.067	ND
ENDOSULFAN I	959-98-8	0.067	ND
4,4'-DDE	72-55-9	0.067	ND
DIELDRIN	60-57-1	0.067	ND
ENDRIN	72-20-8	0.067	ND
4,4'-DDD	72-54-8	0.067	ND
ENDOSULFAN II	33212-65-9	0.067	ND
4,4'-DDT	50-29-3	0.067	ND
ENDRIN ALDEHYDE	7421-93-4	0.067	ND
ENDOSULFAN SULFATE	1031-07-8	0.067	ND
METHOXYCHLOR	72-43-5	0.067	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: AB
DATE: 10.1.98

APPROVED BY: KMS
DATE: 10/6/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: 10994-915
LAB NO: 16395
SAMPLE TYPE: AIR
DATE SAMPLED: 9/15/98
TIME SAMPLED: NA
SAMPLING DURATION (MINUTES): 365
SAMPLE VOLUME (cu.m): 0.73

METHOD: 8080 PESTICIDES
REFERENCE: EPA TO4M/8080

DATE ANALYZED: 9/26/98
UNITS: UG/CU.M

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.068	ND
B-BHC	319-85-7	0.068	ND
LINDANE	58-89-9	0.068	ND
HEPTACHLOR	76-44-8	0.068	ND
D-BHC	319-86-8	0.068	ND
ALDRIN	309-00-2	0.068	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.068	ND
ENDOSULFAN I	959-98-8	0.068	ND
4,4'-DDE	72-55-9	0.068	ND
DIELDRIN	60-57-1	0.068	ND
ENDRIN	72-20-8	0.068	ND
4,4'-DDD	72-54-8	0.068	ND
ENDOSULFAN II	33212-65-9	0.068	ND
4,4'-DDT	50-29-3	0.068	ND
ENDRIN ALDEHYDE	7421-93-4	0.068	ND
ENDOSULFAN SULFATE	1031-07-8	0.068	ND
METHOXYCHLOR	72-43-5	0.068	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

PREPARED BY: RB
DATE: 10.1.98

APPROVED BY: MMS
DATE: 10/6/98

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 9/8/98
Site: LRTC	Time Period Sampled: /
Project Location: RICHMOND	Client Project No.: 4860103015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10991	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Adsorbent: XAD-2

Sample ID: 10991-98

Sample Number: 16388

Sampling Data:

Start Time: 08:30 Stop Time: 15:00

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:30	2.3					
15:00	2.4					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES

Date/s Sampled: 9/8/98

Site: LRTC

Time Period Sampled: /

Project Location: RICHMOND

Client Project No.: 4860105015

Instrument Model No.: MSA-ESCORT

Sampler (Signature): [signature]

Pump Serial No.: 10994

Total Sample Volume:

Calibrated By: LAK

Bubble Flow Meter (mL/min): 2,000

Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot #:

Sample ID: 10994-98

Adsorbent: XAD-2

Sample Number: 16389

Sampling Data:

Start Time: 09:00

Stop Time: 15:00

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
09:00	2.1					
15:00	2.2					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 9/11/98
Site: LRTC	Time Period Sampled: /
Project Location: RICHMOND	Client Project No.: 486 0103 015
Instrument Model No.: MSA-ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10991	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot #: _____ Sample ID: 10991-911

Adsorbent: XAD-2 Sample Number: 16390

Sampling Data:

Start Time: 08:30 Stop Time: 15:30

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:30	2.4					
15:00	2.4					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES

Date/s Sampled: 9/1/98

Site: LRTC

Time Period Sampled: /

Project Location: RICHMOND

Client Project No.: 4860103015

Instrument Model No.: MSA-ESCORT

Sampler (Signature): [signature]

Pump Serial No.: 10994

~~Total~~ Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000

Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10999-911

Adsorbent: XAD-2

Sample Number: 16391

Sampling Data:

Start Time:

Stop Time:

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:35	2.2					
15:05	2.1					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled 9/14/98
Site: LRTC	Time Period Sampled: /
Project Location: RICHMOND	Client Project No.: 486 0103 015
Instrument Model No.: MSA - ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10991	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____ Sample ID: 10991-914

Adsorbent: XAD-2 Sample Number: 16392

Sampling Data:

Start Time: 09:00 Stop Time: 16:00

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
09:00	2.5					
16:00	2.4					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 9/14/98
Site: LRTC	Time Period Sampled: /
Project Location: RICHMOND	Client Project No.: 4860103015
Instrument Model No.: MSA ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10994	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): 2,000 Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Adsorbent: XAD-2

Sample ID: 10994-9K/

Sample Number: 16393

Sampling Data:

Start Time: 08:45 Stop Time: 16:00

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
08:45	2.2					
16:00	2.3					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES

Date/s Sampled: 9.15.98

Site: LRTC

Time Period Sampled:

Project Location: RICHMOND, CA

Client Project No.: 486.0103.015

Instrument Model No.: MSA - ESCORT

Sampler (Signature): [illegible]

Pump Serial No.: 10991

Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min):

Rotameter Reading:

Adsorbent Cartridge Information:

Type/Lot # :

Sample ID: 10991-915

Adsorbent: XAD-2

Sample Number: 16394

Sampling Data:

Start Time: 0845

Stop Time: 1500

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
0845	2.4					
1500	2.4					

K PRIME, INC.
CONSULTING ANALYTICAL CHEMISTS
3621 Westwind Blvd.
Santa Rosa CA 94503
707.527.7574

SAMPLING DATA SHEET

Client/Project ID: PES	Date/s Sampled: 9.15.98
Site: LRTC	Time Period Sampled:
Project Location: RICHMOND CA	Client Project No.: 486.0103.015
Instrument Model No.: MSA ESCORT	Sampler (Signature): [signature]
Pump Serial No.: 10994	Total Sample Volume:

Calibrated By: RAK

Bubble Flow Meter (mL/min): _____ Rotameter Reading: _____

Adsorbent Cartridge Information:

Type/Lot # : _____ Sample ID: 10994-915

Adsorbent: XAD-2 Sample Number: 16395

Sampling Data:

Start Time: 0900 Stop Time: 1505

Time	Rotameter Reading	Flow Rate, mL/min	Ambient Temp, °C	Barometric Pressure, mmHg	Relative Humidity	Comments
0900	2.2					
1505	2.2					

PES ENVIRONMENTAL, Inc.
Engineering & Environmental Services

CHAIN OF CUSTODY RECORD

KPI PROJ# 9418

1682 NOVATO BOULEVARD, SUITE 100
NOVATO, CALIFORNIA 94947
(415) 899-1600 FAX (415) 899-1601

SAMPLERS: DON SEYMOUR

JOB NUMBER: 486.0103.015

NAME / LOCATION: LRTC, RICHMOND, CA

PROJECT MANAGER: B. FRIZZELL

RECORDER: [signature]

DATE YR	DATE MO	DATE DY	DATE TIME	SAMPLE NUMBER / DESIGNATION	SOURCE CODE	MATRIX Water	MATRIX Sedim't	MATRIX Soil	MATRIX Oil	VAD TOX	# CONTAINERS & PRESERV. Unpres.	H_2SO_4	HNO_3	HCl	Filtered	KPI SMP#	DEPTH IN FEET	COL MTD CD	QA CODE	EPA 601 / 8010	EPA 602 / 8020 (BTEX)	EPA 624 / 8240	EPA 625 / 8270	TPHg by 5030 / 8015 (mod)	TPHd by 3550 / 8015 (mod)	EPA 8080 - PESTICIDES
98	09	08	1500	10991-98	61					X	1				1	16388	N/A	19								X
98	09	08	1500	10994-98											1	16389										X
98	09	11	1500	10991-911											1	16390										X
98	09	11	1505	10994-911											1	16391										X
98	09	14	1600	10991-914											1	16392										X
98	09	14	1600	10994-914											1	16393										X
98	09	15		10991-915											1	16394										X
98	09	15		10994-915											1	16395										X

NOTE

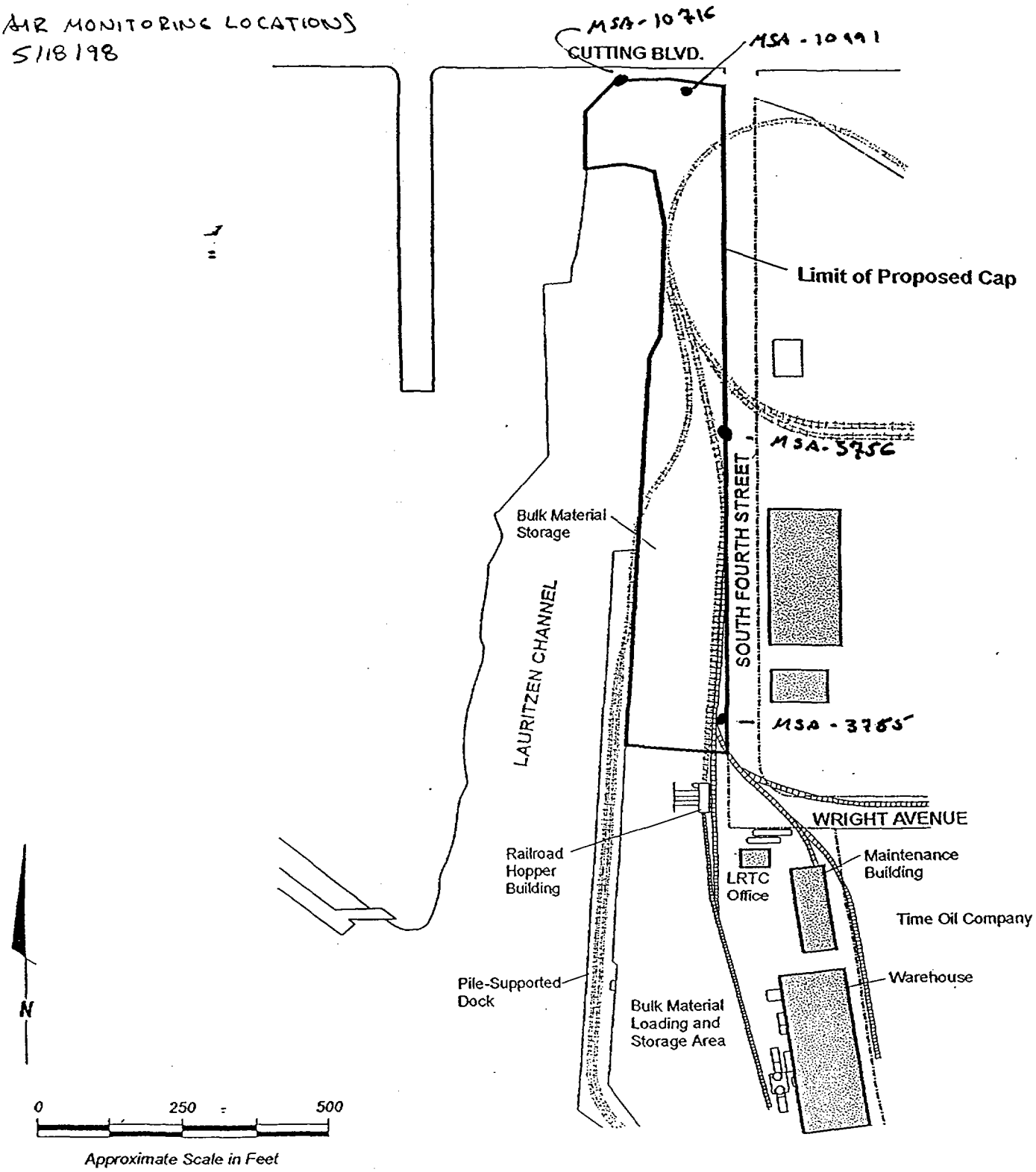
STD. TAT

CHAIN OF CUSTODY RECORD

RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
[signature]	[signature]	9/22/98	14:10
RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
DISPATCHED BY: (Signature) / DATE / TIME	RECEIVED FOR LAB BY: (Signature)	DATE	TIME

METHOD OF SHIPMENT:

AIR MONITORING LOCATIONS
5/18/98

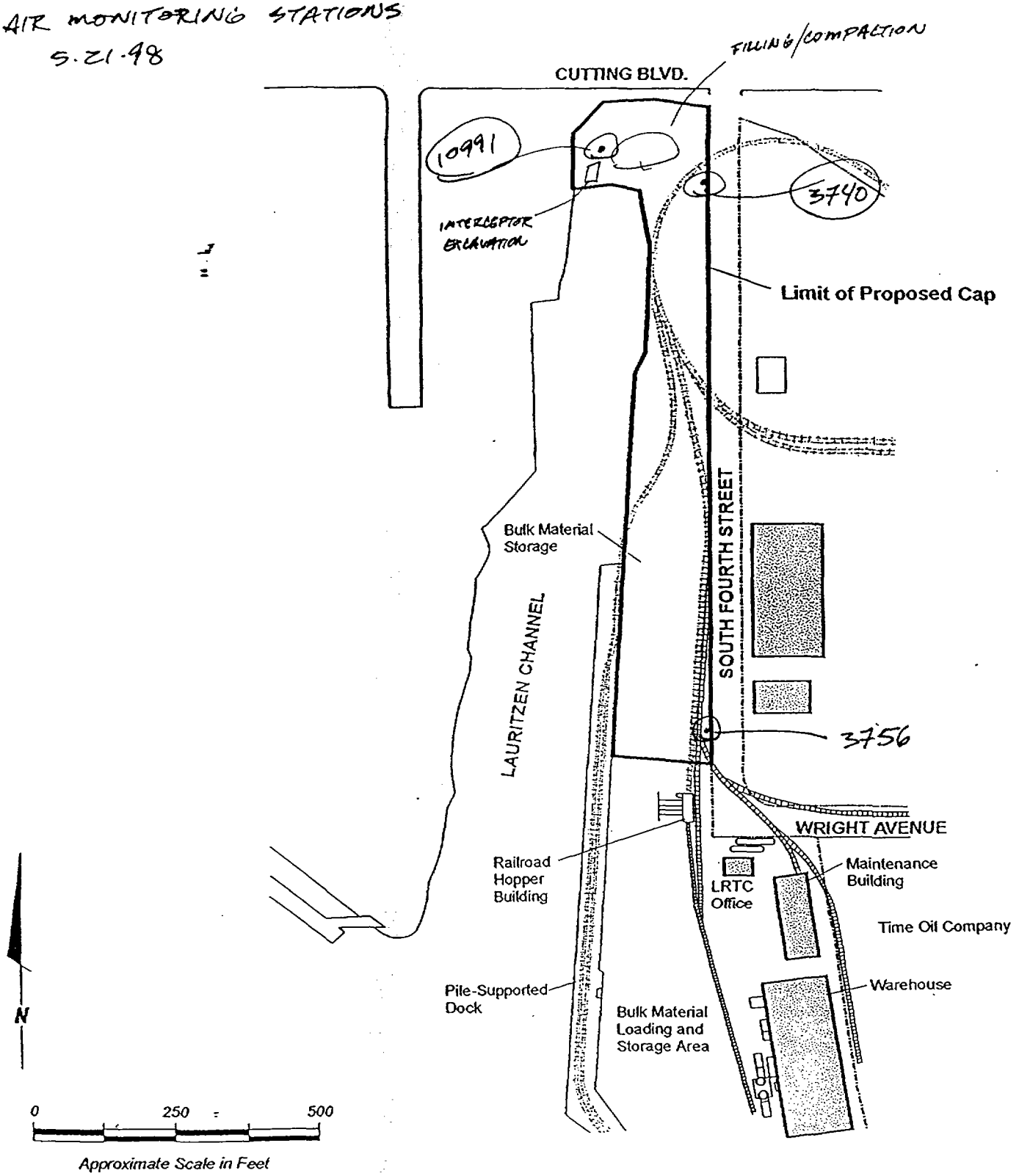


PES Environmental, Inc.
Engineering & Environmental Services

Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

486.0103.002	48601HS1.CDR	DMDst
JOB NUMBER	DRAWING NUMBER	REVIEWED BY

AIR MONITORING STATIONS
5.21.98



PES Environmental, Inc.
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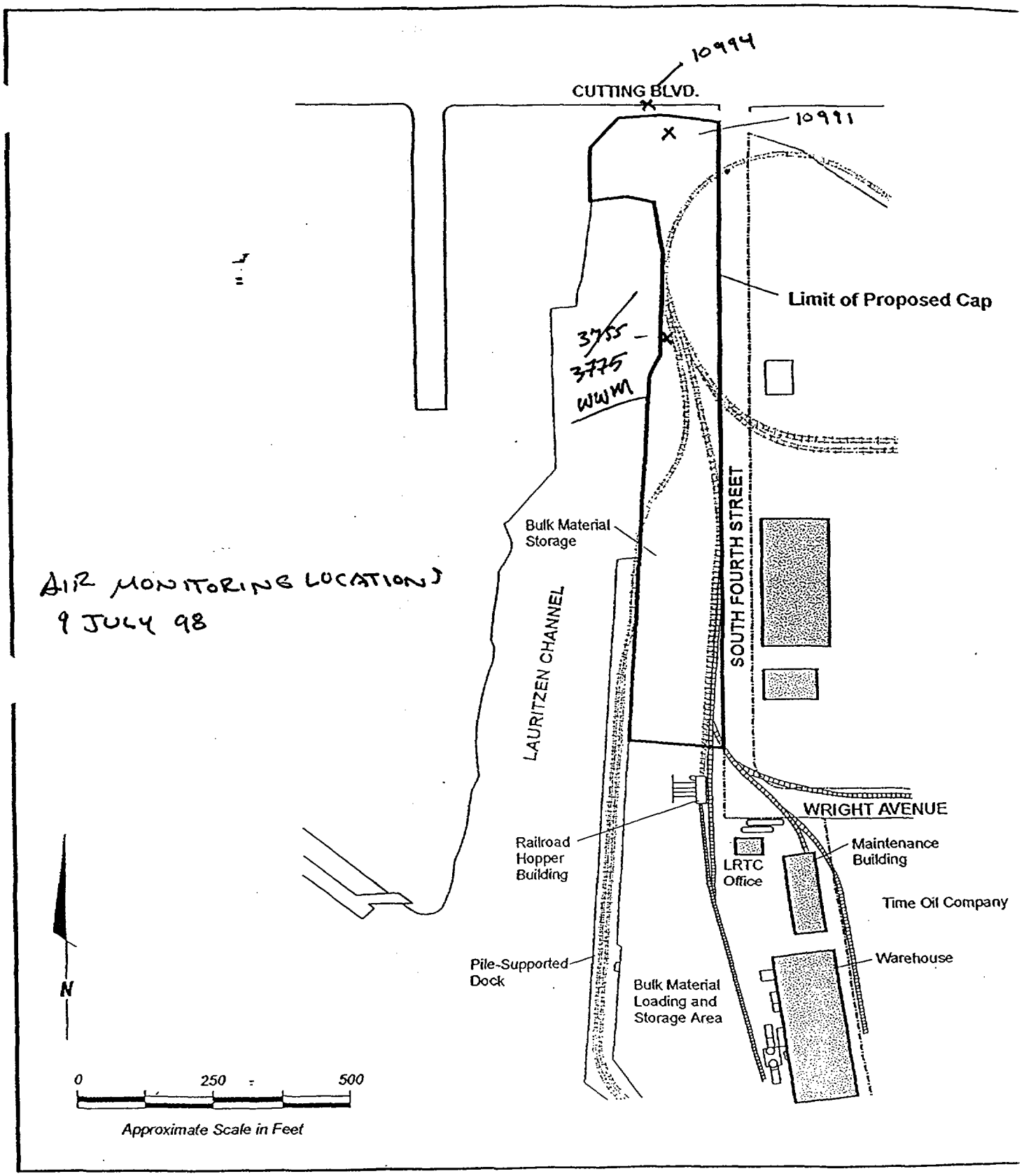
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

486.0103.002	48601HS1.CDR	DMost
JOB NUMBER	DRAWING NUMBER	REVIEWED BY

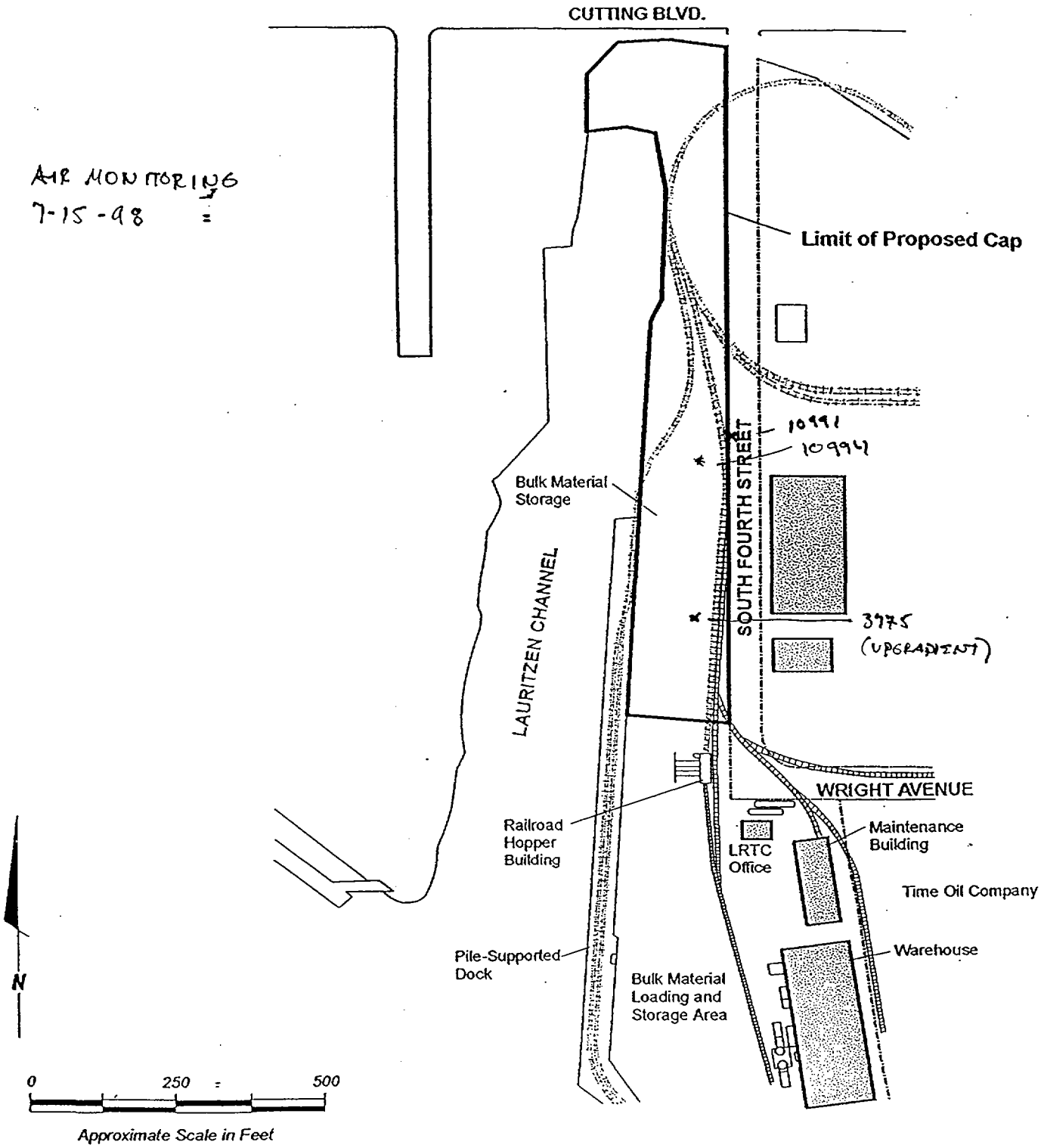


PES Environmental, Inc.
Engineering & Environmental Services

Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

486.0103.002	48601HS1.CDR	DMDST
JOB NUMBER	DRAWING NUMBER	REVIEWED BY

AIR MONITORING
7-15-98

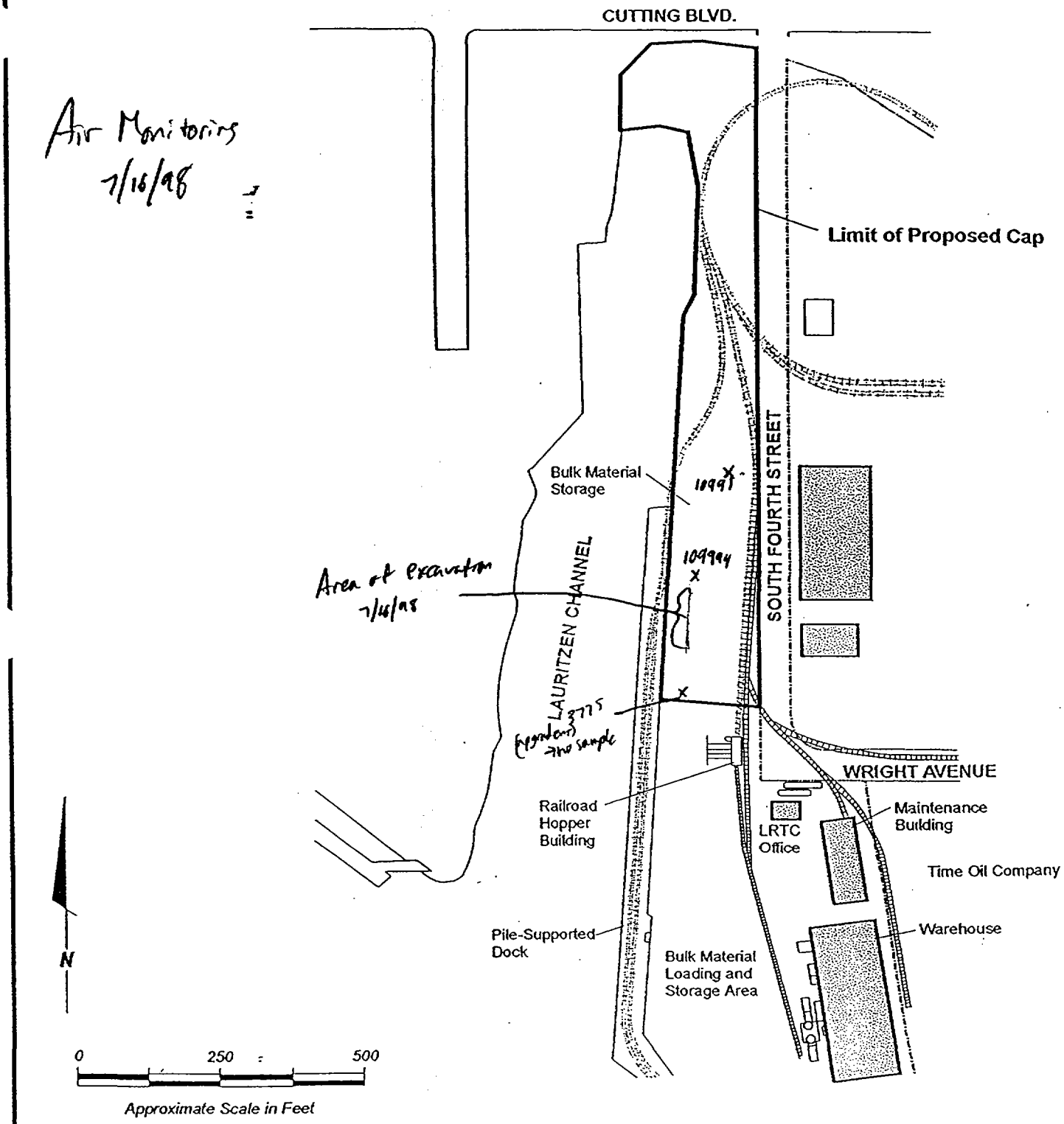


PES Environmental, Inc.
Engineering & Environmental Services

Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

PLA
2

486.0103.002	48601HS1.CDR	D Most	2/9
JOB NUMBER	DRAWING NUMBER	REVIEWED BY	DAT



PES Environmental, Inc.
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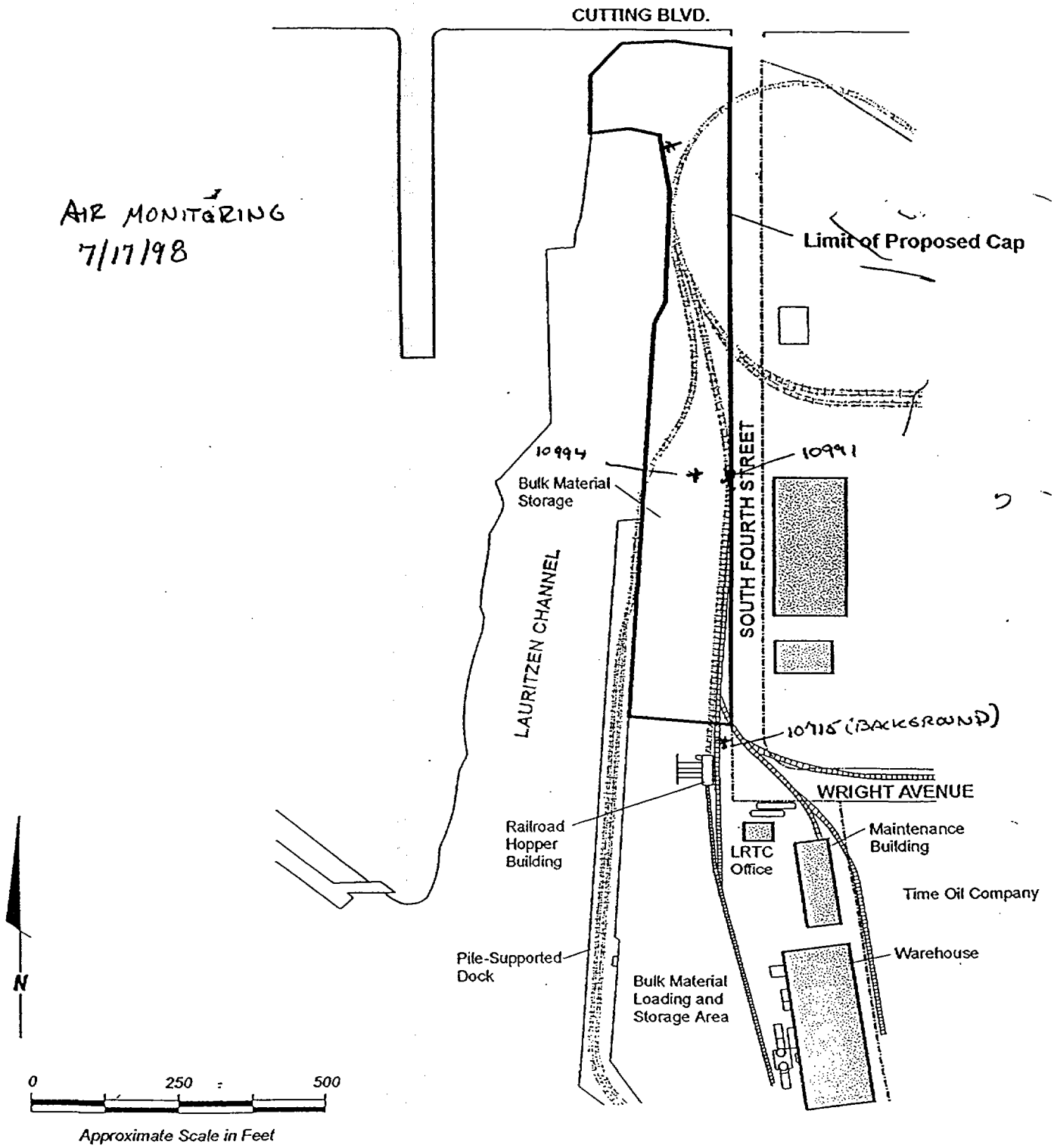
Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

PLA

486.0103.002	48601HS1.CDR	DMost	2/9
JOB NUMBER	DRAWING NUMBER	REVIEWED BY	DAT

AIR MONITORING
7/17/98



PES Environmental, Inc.
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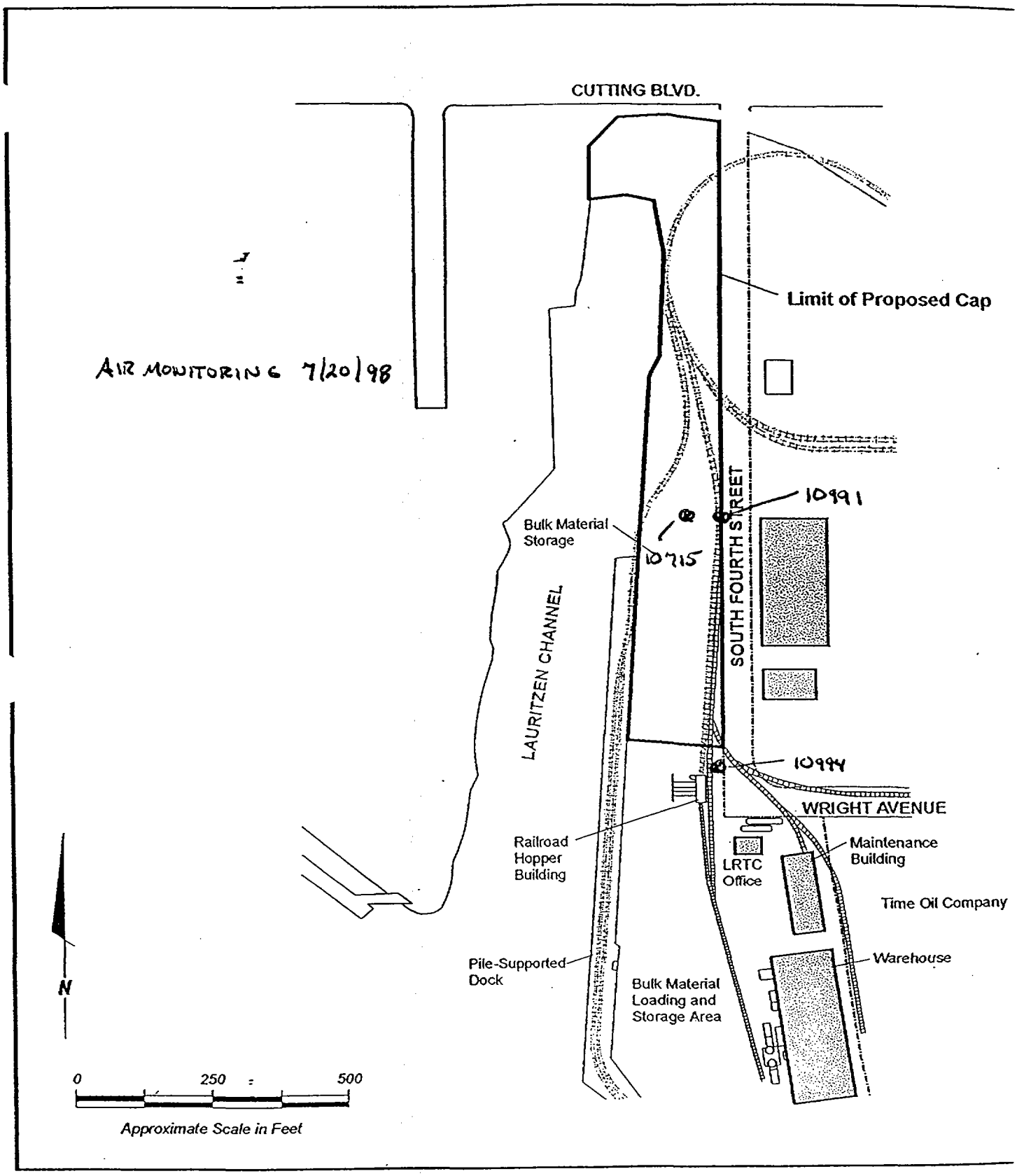
Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

PLA
2

486.0103.002	48601HS1.CDR	DMDST	2/9
JOB NUMBER	DRAWING NUMBER	REVIEWED BY	DAT



PES Environmental, Inc.
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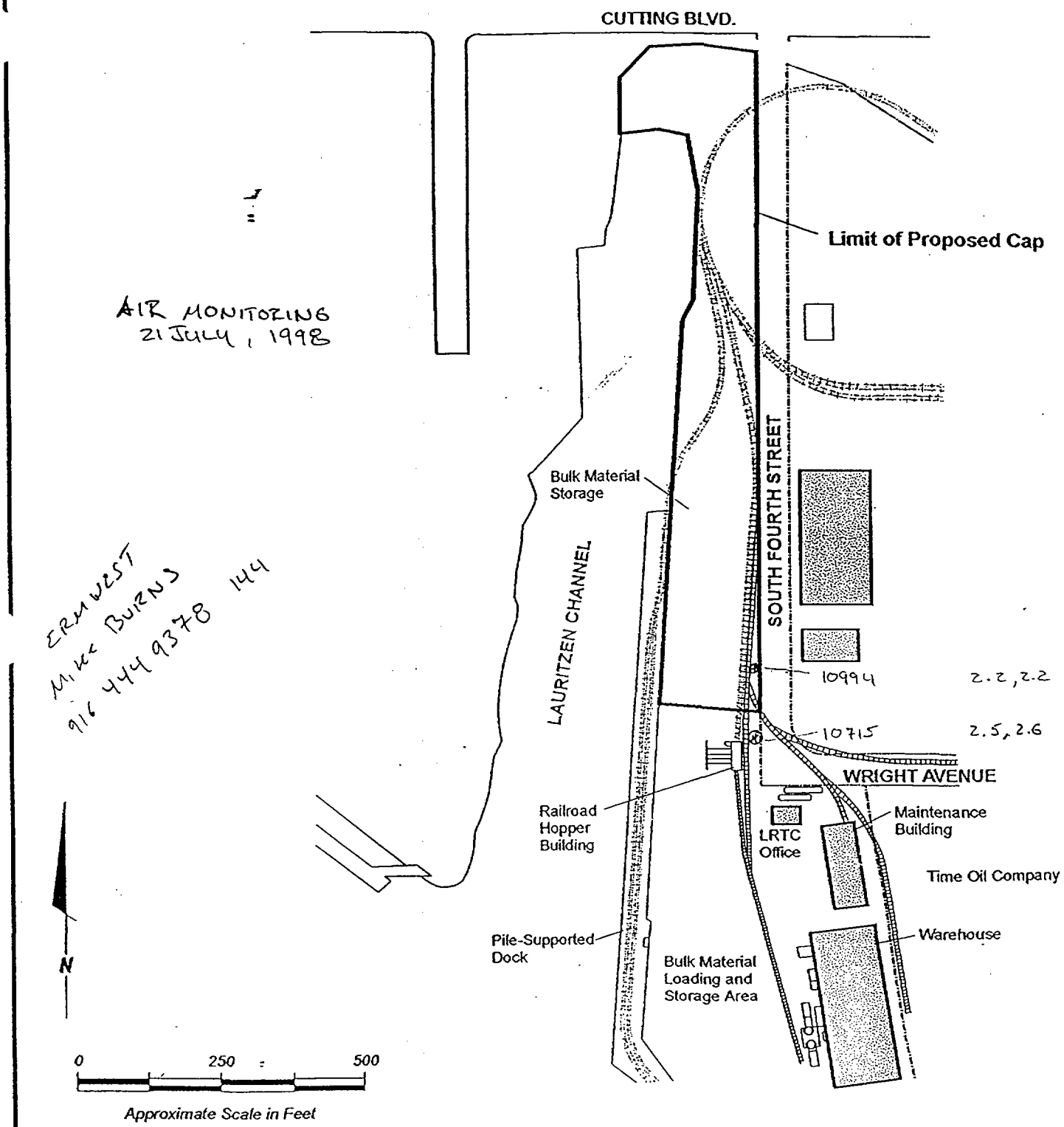
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

486.0103.002	48601HS1.COR	DMost
JOB NUMBER	DRAWING NUMBER	REVIEWED BY

START 12:30
STOP 15:30

AIR MONITORING
21 JULY, 1998

ERM WEST
MIKE BURNS
916 444 9378 144



PES Environmental, Inc.
Engineering & Environmental Services

Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

486.0103.002	48601HS1.COR	DMost
JOB NUMBER	DRAWING NUMBER	REVIEWED BY

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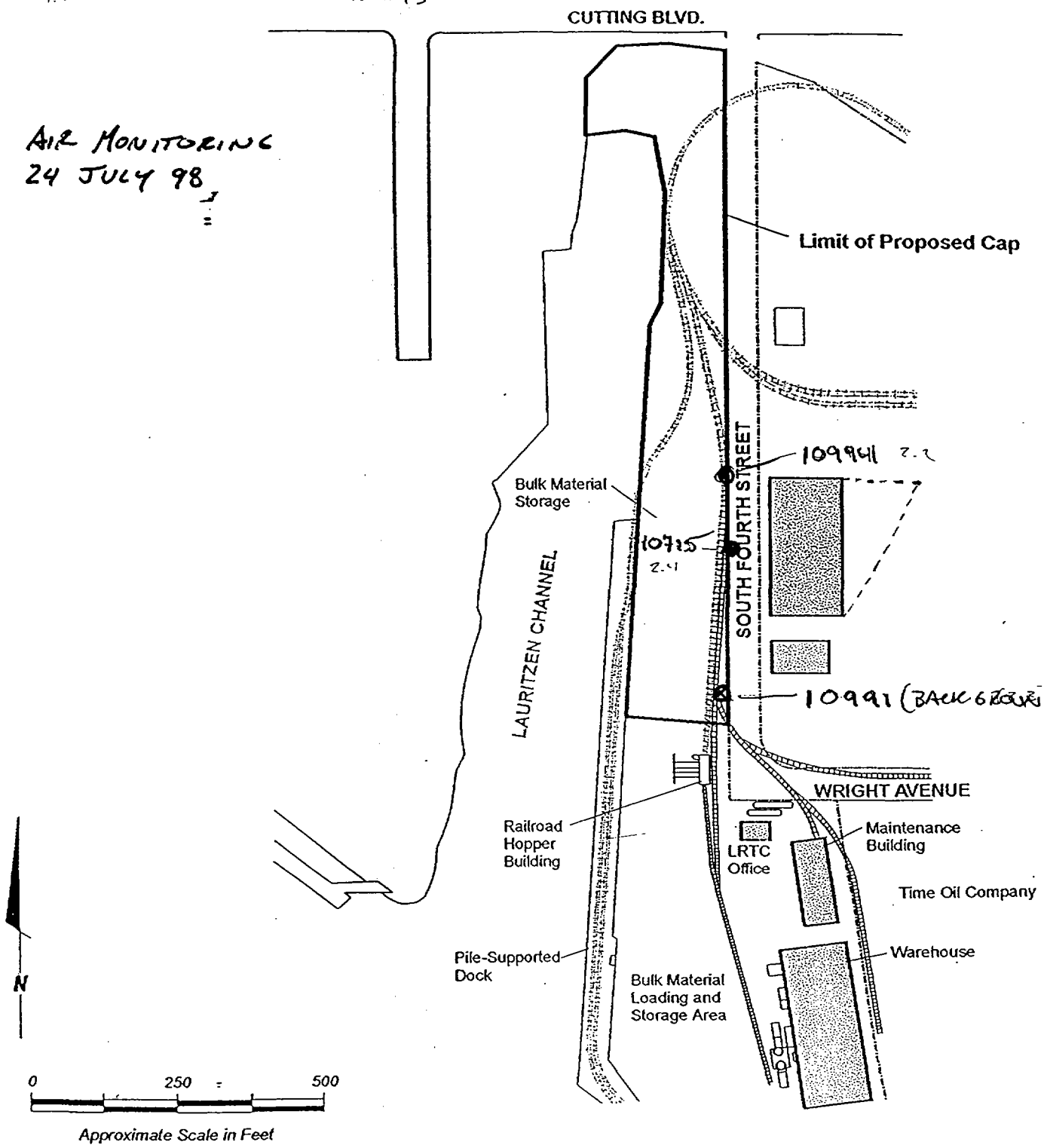
AIR MONITORING
24 JULY 98



PES Environmental, Inc.
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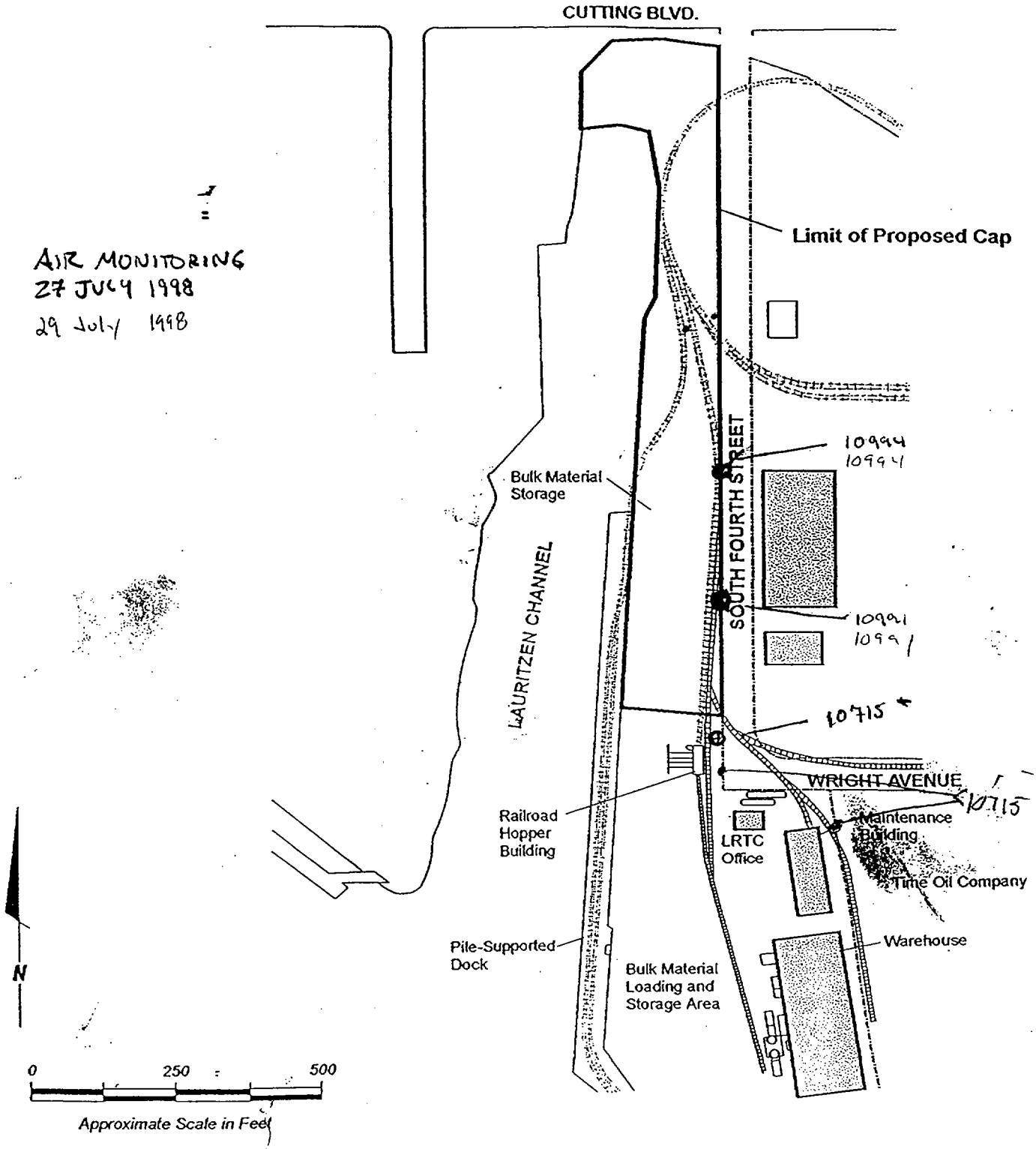
Health and Safety Plan
Richmond, California

486.0103.002	48601HS1.CDR	DMDST
JOB NUMBER	DRAWING NUMBER	REVIEWED BY

AIR MONITORING
27 JULY 1998
29 July 1998



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Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

486.0103.002	48601HS1.CDR	DMost
JOB NUMBER	DRAWING NUMBER	REVIEWED BY

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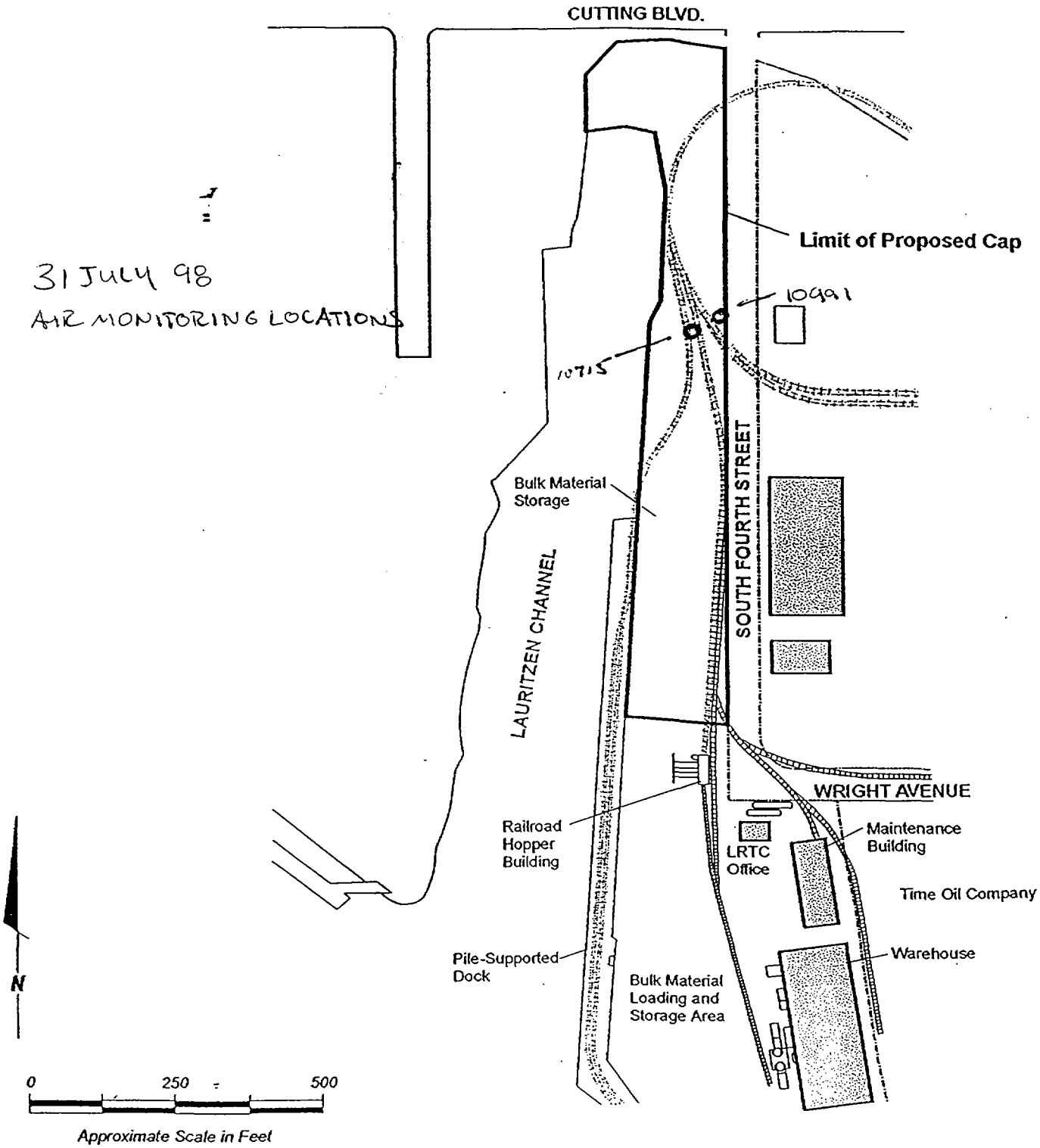

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Site Plan
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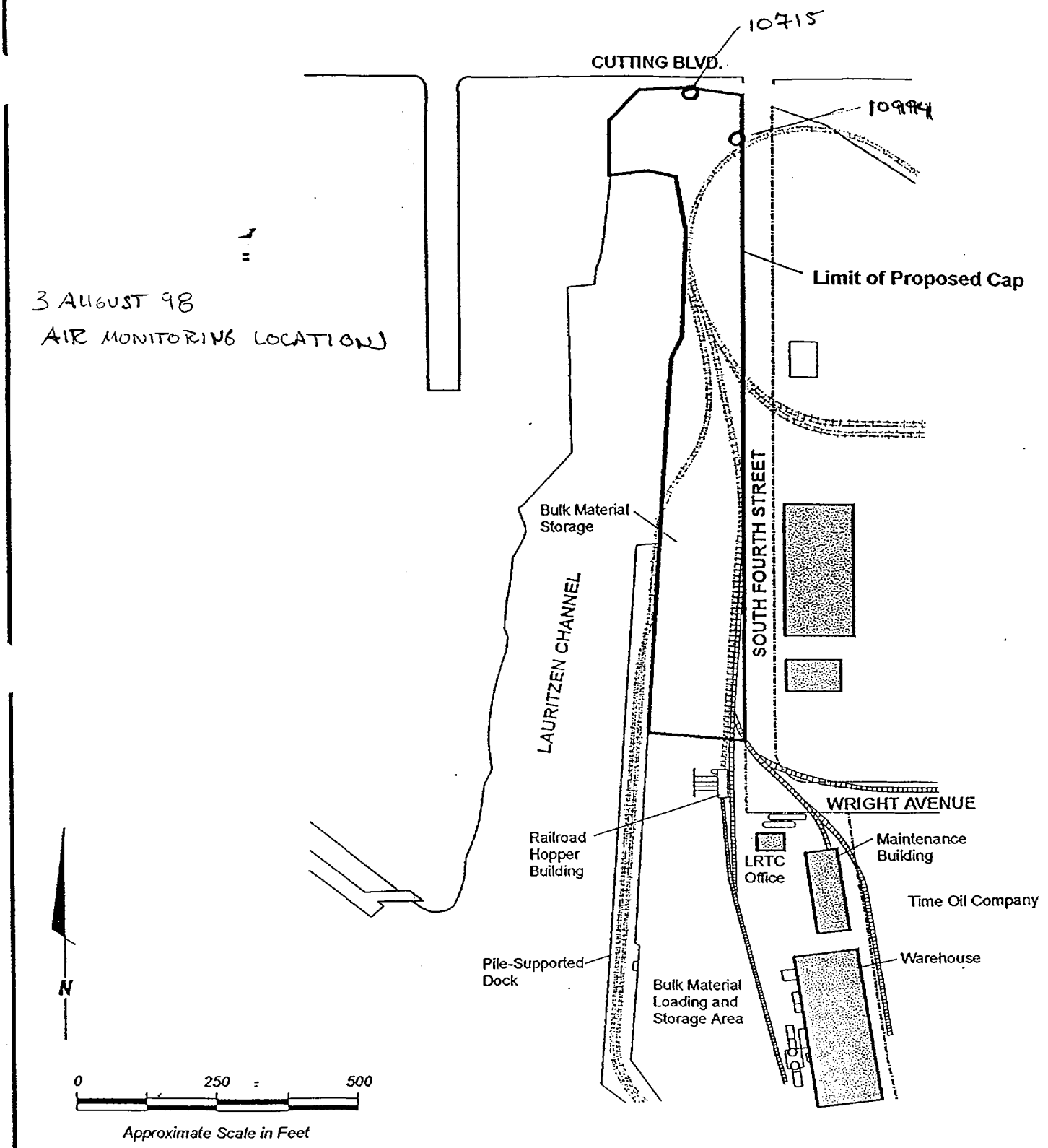
Health and Safety Plan
Richmond, California

PLA
2

486.0103.002	48601HS1.CDR	DMost	2/9
JOB NUMBER	DRAWING NUMBER	REVIEWED BY	DAT



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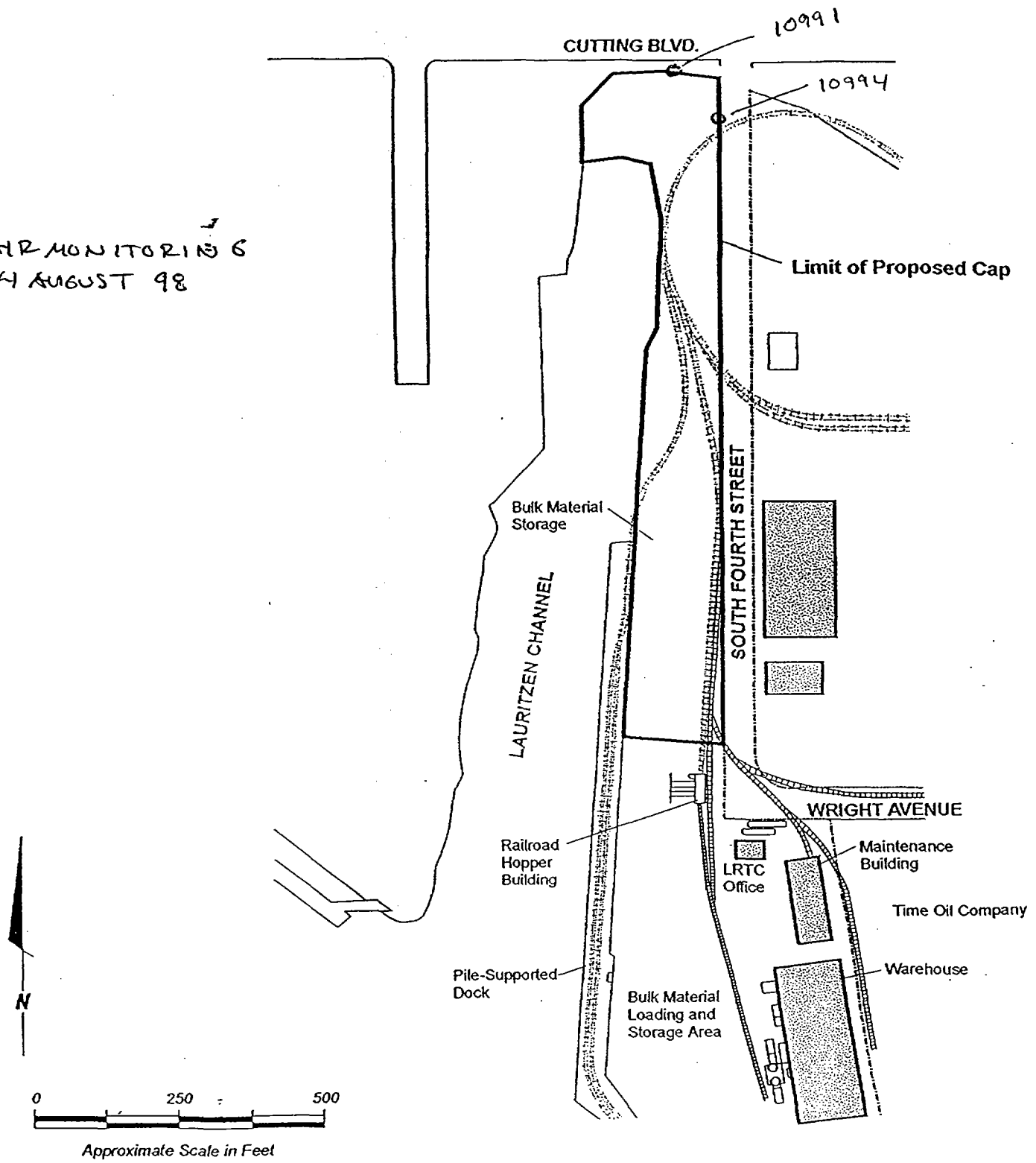
Health and Safety Plan
Richmond, California

486.0103.002	48601HS1.CDR	DMost
JOB NUMBER	DRAWING NUMBER	REVIEWED BY

AIR MONITORING 6
4 AUGUST 98



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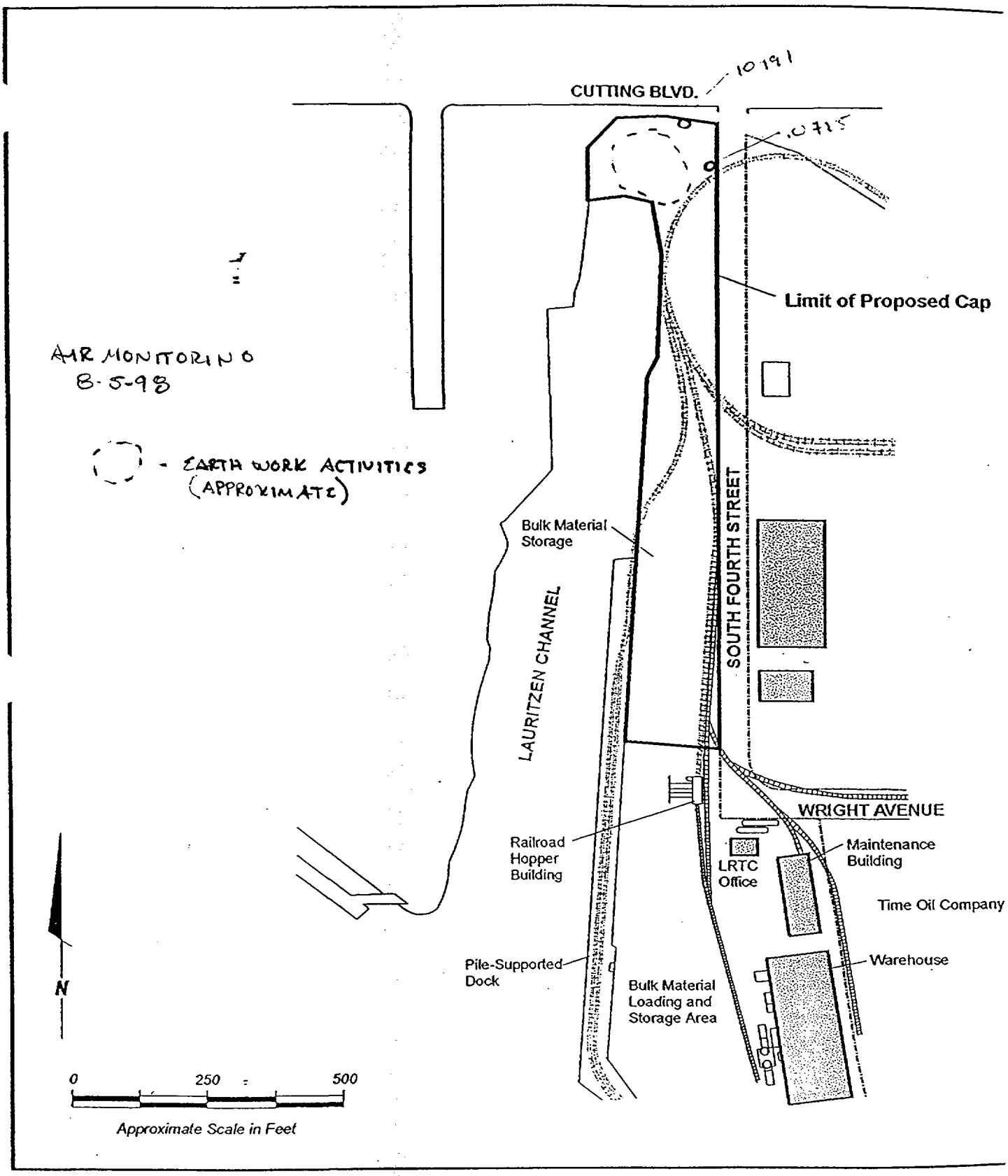
Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

486.0103.002	48601HS1.CDR	D Most	2/9
JOB NUMBER	DRAWING NUMBER	REVIEWED BY	DA



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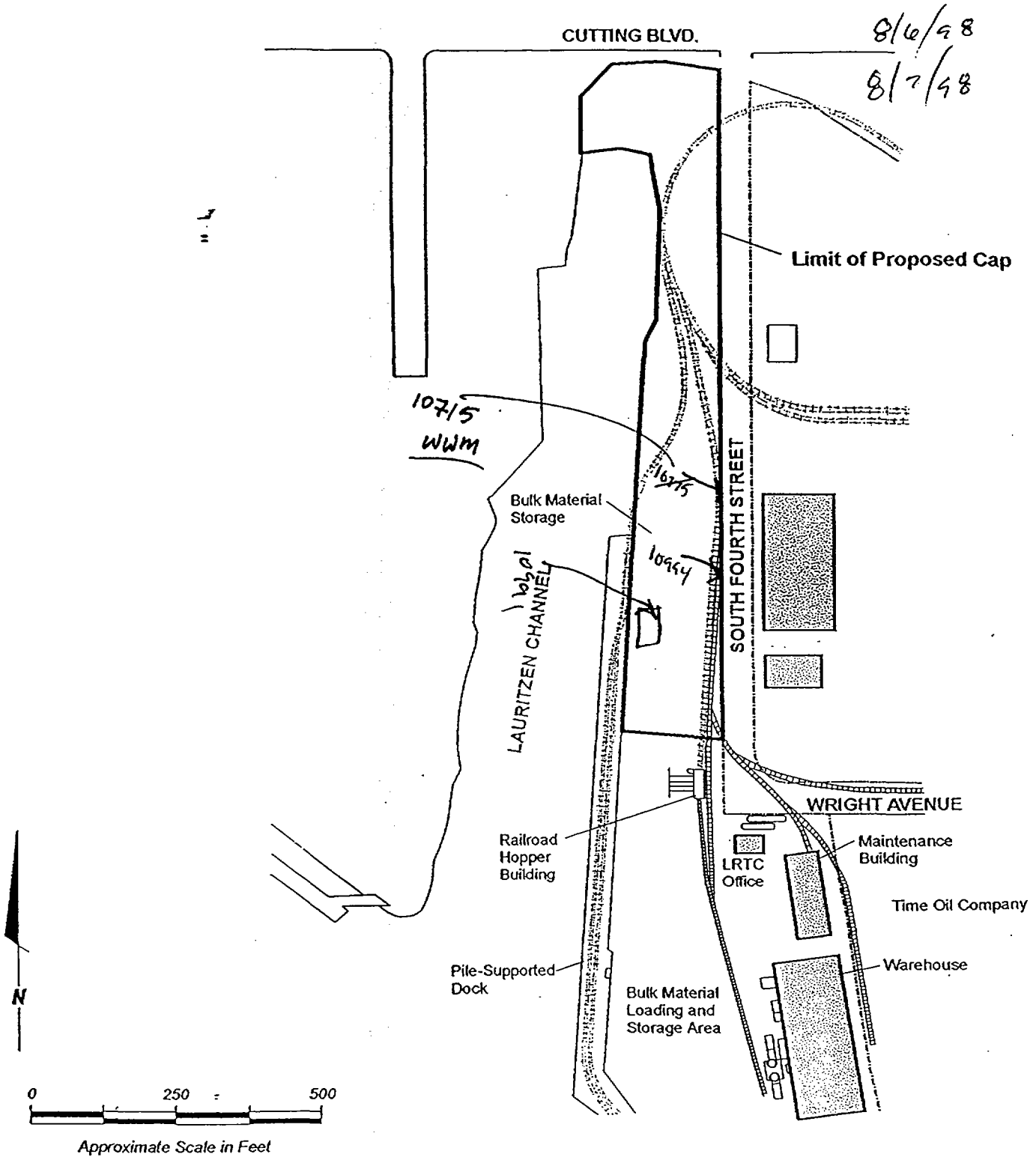
Health and Safety Plan
Richmond, California

486.0103.002	48601HS1.COR	DMost
JOB NUMBER	DRAWING NUMBER	REVIEWED BY



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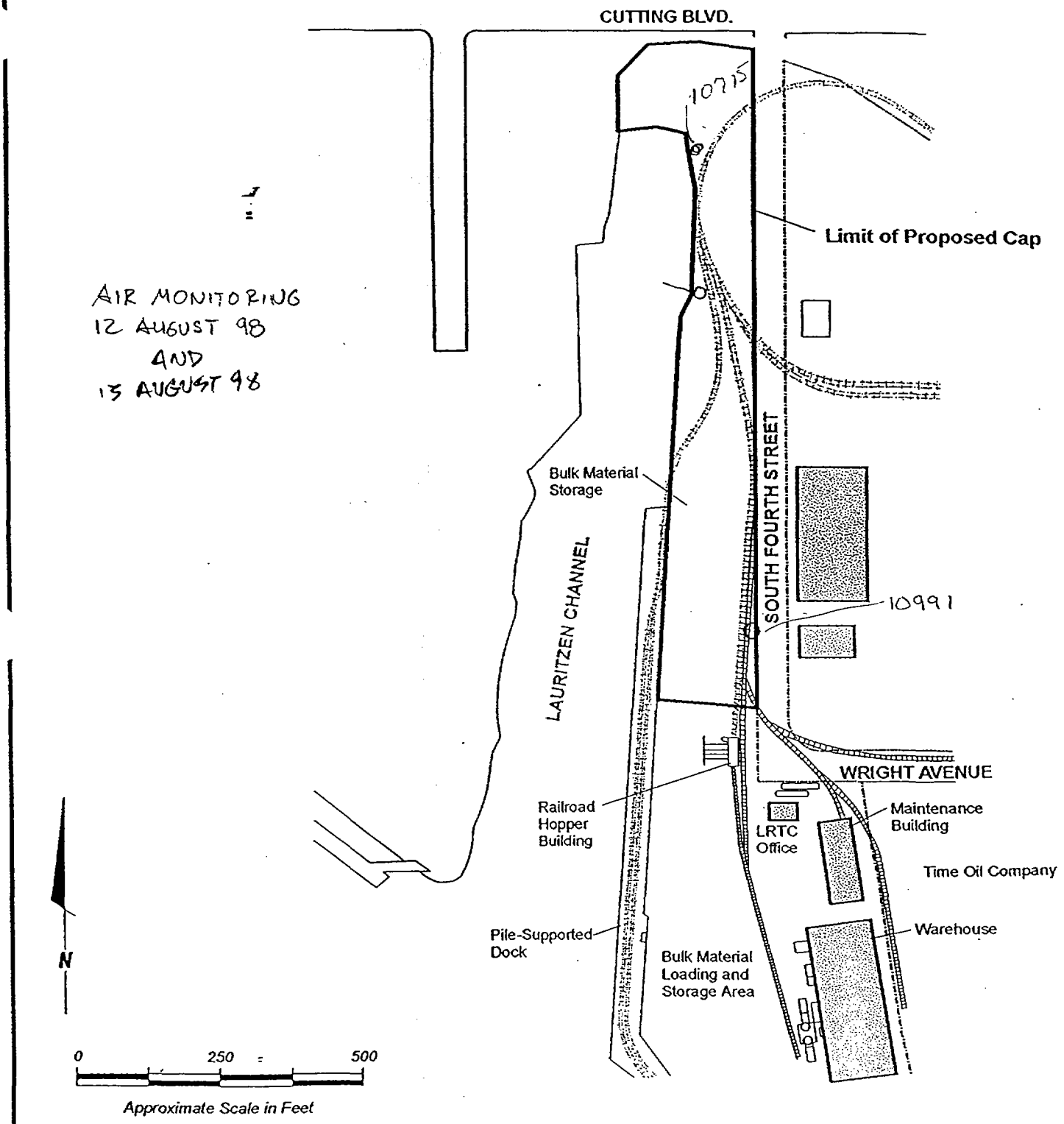
Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

486.0103.002	48601HS1.CDR	DMDst
JOB NUMBER	DRAWING NUMBER	REVIEWED BY



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Site Plan
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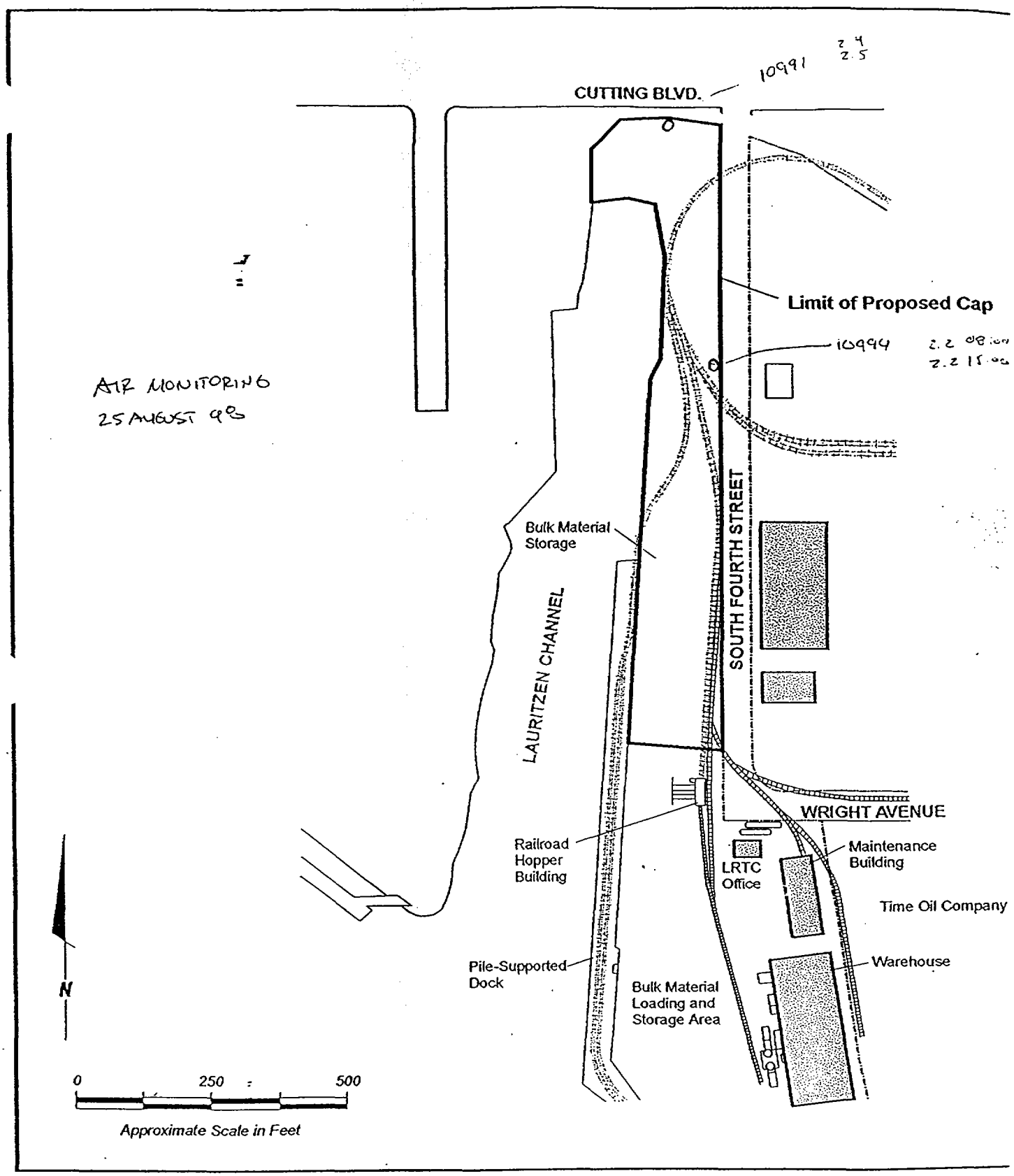
Richmond, California

486.0103.002	48601HS1.COR	DMost
JOB NUMBER	DRAWING NUMBER	REVIEWED BY



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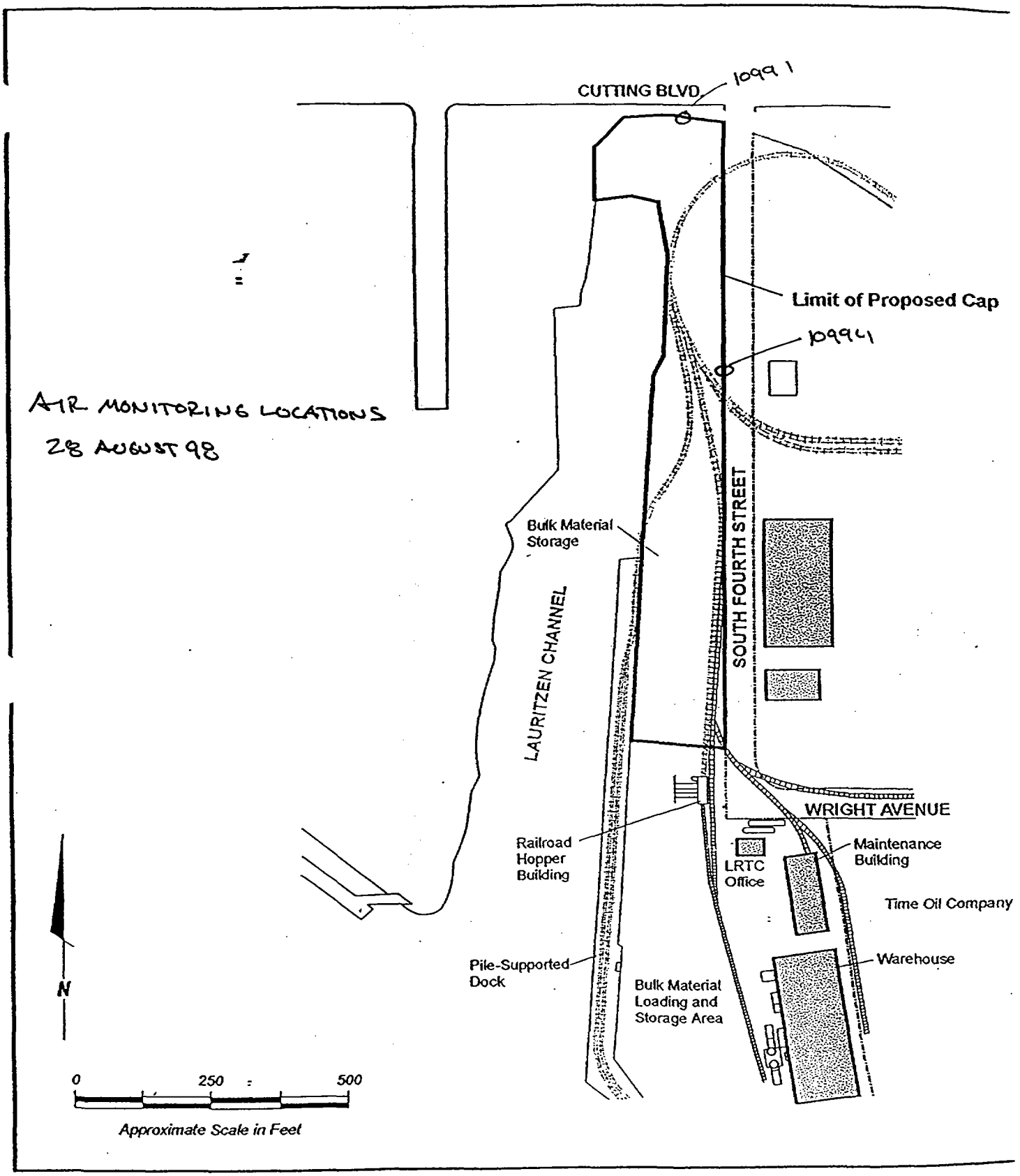
Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

486.0103.002	48601HS1.COR	D Most
JOB NUMBER	DRAWING NUMBER	REVIEWED BY



PES Environmental, Inc.
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Site Plan
Former United Heckathorn Facility
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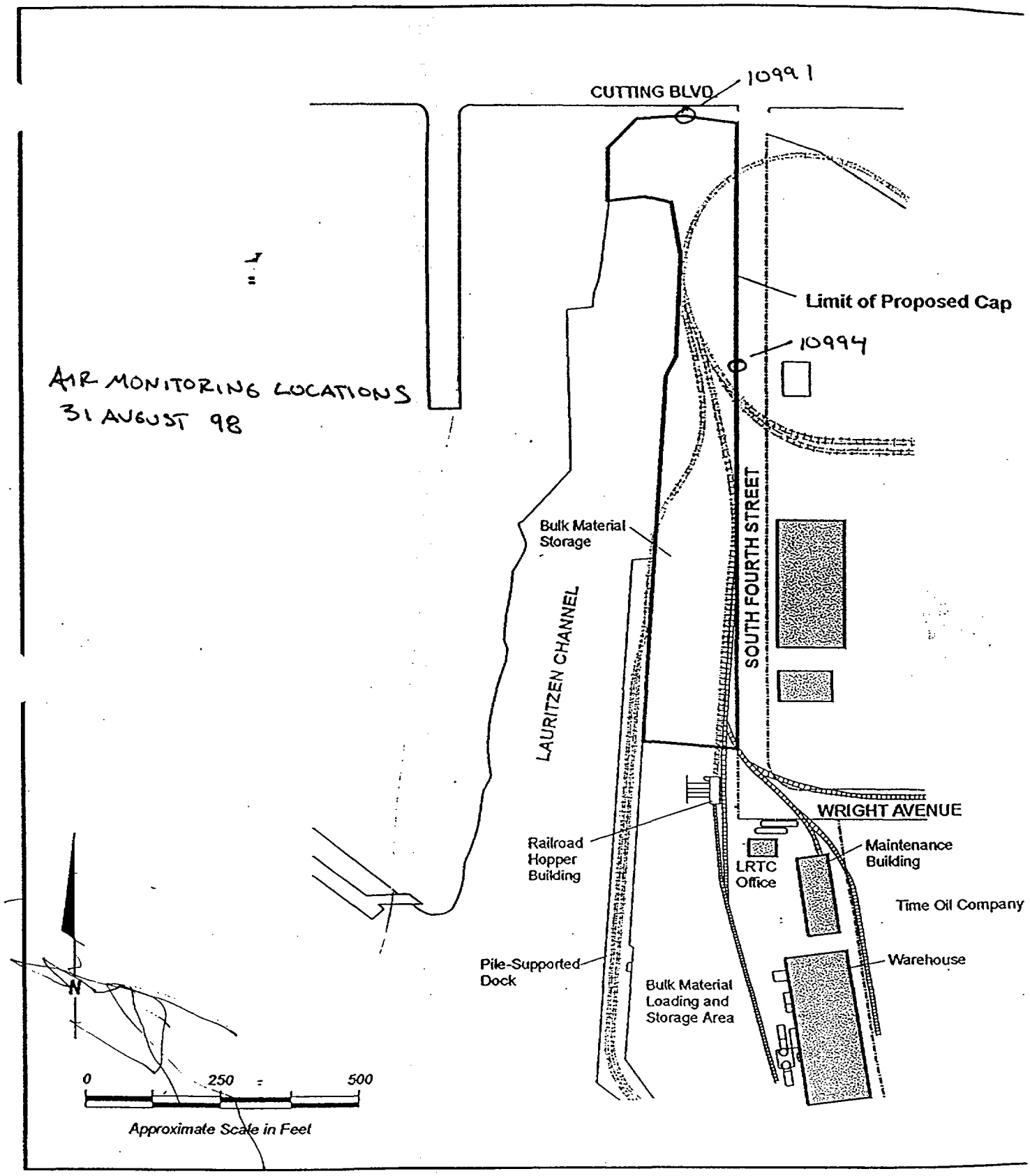
Richmond, California

486.0103.002	48601HS1.COR	DMost
JOB NUMBER	DRAWING NUMBER	REVIEWED BY



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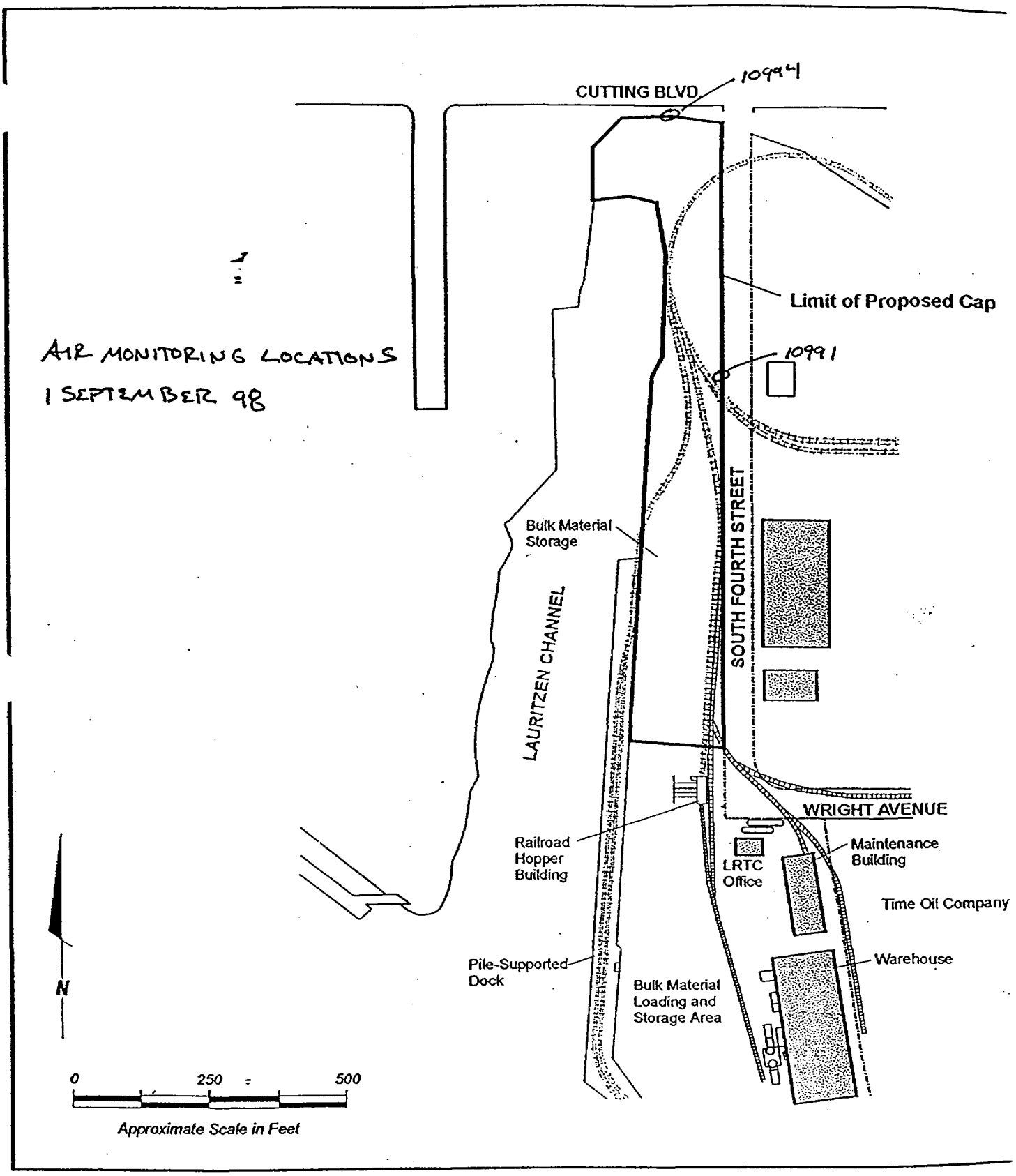
Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

486.0103.002	48601HS1.CDR	DMDost
JOB NUMBER	DRAWING NUMBER	REVIEWED BY



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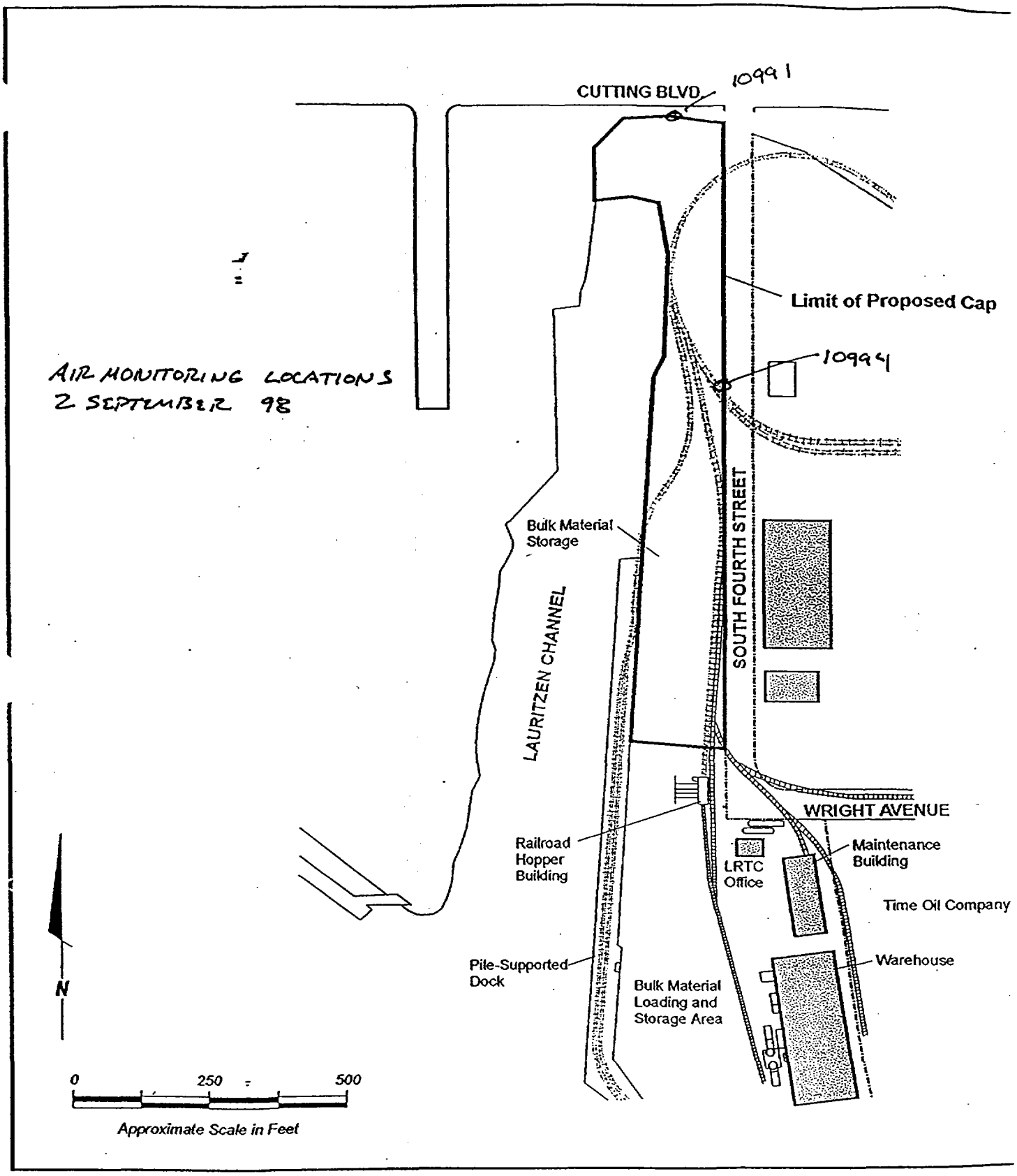
Engineering & Environmental Services

Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

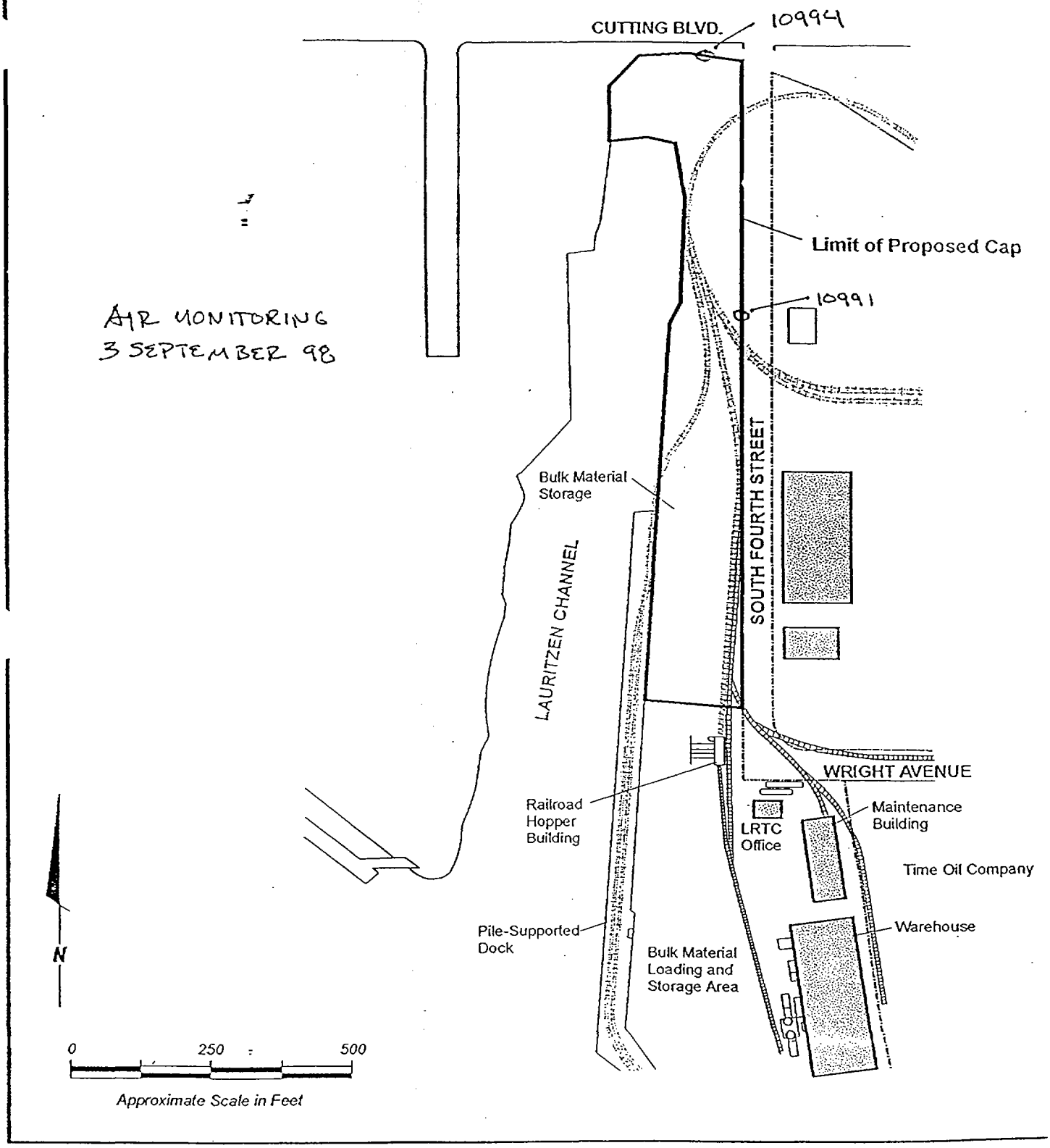
486.0103.002	48601HS1.COR	DMost
JOB NUMBER	DRAWING NUMBER	REVIEWED BY



PES Environmental, Inc.
Engineering & Environmental Services

Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

486.0103.002	48601HS1.CDR	D Most
JOB NUMBER	DRAWING NUMBER	REVIEWED BY

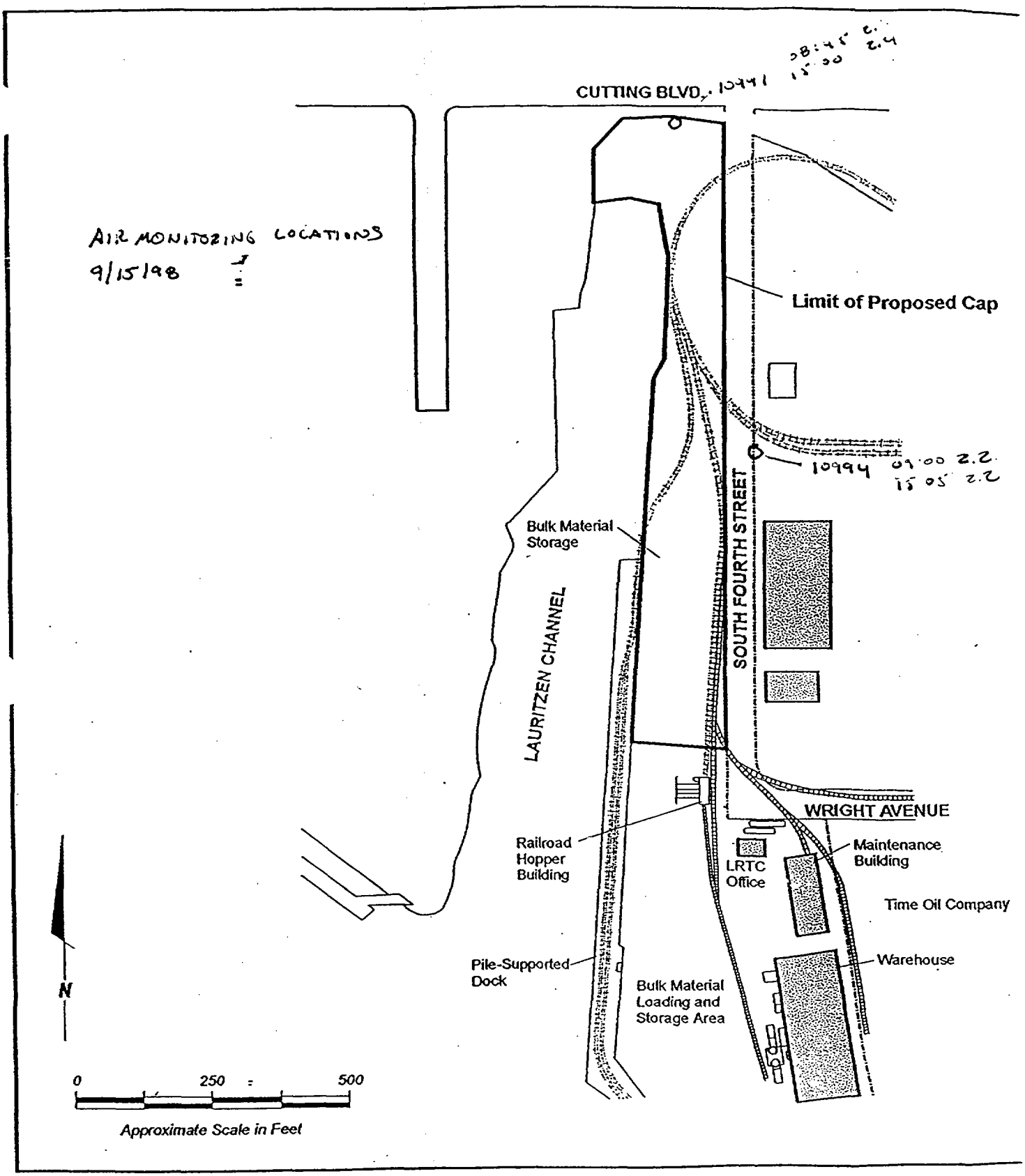


PES Environmental, Inc.
Engineering & Environmental Services

Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

PLAT 2

486.0103.002 | 48601HS1.CDR | DMost | 2/98



PES Environmental, Inc.
Engineering & Environmental Services

Site Plan
Former United Heckathorn Facility
Health and Safety Plan
Richmond, California

PLA
2

486.0103.002	48601HS1.CDR	DMDST	2/9
JOB NUMBER	DRAWING NUMBER	REVIEWED BY	DAT

APPENDIX F

CONCRETE COMPRESSIVE STRENGTH REPORTS FOR STORM DRAIN INTERCEPTORS

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 2

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 7/20/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 002 PES Environmental # 486.0103

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: Interceptor # A-1 @ LRTC, Richmond, CA

Contractor: Ron Bernt

Truck/Ticket:

Date Sampled: 6/19/98

Date Received: 6/26/98

Sampled By: Other

Submitted By: Other

Curing Method:

Specimen Prep:

Field Cure Temp (°F) Hi: Lo:

Field Cure Time:

Weather:

Wind (mph):

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

nple umber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
2713 A		7	6.00	x 12.00	x	28.27	146500	5180	
2713 B	7/17/98	28	6.00	x 12.00	x	28.27	197500	6990	
2713 C	7/17/98	28	6.00	x 12.00	x	28.27	194000	6860	
2713 D		0		x	x				

Average 28 Day Strength (psi): 6930

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 7/20/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883
2240 North Point Parkway, Santa Rosa, CA 95407

RECEIVED JUL 2 7 1998

Report No.: 3

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 7/20/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 003 PES Environmental # 486.0103

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: Interceptor # A-2 @ LRTC, Richmond, CA

Contractor: Ron Bernt

Truck/Ticket:

Date Sampled: 6/19/98

Date Received: 6/26/98

Sampled By: Other

Submitted By: Other

Curing Method:

Specimen Prep:

Weather:

Field Cure Temp (°F) Hi: Lo:

Wind (mph):

Field Cure Time:

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
2714 A	6/26/98	7	6.00 x	12.00 x		28.27	134500	4760	
2714 B	7/17/98	28	6.00 x	12.00 x		28.27	179000	6330	
2714 C	7/17/98	28	6.00 x	12.00 x		28.27	175500	6210	
2714 D		0	x	x					

Average 28 Day Strength (psi): 6270

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 7/20/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 4

RECEIVED AUG 0 5 199

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 7/30/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 004 PES Environmental # 486.0103

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: 2500 psi @ 28 days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: B-2 : Bottom / Levin - Richmond Terminal.

Contractor:

Truck/Ticket:

Date Sampled: 6/25/98

Date Received:

Sampled By:

Submitted By:

Curing Method:

Specimen Prep: Weather:

Field Cure Temp (°F) Hi: Lo: Wind (mph):

Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

mple umber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi
2727 A	7/2/98	7	6.00	x 12.00	x	28.27	142000	5020	
2727 B	7/9/98	14	6.00	x 12.00	x	28.27	159000	5620	
2727 C	7/23/98	28	6.00	x 12.00	x	28.27	184000	6510	
2727 D	7/23/98	28	6.00	x 12.00	x	28.27	197000	6970	

Average 28 Day Strength (psi): 6740

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 7/30/98 by: Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 5

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 7/30/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 005 PES Environmental # 486.0103

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: 2500 psi @ 28 days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: B-1: Walls / Levin - Richmond Terminal

Contractor: NA

Truck/Ticket:

Date Sampled: 6/25/98

Date Received: 6/30/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Weather:

Field Cure Temp (°F) Hi: Lo:

Wind (mph):

Field Cure Time:

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

mple umber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
2726 A	7/2/98	7	6.00	x 12.00	x	28.27	147000	5200	
2726 B	7/9/98	14	6.00	x 12.00	x	28.27	167500	5920	
2726 C	7/23/98	28	6.00	x 12.00	x	28.27	176000	6230	
2726 D	7/23/98	28	6.00	x 12.00	x	28.27	172500	6100	

Average 28 Day Strength (psi): 6170

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 7/30/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 6

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 7/30/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 006 PES Environmental # 486.1013.018

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: Interceptor box (C-1) - LRTC - Richmond

Contractor: Ron Bernt

Truck/Ticket:

Date Sampled: 7/1/98

Date Received: 7/13/98

Sampled By: Other

Submitted By: Other

Curing Method:

Specimen Prep:

Field Cure Temp (°F) Hi: Lo:

Field Cure Time:

Weather:

Wind (mph):

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi
2789 A	7/15/98	14	6.00 x	12.00 x		28.27	175500	6210	
2789 B	7/29/98	28	6.00 x	12.00 x		28.27	190000	6720	
2789 C		0	x	x					

Average 28 Day Strength (psi): 6720

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 7/30/98 by:

Timothy Casey

Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 7

RECEIVED AUG 1 0 19

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 7/21/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 007 PES Environmental # 486.0103.018 C-2

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: Interceptor box (C-2) - LRTC Richmond

Contractor:

Truck/Ticket:

Date Sampled: 7/1/98

Date Received: 7/13/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Weather:

Field Cure Temp (°F) Hi: Lo:

Wind (mph):

Field Cure Time:

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

mple umber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
2790 A	7/15/98	14	6.00 x	12.00 x		28.27	154000	5450	
2790 B	7/29/98	28	6.00 x	12.00 x		28.27	185000	6540	
2790 C		0	x	x					

Average 28 Day Strength (psi): 6540

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 8/6/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

RECEIVED AUG 17 1998

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 8

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

ort Date: 8/11/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 008 PES Environmental Interceptor D-2

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond, CA Interceptor # D-2

Contractor: Ron Bernt

Truck/Ticket:

Date Sampled: 7/7/98

Date Received: 7/15/98

Sampled By: Other

Submitted By: Other

Curing Method:

Specimen Prep:

Weather:

Field Cure Temp (°F) Hi: Lo:

Wind (mph):

Field Cure Time:

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

nple umber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
2797 A	7/16/98	9	6.00	x 12.00	x	28.27	143500	5080	
2797 B	8/4/98	28	6.00	x 12.00	x	28.27	166000	5870	

Average 28 Day Strength (psi): 5870

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 8/11/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

APPENDIX G

ANALYTICAL LABORATORY REPORTS AND CHAIN-OF-CUSTODY FORMS FOR WATER IN PORTABLE TANKS

K PRIME, Inc.
CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

RECEIVED FEB 1 2 1999

TRANSMITTAL

DATE: 08.27.98

TO: Mr. BILL FRIZELL
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct: 9418
Project: 486.0103.022

FROM: Richard A. Kagel, Ph.D. RAK 8/27/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.022" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
PT-1	WATER	08.21.98	15904
PT-2	WATER	08.21.98	15905

These samples were received in our laboratory on 08.21.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

METHOD: PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: PT-1
LAB NO: 15904
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

DATE EXTRACTED: 8/24/98
DATE ANALYZED: 8/25/98

UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.50	ND
B-BHC	319-85-7	0.50	ND
LINDANE	58-89-9	0.50	ND
HEPTACHLOR	76-44-8	0.50	ND
D-BHC	319-86-8	0.50	ND
ALDRIN	309-00-2	0.50	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.50	ND
ENDOSULFAN I	959-98-8	0.50	ND
4,4'-DDE	72-55-9	1.00	ND
DIELDRIN	60-57-1	1.00	4.75
ENDRIN	72-20-8	1.00	5.75
4,4'-DDD	72-54-8	1.00	3.30
ENDOSULFAN II	33212-65-9	1.00	ND
4,4'-DDT	50-29-3	1.00	2.79
ENDRIN ALDEHYDE	7421-93-4	1.00	ND
ENDOSULFAN SULFATE	1031-07-8	1.00	ND
METHOXYCHLOR	72-43-5	5.0	ND
CHLORDANE	57-74-9	5.0	ND
TOXPHENE	8001-35-2	10.0	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: RAK
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

METHOD: PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: PT-2
LAB NO: 15905
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

DATE EXTRACTED: 8/24/98
DATE ANALYZED: 8/25/98

UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.50	ND
B-BHC	319-85-7	0.50	ND
LINDANE	58-89-9	0.50	ND
HEPTACHLOR	76-44-8	0.50	ND
D-BHC	319-86-8	0.50	ND
ALDRIN	309-00-2	0.50	0.53
HEPTACHLOR EPOXIDE	1024-57-3	0.50	ND
ENDOSULFAN I	959-98-8	0.50	ND
4,4'-DDE	72-55-9	1.00	ND
DIELDRIN	60-57-1	1.00	3.83
ENDRIN	72-20-8	1.00	5.10
4,4'-DDD	72-54-8	1.00	3.75
ENDOSULFAN II	33212-65-9	1.00	ND
4,4'-DDT	50-29-3	1.00	2.03
ENDRIN ALDEHYDE	7421-93-4	1.00	ND
ENDOSULFAN SULFATE	1031-07-8	1.00	ND
METHOXYCHLOR	72-43-5	5.0	ND
CHLORDANE	57-74-9	5.0	ND
TOXPHENE	8001-35-2	10.0	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: RMK
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

SAMPLE ID: PT-1
LAB NO: 15904
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

METHOD: TPH-G/D
REFERENCE: EPA MOD 8015

DATE ANALYZED: 8/26/98
UNITS: mg/L

COMPOUND NAME	REPORTING LIMIT	SAMPLE CONC
TPH-G	0.05	ND
TPH-D*	0.05	0.29

NOTES:
ND - NOT DETECTED AT STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

* - DIESEL RANGE EXTRACTABLES GC/FID PATTERN

DIESEL FUEL	
DEGRADED DIESEL FUEL	
PETROLEUM - HEAVIER THAN DIESEL	
PETROLEUM - LIGHTER THAN DIESEL	
UNKNOWN EXTRACTABLES PATTERN	YES

APPROVED BY: MAK
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

SAMPLE ID: PT-2
LAB NO: 15905
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

METHOD: TPH-G/D
REFERENCE: EPA MOD 8015

DATE ANALYZED: 8/26/98
UNITS: mg/L

COMPOUND NAME	REPORTING LIMIT	SAMPLE CONC
TPH-G	0.05	ND
TPH-D*	0.05	ND

NOTES:
ND - NOT DETECTED AT STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

* - DIESEL RANGE EXTRACTABLES GC/FID PATTERN

DIESEL FUEL	
DEGRADED DIESEL FUEL	
PETROLEUM - HEAVIER THAN DIESEL	
PETROLEUM - LIGHTER THAN DIESEL	
UNKNOWN EXTRACTABLES PATTERN	

APPROVED BY: RAK
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

SAMPLE ID: PT-1
LAB NO: 15904
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/24/98
UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
DICHLORODIFLUOROMETHANE	75-71-8	0.500	ND
CHLOROMETHANE	74-87-3	0.500	ND
VINYL CHLORIDE	75-01-4	0.500	ND
BROMOMETHANE	74-83-9	0.500	ND
CHLOROETHANE	75-00-3	0.500	ND
TRICHLOROFLUOROMETHANE	75-69-4	0.500	ND
1,1-DICHLOROETHENE	75-35-4	0.500	ND
METHYLENE CHLORIDE	75-09-2	5.000	ND
TRANS-1,2-DICHLOROETHENE	156-60-5	0.500	ND
1,1-DICHLOROETHANE	75-34-3	0.500	ND
CIS-1,2-DICHLOROETHENE	156-59-2	0.500	ND
2,2-DICHLOROPROPANE	594-20-7	0.500	ND
BROMOCHLOROMETHANE	74-97-5	0.500	ND
CHLOROFORM	67-66-3	0.500	ND
1,1,1-TRICHLOROETHANE	71-55-6	0.500	ND
CARBON TETRACHLORIDE	56-23-5	0.500	ND
1,1-DICHLOROPROPENE	563-58-6	0.500	ND
BENZENE	71-43-2	0.500	ND
1,2-DICHLOROETHANE	107-06-2	0.500	ND
TRICHLOROETHENE	79-01-6	0.500	ND
1,2-DICHLOROPROPANE	78-87-5	0.500	ND
DIBROMOMETHANE	74-95-3	0.500	ND
BROMODICHLOROMETHANE	75-27-4	0.500	ND
TRANS-1,3-DICHLOROPROPENE	10061-02-6	0.500	ND
4-METHYL-2-PENTANONE	108-10-1	0.500	ND
TOLUENE	108-88-3	0.500	ND
CIS-1,3-DICHLOROPROPENE	10061-01-5	0.500	ND
1,1,2-TRICHLOROETHANE	79-00-5	0.500	ND
TETRACHLOROETHENE	127-18-4	0.500	ND
1,3-DICHLOROPROPANE	142-28-9	0.500	ND
DIBROMOCHLOROMETHANE	124-48-1	0.500	ND
1,2-DIBROMOETHANE	106-93-4	0.500	ND
CHLOROBENZENE	108-90-7	0.500	ND
1,1,1,2-TETRACHLOROETHANE	630-20-6	0.500	ND
ETHYLBENZENE	100-41-4	0.500	ND
XYLENE (M+P)	1330-20-7	0.500	ND
XYLENE (O)	1330-20-7	0.500	ND
STYRENE	100-42-5	0.500	ND
BROMOFORM	75-25-2	0.500	ND

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

SAMPLE ID: PT-1
LAB NO: 15904
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/24/98
UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
ISOPROPYLBENZENE	98-82-8	0.500	ND
1,1,2,2-TETRACHLOROETHANE	79-34-5	0.500	ND
BROMOBENZENE	108-86-1	0.500	ND
1,2,3-TRICHLOROPROPANE	96-18-4	0.500	ND
N-PROPYLBENZENE	103-65-1	0.500	ND
2-CHLOROTOLUENE	95-49-8	0.500	ND
1,3,5-TRIMETHYLBENZENE	108-67-8	0.500	ND
4-CHLOROTOLUENE	106-43-4	0.500	ND
TERT-BUTYLBENZENE	98-06-6	0.500	ND
1,2,4-TRIMETHYLBENZENE	95-63-6	0.500	ND
SEC-BUTYLBENZENE	135-98-8	0.500	ND
1,3-DICHLOROBENZENE	541-73-1	0.500	ND
4-ISOPROPYLTOLUENE	99-87-6	0.500	ND
1,4-DICHLOROBENZENE	106-46-7	0.500	ND
N-BUTYLBENZENE	104-51-8	0.500	ND
1,2-DICHLOROBENZENE	95-50-1	0.500	ND
1,2-DIBROMO-3-CHLOROPROPANE	96-12-8	0.500	ND
1,2,4-TRICHLOROBENZENE	120-82-1	0.500	ND
HEXACHLOROBUTADIENE	87-68-3	0.500	ND
NAPHTHALENE	91-20-3	0.500	ND
1,2,3-TRICHLOROBENZENE	87-61-6	0.500	ND

SURROGATE RECOVERY	%
DIBROMOFLUOROMETHANE	95
TOLUENE-D8	98
4-BROMOFLUOROBENZENE	94

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

APPROVED BY: BAC
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

SAMPLE ID: PT-2
LAB NO: 15905
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/24/98
UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
DICHLORODIFLUOROMETHANE	75-71-8	0.500	ND
CHLOROMETHANE	74-87-3	0.500	ND
VINYL CHLORIDE	75-01-4	0.500	ND
BROMOMETHANE	74-83-9	0.500	ND
CHLOROETHANE	75-00-3	0.500	ND
TRICHLOROFLUOROMETHANE	75-69-4	0.500	ND
1,1-DICHLOROETHENE	75-35-4	0.500	ND
METHYLENE CHLORIDE	75-09-2	5.000	ND
TRANS-1,2-DICHLOROETHENE	156-60-5	0.500	ND
1,1-DICHLOROETHANE	75-34-3	0.500	ND
CIS-1,2-DICHLOROETHENE	156-59-2	0.500	ND
2,2-DICHLOROPROPANE	594-20-7	0.500	ND
BROMOCHLOROMETHANE	74-97-5	0.500	ND
CHLOROFORM	67-66-3	0.500	ND
1,1,1-TRICHLOROETHANE	71-55-6	0.500	ND
CARBON TETRACHLORIDE	56-23-5	0.500	ND
1,1-DICHLOROPROPENE	563-58-6	0.500	ND
BENZENE	71-43-2	0.500	ND
1,2-DICHLOROETHANE	107-06-2	0.500	ND
TRICHLOROETHENE	79-01-6	0.500	ND
1,2-DICHLOROPROPANE	78-87-5	0.500	ND
DIBROMOMETHANE	74-95-3	0.500	ND
BROMODICHLOROMETHANE	75-27-4	0.500	ND
TRANS-1,3-DICHLOROPROPENE	10061-02-6	0.500	ND
4-METHYL-2-PENTANONE	108-10-1	0.500	ND
TOLUENE	108-88-3	0.500	ND
CIS-1,3-DICHLOROPROPENE	10061-01-5	0.500	ND
1,1,2-TRICHLOROETHANE	79-00-5	0.500	ND
TETRACHLOROETHENE	127-18-4	0.500	ND
1,3-DICHLOROPROPANE	142-28-9	0.500	ND
DIBROMOCHLOROMETHANE	124-48-1	0.500	ND
1,2-DIBROMOETHANE	106-93-4	0.500	ND
CHLOROBENZENE	108-90-7	0.500	ND
1,1,1,2-TETRACHLOROETHANE	630-20-6	0.500	ND
ETHYLBENZENE	100-41-4	0.500	ND
XYLENE (M+P)	1330-20-7	0.500	ND
XYLENE (O)	1330-20-7	0.500	ND
STYRENE	100-42-5	0.500	ND
BROMOFORM	75-25-2	0.500	ND

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

SAMPLE ID: PT-2
LAB NO: 15905
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/24/98
UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
ISOPROPYLBENZENE	98-82-8	0.500	ND
1,1,2,2-TETRACHLOROETHANE	79-34-5	0.500	ND
BROMOBENZENE	108-86-1	0.500	ND
1,2,3-TRICHLOROPROPANE	96-18-4	0.500	ND
N-PROPYLBENZENE	103-65-1	0.500	ND
2-CHLOROTOLUENE	95-49-8	0.500	ND
1,3,5-TRIMETHYLBENZENE	108-67-8	0.500	ND
4-CHLOROTOLUENE	106-43-4	0.500	ND
TERT-BUTYLBENZENE	98-06-6	0.500	ND
1,2,4-TRIMETHYLBENZENE	95-63-6	0.500	ND
SEC-BUTYLBENZENE	135-98-8	0.500	ND
1,3-DICHLOROBENZENE	541-73-1	0.500	ND
4-ISOPROPYLTOLUENE	99-87-6	0.500	ND
1,4-DICHLOROBENZENE	106-46-7	0.500	ND
N-BUTYLBENZENE	104-51-8	0.500	ND
1,2-DICHLOROBENZENE	95-50-1	0.500	ND
1,2-DIBROMO-3-CHLOROPROPANE	96-12-8	0.500	ND
1,2,4-TRICHLOROBENZENE	120-82-1	0.500	ND
HEXACHLOROBUTADIENE	87-68-3	0.500	ND
NAPHTHALENE	91-20-3	0.500	ND
1,2,3-TRICHLOROBENZENE	87-61-6	0.500	ND

SURROGATE RECOVERY	%
DIBROMOFLUOROMETHANE	95
TOLUENE-D8	98
4-BROMOFLUOROBENZENE	94

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

APPROVED BY: RMK
DATE: 8/27/98

K PRIME, INC.

CHAIN OF CUSTODY RECORD

CONSULTING ANALYTICAL CHEMISTS 3621 Westwind Blvd., Santa Rosa, CA 95403 PHONE: (707) 527-7574 FAX: (707) 527-7879

Client/Project ID	Address/Phone	ANALYSES	KPI Project No.
PES/LRTC	415 849 1600		9418
Project Location: RICHMOND	Client Project No.: 4860103 022		
Contact: BILL FRIZZEL	Sampler (Signature): Tom Luoni		

Sample Identification No.	Date	Time	Lab Sample No.	Type of Sample	No. of Containers	8080	8260	TPH-g	TPH-d				Expected Turnaround Time	Remarks
PT-1	8-21-98	15:30	15904	WATER	8	X	X	X	X				72 HOUR	CAUTION, MAY
PT-2	8-21-98	15:30	15905	WATER	8	X	X	X	X				"	CONTAIN PESTICIDES

Relinquished by: (Signature)	Received by: (Signature)	Date	Time
Tom Luoni	NELS WALDEN	8/21/98	1733
Relinquished by: (Signature)	Received by: (Signature)	Date	Time
Relinquished by: (Signature)	Received by: (Signature)	Date	Time

Disposal Method		
Disposed by: (Signature)	Date	Time

White Copy : Accompanies Samples
Yellow Copy : Sampler

K PRIME, Inc.
CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

RECEIVED JAN 0 5 1999

TRANSMITTAL

DATE: 12.31.98

TO: Mr. WILL MAST
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct.: 9418
Project: "486.0103.019"

FROM: Richard A. Kagel, Ph.D.
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.019" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
7473-1208	WATER	12.08.98	18324
7474-1208	WATER	12.08.98	18325

These samples were received in our laboratory on 12.09.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 136.0702.008

SAMPLE ID: 7473-1208
LAB NO: 18324
SAMPLE TYPE: WATER
DATE SAMPLED: 12/08/98

REFERENCE: METALS
ELAP #: 2245

ANALYSIS	METHOD REFERENCE	DATE ANALYZED	REPORTING LIMIT	UNITS	SAMPLE CONC
CADMIUM	6010A	12/15/98	10.0	µg/L	ND
CHROMIUM	6010A	12/15/98	10.0	µg/L	ND
COPPER	6010A	12/15/98	10.0	µg/L	ND
LEAD	6010A	12/15/98	75.0	µg/L	ND
NICKEL	6010A	12/15/98	30.0	µg/L	ND
MERCURY	7470A	12/17/98	0.200	µg/L	ND
ZINC	6010A	12/15/98	20.0	µg/L	26.2

NOTES:

ND - NOT DETECTED AT REPORTING LIMIT

PREPARED BY: [illegible]
DATE: 31 Dec

APPROVED BY: [illegible]
DATE: 12/31/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 136.0702.008

SAMPLE ID: 7474-1208
LAB NO: 18325
SAMPLE TYPE: WATER
DATE SAMPLED: 12/08/98

REFERENCE: METALS
ELAP #: 2245

ANALYSIS	METHOD REFERENCE	DATE ANALYZED	REPORTING LIMIT	UNITS	SAMPLE CONC
CADMIUM	6010A	12/15/98	10.0	µg/L	ND
CHROMIUM	6010A	12/15/98	10.0	µg/L	ND
COPPER	6010A	12/15/98	10.0	µg/L	ND
LEAD	6010A	12/15/98	75.0	µg/L	ND
NICKEL	6010A	12/15/98	30.0	µg/L	ND
MERCURY	7470A	12/17/98	0.200	µg/L	ND
ZINC	6010A	12/15/98	20.0	µg/L	26.2

NOTES:

ND - NOT DETECTED AT REPORTING LIMIT

PREPARED BY: sb
DATE: 29 Dec 98

APPROVED BY: [illegible]
DATE: 12/31/98

K PRIME, INC.

CHAIN OF CUSTODY RECORD

CONSULTING ANALYTICAL CHEMISTS 3621 Westwind Blvd., Santa Rosa, CA 95403 PHONE: (707) 527-7574 FAX: (707) 527-7879

Client/Project ID	Address/Phone	ANALYSES	KPI Project No.
PES ENVIRONMENTAL	415-849-1600		
Project Location: LTCTC	Client Project No.: 486.0103.019		
Contact: WILL MAST	Sampler (Signature):		

Sample Identification No.	Date	Time	Lab Sample No.	Type of Sample	No. of Containers	Cr Cu Pb Ni Zn Hg							Expected Turnaround Time	Remarks
7473-1208	12.08.98	1500	18324	WATER	1	X							STD.	WWM ~~NEEDS NO PRESERVATIVE~~
7474-1208	12.08.98	1513	18325	"	1	X							STD.	

SAMPLES HAVE NOT BEEN PRESERVED

Relinquished by: (Signature)	Received by: (Signature)	Date	Time
Will Mast	Emil (VTC)	12/9/98	1:40 pm
Emil (VTC)	Ginger Brenlee	12-9-98	1505

Disposal Method	Disposed by: (Signature)	Date	Time

White Copy : Accompanies Samples
Yellow Copy : Sampler

APPENDIX H

CITY OF RICHMOND WASTE WATER PERMIT APPLICATION

→ ONE-TIME BATCH DISCHARGE

CITY OF RICHMOND-WASTE WATER DIVISION-DEPARTMENT OF PUBLIC WORKS
WASTE WATER PERMIT APPLICATION

his Questionnaire should describe activities as they occur **during the immediate past calendar year**. If you require assistance ompleting the application, contact the Industrial Waste Inspection Department (telephone number: 412-2001). Make a copy of the pleted form, and **mail the two (2) original applications to:**

City of Richmond, Waste Water Division
601 Canal Boulevard, Richmond, CA 94804

. Firm Name: LEVIN-RICHMOND TERMINAL CORP.

. Address: 402 WRIGHT AVENUE
RICHMOND, CA 94804

. Plant/Site Manager: MIKE McCOY Telephone number: 510-232-4422 x 309

. Description of business: BULK MATERIALS HANDLING & SHIPPING

5. a. Parcel Number: _____ (Available through C. C. County: 510-313-7400)
b. Name of Property Owner (if different from #1) _____
c. Address of Property Owner (if different from #2) _____

3. SIC CODE(s): _____
(Available through the Business Library in Oakland: 510-505-7001)

7. Number of employees: _____

3. Water purchased from EBMUD for immediate past calendar year. (Please convert gallons to cu. ft.) List all water accounts by number and amounts of water: **(To Calculate Cubic Feet of Water, read the following):**
a. Add the total amount of gallons on all water bills for the past year
b. Multiply this by 0.1337
c. Put this number on the line(s) below.
d. Include any notes/explanations as to how values were obtained.

For example: Total amount of water on water bills from East Bay MUD = 3,500,000 gallons.
3,500,000 gals x 0.1337 cu. ft./gal = 467,950 cu. ft.
I would then write 467,950 cu. ft. on the line(s) below.

0

9. Source and amount of water entering the sewer in addition to EBMUD in cu.ft. (i.e. stormwater): 13,000 gallons

10. Add Item #8 and item #9: _____

11. Uses of water (i.e. irrigation, rinsing floors, vehicle washing, bathrooms, process use)Please include known amounts per use

12. Amount of water not entering the sewer in cubic feet per year: _____
Please attach any notes/explanations as to how values were obtained

13. Subtract item #12 from item #10: _____

14. City's Allowance for Domestic Sewage (Item #7 x 700 cu. ft.): _____

15. Subtract item #14 from item #13: _____

16. Completed by (Please Print): WILLIAM W. MAST, PES ENVIRONMENTAL Date: 1-12-98

17. Signature of Managing Official: William W. Mast ON BEHALF OF LEVIN-RICHMO

18. Name of Alternative Representative: BILL FRIZZELL, PES ENVIRONMENTAL

Table 1. Summary of Analytical Results for Excavation Water in Portable Tanks
Upland Capping Project
Former United Heckathorn Facility
Richmond, California

Analyte	Units	Portable Tank PT-1	Portable Tank PT-2
VOCs			
All Compounds	µg/L	ND	ND
Petroleum Hydrocarbons			
TPH-G	mg/L	<0.05	<0.05
TPH-D	mg/L	0.29	<0.05
Pesticides			
Heptachlor Epoxide	µg/L	<0.50	0.53
Dieldrin	µg/L	4.75	3.83
Endrin	µg/L	5.75	5.10
4,4'-DDD	µg/L	3.30	3.85
4,4'-DDT	µg/L	2.79	2.03
Metals			
Cadmium	µg/L	<10.0	<10.0
Copper	µg/L	<10.0	<10.0
Chromium	µg/L	<10.0	<10.0
Lead	µg/L	<75.0	<75.0
Nickel	µg/L	<30.0	<30.0
Zinc	µg/L	26.2	26.2
Mercury	µg/L	<0.200	<0.200

Notes:
µg/L = Micrograms per liter (equivalent to parts per billion [ppb]).
mg/L = Milligrams per liter (equivalent to parts per million [ppm]).
<0.50 = Not detected at or above the laboratory reporting limit indicated.
ND = Not detected at or above the laboratory reporting limit.
Reporting limit varies; see analytical laboratory report for details.
TPH-G = Total petroleum hydrocarbons quantified as gasoline.
TPH-D = Total petroleum hydrocarbons quantified as diesel.
VOCs = Volatile organic compounds.

K PRIME, Inc.
CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

RECEIVED JAN 0 5 1999

TRANSMITTAL

DATE: 12.31.98

TO: Mr. WILL MAST
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct.: 9418
Project: "486.0103.019"

FROM: Richard A. Kagel, Ph.D.
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.019" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
7473-1208	WATER	12.08.98	18324
7474-1208	WATER	12.08.98	18325

These samples were received in our laboratory on 12.09.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 136.0702.008

SAMPLE ID: 7473-1208
LAB NO: 18324
SAMPLE TYPE: WATER
DATE SAMPLED: 12/08/98

REFERENCE: METALS
ELAP #: 2245

ANALYSIS	METHOD REFERENCE	DATE ANALYZED	REPORTING LIMIT	UNITS	SAMPLE CONC
CADMIUM	6010A	12/15/98	10.0	µg/L	ND
CHROMIUM	6010A	12/15/98	10.0	µg/L	ND
COPPER	6010A	12/15/98	10.0	µg/L	ND
LEAD	6010A	12/15/98	75.0	µg/L	ND
NICKEL	6010A	12/15/98	30.0	µg/L	ND
MERCURY	7470A	12/17/98	0.200	µg/L	ND
ZINC	6010A	12/15/98	20.0	µg/L	26.2

NOTES:

ND - NOT DETECTED AT REPORTING LIMIT

PREPARED BY: sb
DATE: 28 Dec

APPROVED BY: ck
DATE: 12/31/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 136.0702.008

SAMPLE ID: 7474-1208
LAB NO: 18325
SAMPLE TYPE: WATER
DATE SAMPLED: 12/08/98

REFERENCE: METALS
ELAP #: 2245

ANALYSIS	METHOD REFERENCE	DATE ANALYZED	REPORTING LIMIT	UNITS	SAMPLE CONC
CADMIUM	6010A	12/15/98	10.0	µg/L	ND
CHROMIUM	6010A	12/15/98	10.0	µg/L	ND
COPPER	6010A	12/15/98	10.0	µg/L	ND
LEAD	6010A	12/15/98	75.0	µg/L	ND
NICKEL	6010A	12/15/98	30.0	µg/L	ND
MERCURY	7470A	12/17/98	0.200	µg/L	ND
ZINC	6010A	12/15/98	20.0	µg/L	26.2

NOTES:

ND - NOT DETECTED AT REPORTING LIMIT

PREPARED BY: sb
DATE: 29 Dec 98

APPROVED BY: [illegible]
DATE: 12/31/98

K PRIME, INC.

CHAIN OF CUSTODY RECORD

CONSULTING ANALYTICAL CHEMISTS 3621 Westwind Blvd., Santa Rosa, CA 95403 PHONE: (707) 527-7574 FAX: (707) 527-7879

Client/Project ID	Address/Phone	ANALYSES	KPI Project No.
PES ENVIRONMENTAL	415-844-1600		
Project Location: LTCTC	Client Project No.: 486.0103.019		
Contact: WILL MAST	Sampler (Signature)		

Sample Identification No.	Date	Time	Lab Sample No.	Type of Sample	No. of Containers	Cr, Cu, Pb, Nzn, Ag							Expected Turnaround Time	Remarks
7473-1208	12.08.98	1500	18324	WATER	1	X							STD.	WWM ~~NEEDS NO PRESERVATIVE~~
7474-1208	12.08.98	1513	18325	"	1	X							STD.	

SAMPLES HAVE NOT BEEN PRESERVED

Relinquished by: (Signature)	Received by: (Signature)	Date	Time
Will Mast	Emil (KTC)	12/9/98	1:40 Pm
Relinquished by: (Signature) Emil (KTC)	Received by: (Signature) Ginger Brenlee	12-9-98	1505
Relinquished by: (Signature)	Received by: (Signature)	Date	Time

Disposal Method

Disposed by: (Signature)	Date	Time

White Copy : Accompanies Samples
Yellow Copy : Sampler

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

METHOD: PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: PT-1
LAB NO: 15904
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

DATE EXTRACTED: 8/24/98
DATE ANALYZED: 8/25/98

UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.50	ND
B-BHC	319-85-7	0.50	ND
LINDANE	58-89-9	0.50	ND
HEPTACHLOR	76-44-8	0.50	ND
D-BHC	319-86-8	0.50	ND
ALDRIN	309-00-2	0.50	ND
HEPTACHLOR EPOXIDE	1024-57-3	0.50	ND
ENDOSULFAN I	959-98-8	0.50	ND
4,4'-DDE	72-55-9	1.00	ND
DIELDRIN	60-57-1	1.00	4.75
ENDRIN	72-20-8	1.00	5.75
4,4'-DDD	72-54-8	1.00	3.30
ENDOSULFAN II	33212-65-9	1.00	ND
4,4'-DDT	50-29-3	1.00	2.79
ENDRIN ALDEHYDE	7421-93-4	1.00	ND
ENDOSULFAN SULFATE	1031-07-8	1.00	ND
METHOXYCHLOR	72-43-5	5.0	ND
CHLORDANE	57-74-9	5.0	ND
TOXPHENE	8001-35-2	10.0	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: BAK
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

METHOD: PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: PT-2
LAB NO: 15905
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

DATE EXTRACTED: 8/24/98
DATE ANALYZED: 8/25/98

UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	0.50	ND
B-BHC	319-85-7	0.50	ND
LINDANE	58-89-9	0.50	ND
HEPTACHLOR	76-44-8	0.50	ND
D-BHC	319-86-8	0.50	ND
ALDRIN	309-00-2	0.50	0.53
HEPTACHLOR EPOXIDE	1024-57-3	0.50	ND
ENDOSULFAN I	959-98-8	0.50	ND
4,4'-DDE	72-55-9	1.00	ND
DIELDRIN	60-57-1	1.00	3.83
ENDRIN	72-20-8	1.00	5.10
4,4'-DDD	72-54-8	1.00	3.75
ENDOSULFAN II	33212-65-9	1.00	ND
4,4'-DDT	50-29-3	1.00	2.03
ENDRIN ALDEHYDE	7421-93-4	1.00	ND
ENDOSULFAN SULFATE	1031-07-8	1.00	ND
METHOXYCHLOR	72-43-5	5.0	ND
CHLORDANE	57-74-9	5.0	ND
TOXPHENE	8001-35-2	10.0	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: RAK
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

SAMPLE ID: PT-1
LAB NO: 15904
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

METHOD: TPH-G/D
REFERENCE: EPA MOD 8015

DATE ANALYZED: 8/26/98
UNITS: mg/L

COMPOUND NAME	REPORTING LIMIT	SAMPLE CONC
TPH-G	0.05	ND
TPH-D*	0.05	0.29

NOTES:
ND - NOT DETECTED AT STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

* - DIESEL RANGE EXTRACTABLES GC/FID PATTERN

DIESEL FUEL	
DEGRADED DIESEL FUEL	
PETROLEUM - HEAVIER THAN DIESEL	
PETROLEUM - LIGHTER THAN DIESEL	
UNKNOWN EXTRACTABLES PATTERN	YES

APPROVED BY: MAK
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

SAMPLE ID: PT-2
LAB NO: 15905
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

METHOD: TPH-G/D
REFERENCE: EPA MOD 8015

DATE ANALYZED: 8/26/98
UNITS: mg/L

COMPOUND NAME	REPORTING LIMIT	SAMPLE CONC
TPH-G	0.05	ND
TPH-D*	0.05	ND

NOTES:
ND - NOT DETECTED AT STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

* - DIESEL RANGE EXTRACTABLES GC/FID PATTERN

DIESEL FUEL	
DEGRADED DIESEL FUEL	
PETROLEUM - HEAVIER THAN DIESEL	
PETROLEUM - LIGHTER THAN DIESEL	
UNKNOWN EXTRACTABLES PATTERN	

APPROVED BY: RAK
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

SAMPLE ID: PT-1
LAB NO: 15904
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/24/98
UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
DICHLORODIFLUOROMETHANE	75-71-8	0.500	ND
CHLOROMETHANE	74-87-3	0.500	ND
VINYL CHLORIDE	75-01-4	0.500	ND
BROMOMETHANE	74-83-9	0.500	ND
CHLOROETHANE	75-00-3	0.500	ND
TRICHLOROFLUOROMETHANE	75-69-4	0.500	ND
1,1-DICHLOROETHENE	75-35-4	0.500	ND
METHYLENE CHLORIDE	75-09-2	5.000	ND
TRANS-1,2-DICHLOROETHENE	156-60-5	0.500	ND
1,1-DICHLOROETHANE	75-34-3	0.500	ND
CIS-1,2-DICHLOROETHENE	156-59-2	0.500	ND
2,2-DICHLOROPROPANE	594-20-7	0.500	ND
BROMOCHLOROMETHANE	74-97-5	0.500	ND
CHLOROFORM	67-66-3	0.500	ND
1,1,1-TRICHLOROETHANE	71-55-6	0.500	ND
CARBON TETRACHLORIDE	56-23-5	0.500	ND
1,1-DICHLOROPROPENE	563-58-6	0.500	ND
BENZENE	71-43-2	0.500	ND
1,2-DICHLOROETHANE	107-06-2	0.500	ND
TRICHLOROETHENE	79-01-6	0.500	ND
1,2-DICHLOROPROPANE	78-87-5	0.500	ND
DIBROMOMETHANE	74-95-3	0.500	ND
BROMODICHLOROMETHANE	75-27-4	0.500	ND
TRANS-1,3-DICHLOROPROPENE	10061-02-6	0.500	ND
4-METHYL-2-PENTANONE	108-10-1	0.500	ND
TOLUENE	108-88-3	0.500	ND
CIS-1,3-DICHLOROPROPENE	10061-01-5	0.500	ND
1,1,2-TRICHLOROETHANE	79-00-5	0.500	ND
TETRACHLOROETHENE	127-18-4	0.500	ND
1,3-DICHLOROPROPANE	142-28-9	0.500	ND
DIBROMOCHLOROMETHANE	124-48-1	0.500	ND
1,2-DIBROMOETHANE	106-93-4	0.500	ND
CHLOROBENZENE	108-90-7	0.500	ND
1,1,1,2-TETRACHLOROETHANE	630-20-6	0.500	ND
ETHYLBENZENE	100-41-4	0.500	ND
XYLENE (M+P)	1330-20-7	0.500	ND
XYLENE (O)	1330-20-7	0.500	ND
STYRENE	100-42-5	0.500	ND
BROMOFORM	75-25-2	0.500	ND

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

SAMPLE ID: PT-1
LAB NO: 15904
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/24/98
UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
ISOPROPYLBENZENE	98-82-8	0.500	ND
1,1,2,2-TETRACHLOROETHANE	79-34-5	0.500	ND
BROMOBENZENE	108-86-1	0.500	ND
1,2,3-TRICHLOROPROPANE	96-18-4	0.500	ND
N-PROPYLBENZENE	103-65-1	0.500	ND
2-CHLOROTOLUENE	95-49-8	0.500	ND
1,3,5-TRIMETHYLBENZENE	108-67-8	0.500	ND
4-CHLOROTOLUENE	106-43-4	0.500	ND
TERT-BUTYLBENZENE	98-06-6	0.500	ND
1,2,4-TRIMETHYLBENZENE	95-63-6	0.500	ND
SEC-BUTYLBENZENE	135-98-8	0.500	ND
1,3-DICHLOROBENZENE	541-73-1	0.500	ND
4-ISOPROPYLTOLUENE	99-87-6	0.500	ND
1,4-DICHLOROBENZENE	106-46-7	0.500	ND
N-BUTYLBENZENE	104-51-8	0.500	ND
1,2-DICHLOROBENZENE	95-50-1	0.500	ND
1,2-DIBROMO-3-CHLOROPROPANE	96-12-8	0.500	ND
1,2,4-TRICHLOROBENZENE	120-82-1	0.500	ND
HEXACHLOROBUTADIENE	87-68-3	0.500	ND
NAPHTHALENE	91-20-3	0.500	ND
1,2,3-TRICHLOROBENZENE	87-61-6	0.500	ND

SURROGATE RECOVERY	%
DIBROMOFLUOROMETHANE	95
TOLUENE-D8	98
4-BROMOFLUOROBENZENE	94

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

APPROVED BY: BAK
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

SAMPLE ID: PT-2
LAB NO: 15905
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/24/98
UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
DICHLORODIFLUOROMETHANE	75-71-8	0.500	ND
CHLOROMETHANE	74-87-3	0.500	ND
VINYL CHLORIDE	75-01-4	0.500	ND
BROMOMETHANE	74-83-9	0.500	ND
CHLOROETHANE	75-00-3	0.500	ND
TRICHLOROFLUOROMETHANE	75-69-4	0.500	ND
1,1-DICHLOROETHENE	75-35-4	0.500	ND
METHYLENE CHLORIDE	75-09-2	5.000	ND
TRANS-1,2-DICHLOROETHENE	156-60-5	0.500	ND
1,1-DICHLOROETHANE	75-34-3	0.500	ND
CIS-1,2-DICHLOROETHENE	156-59-2	0.500	ND
2,2-DICHLOROPROPANE	594-20-7	0.500	ND
BROMOCHLOROMETHANE	74-97-5	0.500	ND
CHLOROFORM	67-66-3	0.500	ND
1,1,1-TRICHLOROETHANE	71-55-6	0.500	ND
CARBON TETRACHLORIDE	56-23-5	0.500	ND
1,1-DICHLOROPROPENE	563-58-6	0.500	ND
BENZENE	71-43-2	0.500	ND
1,2-DICHLOROETHANE	107-06-2	0.500	ND
TRICHLOROETHENE	79-01-6	0.500	ND
1,2-DICHLOROPROPANE	78-87-5	0.500	ND
DIBROMOMETHANE	74-95-3	0.500	ND
BROMODICHLOROMETHANE	75-27-4	0.500	ND
TRANS-1,3-DICHLOROPROPENE	10061-02-6	0.500	ND
4-METHYL-2-PENTANONE	108-10-1	0.500	ND
TOLUENE	108-88-3	0.500	ND
CIS-1,3-DICHLOROPROPENE	10061-01-5	0.500	ND
1,1,2-TRICHLOROETHANE	79-00-5	0.500	ND
TETRACHLOROETHENE	127-18-4	0.500	ND
1,3-DICHLOROPROPANE	142-28-9	0.500	ND
DIBROMOCHLOROMETHANE	124-48-1	0.500	ND
1,2-DIBROMOETHANE	106-93-4	0.500	ND
CHLOROBENZENE	108-90-7	0.500	ND
1,1,1,2-TETRACHLOROETHANE	630-20-6	0.500	ND
ETHYLBENZENE	100-41-4	0.500	ND
XYLENE (M+P)	1330-20-7	0.500	ND
XYLENE (O)	1330-20-7	0.500	ND
STYRENE	100-42-5	0.500	ND
BROMOFORM	75-25-2	0.500	ND

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

SAMPLE ID: PT-2
LAB NO: 15905
SAMPLE TYPE: WATER
DATE SAMPLED: 8/21/98
TIME SAMPLED: 15:30

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/24/98
UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
ISOPROPYLBENZENE	98-82-8	0.500	ND
1,1,2,2-TETRACHLOROETHANE	79-34-5	0.500	ND
BROMOBENZENE	108-86-1	0.500	ND
1,2,3-TRICHLOROPROPANE	96-18-4	0.500	ND
N-PROPYLBENZENE	103-65-1	0.500	ND
2-CHLOROTOLUENE	95-49-8	0.500	ND
1,3,5-TRIMETHYLBENZENE	108-67-8	0.500	ND
4-CHLOROTOLUENE	106-43-4	0.500	ND
TERT-BUTYLBENZENE	98-06-6	0.500	ND
1,2,4-TRIMETHYLBENZENE	95-63-6	0.500	ND
SEC-BUTYLBENZENE	135-98-8	0.500	ND
1,3-DICHLOROBENZENE	541-73-1	0.500	ND
4-ISOPROPYLTOLUENE	99-87-6	0.500	ND
1,4-DICHLOROBENZENE	106-46-7	0.500	ND
N-BUTYLBENZENE	104-51-8	0.500	ND
1,2-DICHLOROBENZENE	95-50-1	0.500	ND
1,2-DIBROMO-3-CHLOROPROPANE	96-12-8	0.500	ND
1,2,4-TRICHLOROBENZENE	120-82-1	0.500	ND
HEXACHLOROBUTADIENE	87-68-3	0.500	ND
NAPHTHALENE	91-20-3	0.500	ND
1,2,3-TRICHLOROBENZENE	87-61-6	0.500	ND

SURROGATE RECOVERY	%
DIBROMOFLUOROMETHANE	95
TOLUENE-D8	98
4-BROMOFLUOROBENZENE	94

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

APPROVED BY: BMK
DATE: 8/27/98

K PRIME, INC.

CHAIN OF CUSTODY RECORD

CONSULTING ANALYTICAL CHEMISTS 3621 Westwind Blvd., Santa Rosa, CA 95403 PHONE: (707) 527-7574 FAX: (707) 527-7879

Client/Project ID	Address/Phone	ANALYSES	KPI Project No.
PES/LRTC	415 849 1600		9418
Project Location: RICHMOND	Client Project No.: 4860103 022		
Contact: BILL FRIZZEL	Sampler (Signature): Tom Lion		

Sample Identification No.	Date	Time	Lab Sample No.	Type of Sample	No. of Containers	8080	8260	TPH-D	TPH-G				Expected Turnaround Time	Remarks
PT-1	8-21-98	15:30	15904	WATER	8	X	X	X	X				72 HOUR	CAUTION, MAY
PT-2	8-21-98	15:30	15905	WATER	8	X	X	X	X				"	CONTAIN PESTICIDES

Relinquished by: (Signature)	Received by: (Signature)	Date	Time
Tom Lion	NELS WOLDFEN	8/21/98	1733
Relinquished by: (Signature)	Received by: (Signature)	Date	Time
Relinquished by: (Signature)	Received by: (Signature)	Date	Time

Disposal Method

Disposed by: (Signature) | Date | Time

White Copy : Accompanies Samples
Yellow Copy : Sampler

APPENDIX I

ANALYTICAL LABORATORY REPORTS AND CHAIN-OF-CUSTODY FORMS FOR MISCELLANEOUS SOLID AND LIQUID SAMPLES

RECEIVED JUN 0 1 1998

K PRIME, Inc.

CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 05.26.98

TO: Mr. Will Mast
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct: 9418
Project: 486.0103.015

FROM: Richard A. Kagel, Ph.D. RAK 5/26/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.015" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
980521-G1	SOIL	05.21.98	14826
980521-G2	SOIL	05.21.98	14827
980521-G3	SOIL	05.21.98	14828
980521-G4	SOIL	05.21.98	14829
980521-G5	SOIL	05.21.98	14830
980521-G6	SOIL	05.21.98	14831

These samples were received in our laboratory on 05.22.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486.0103.015

SAMPLE ID: 980521-G1
LAB NO: 14826
SAMPLE TYPE: SOIL
DATE SAMPLED: 5/21/98
TIME SAMPLED: 15:20

METHOD: PESTICIDES
REFERENCE: EPA 8080

DATE ANALYZED: 5/25/98
UNITS: UG/KG

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	1,000	ND
B-BHC	319-85-7	1,000	ND
LINDANE	58-89-9	1,000	ND
HEPTACHLOR	76-44-8	1,000	ND
D-BHC	319-86-8	1,000	ND
ALDRIN	309-00-2	1,000	ND
HEPTACHLOR EPOXIDE	1024-57-3	1,000	ND
ENDOSULFAN I	959-98-8	1,000	ND
4,4'-DDE	72-55-9	1,000	3,580
DIELDRIN	60-57-1	1,000	1,120
ENDRIN	72-20-8	1,000	4,040
4,4'-DDD	72-54-8	1,000	ND
ENDOSULFAN II	33212-65-9	1,000	ND
4,4'-DDT	50-29-3	1,000	8,860
ENDRIN ALDEHYDE	7421-93-4	1,000	ND
ENDOSULFAN SULFATE	1031-07-8	1,000	ND
METHOXYCHLOR	72-43-5	10,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

PREPARED BY: RAK
DATE: 5/26/98

APPROVED BY: RAK
DATE: 5/26/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486.0103.015

SAMPLE ID: 980521-G2
LAB NO: 14827
SAMPLE TYPE: SOIL
DATE SAMPLED: 5/21/98
TIME SAMPLED: 15:20

METHOD: PESTICIDES
REFERENCE: EPA 8080

DATE ANALYZED: 5/25/98
UNITS: UG/KG

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	5,000	ND
B-BHC	319-85-7	5,000	ND
LINDANE	58-89-9	5,000	ND
HEPTACHLOR	76-44-8	5,000	ND
D-BHC	319-86-8	5,000	ND
ALDRIN	309-00-2	5,000	ND
HEPTACHLOR EPOXIDE	1024-57-3	5,000	ND
ENDOSULFAN I	959-98-8	5,000	ND
4,4'-DDE	72-55-9	5,000	8,180
DIELDRIN	60-57-1	5,000	ND
ENDRIN	72-20-8	5,000	23,400
4,4'-DDD	72-54-8	5,000	ND
ENDOSULFAN II	33212-65-9	5,000	ND
4,4'-DDT	50-29-3	5,000	122,600
ENDRIN ALDEHYDE	7421-93-4	5,000	ND
ENDOSULFAN SULFATE	1031-07-8	5,000	ND
METHOXYCHLOR	72-43-5	50,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

PREPARED BY: RAK
DATE: 5/26/98

APPROVED BY: RAK
DATE: 5/26/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486.0103.015

SAMPLE ID: 980521-G3
LAB NO: 14828
SAMPLE TYPE: SOIL
DATE SAMPLED: 5/21/98
TIME SAMPLED: 15:20

METHOD: PESTICIDES
REFERENCE: EPA 8080

DATE ANALYZED: 5/25/98
UNITS: UG/KG

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	1,000	ND
B-BHC	319-85-7	1,000	ND
LINDANE	58-89-9	1,000	ND
HEPTACHLOR	76-44-8	1,000	ND
D-BHC	319-86-8	1,000	ND
ALDRIN	309-00-2	1,000	ND
HEPTACHLOR EPOXIDE	1024-57-3	1,000	ND
ENDOSULFAN I	959-98-8	1,000	ND
4,4'-DDE	72-55-9	1,000	4,560
DIELDRIN	60-57-1	1,000	1,550
ENDRIN	72-20-8	1,000	4,520
4,4'-DDD	72-54-8	1,000	ND
ENDOSULFAN II	33212-65-9	1,000	ND
4,4'-DDT	50-29-3	1,000	9,520
ENDRIN ALDEHYDE	7421-93-4	1,000	ND
ENDOSULFAN SULFATE	1031-07-8	1,000	ND
METHOXYCHLOR	72-43-5	10,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

PREPARED BY: MAK
DATE: 5/26/98

APPROVED BY: MAK
DATE: 5/26/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486.0103.015

SAMPLE ID: 980521-G4
LAB NO: 14829
SAMPLE TYPE: SOIL
DATE SAMPLED: 5/21/98
TIME SAMPLED: 15:20

METHOD: PESTICIDES
REFERENCE: EPA 8080

DATE ANALYZED: 5/22/98
UNITS: UG/KG

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	1,000	ND
B-BHC	319-85-7	1,000	ND
LINDANE	58-89-9	1,000	ND
HEPTACHLOR	76-44-8	1,000	ND
D-BHC	319-86-8	1,000	ND
ALDRIN	309-00-2	1,000	ND
HEPTACHLOR EPOXIDE	1024-57-3	1,000	ND
ENDOSULFAN I	959-98-8	1,000	ND
4,4'-DDE	72-55-9	1,000	ND
DIELDRIN	60-57-1	1,000	ND
ENDRIN	72-20-8	1,000	ND
4,4'-DDD	72-54-8	1,000	ND
ENDOSULFAN II	33212-65-9	1,000	ND
4,4'-DDT	50-29-3	1,000	2,270
ENDRIN ALDEHYDE	7421-93-4	1,000	ND
ENDOSULFAN SULFATE	1031-07-8	1,000	ND
METHOXYCHLOR	72-43-5	10,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

PREPARED BY: RMK
DATE: 5/26/98

APPROVED BY: RMK
DATE: 5/26/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486.0103.015

SAMPLE ID: 980521-G5
LAB NO: 14830
SAMPLE TYPE: SOIL
DATE SAMPLED: 5/21/98
TIME SAMPLED: 15:20

METHOD: PESTICIDES
REFERENCE: EPA 8080

DATE ANALYZED: 5/26/98
UNITS: UG/KG

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	5,000	ND
B-BHC	319-85-7	5,000	ND
LINDANE	58-89-9	5,000	ND
HEPTACHLOR	76-44-8	5,000	ND
D-BHC	319-86-8	5,000	ND
ALDRIN	309-00-2	5,000	ND
HEPTACHLOR EPOXIDE	1024-57-3	5,000	ND
ENDOSULFAN I	959-98-8	5,000	ND
4,4'-DDE	72-55-9	5,000	7,180
DIELDRIN	60-57-1	5,000	ND
ENDRIN	72-20-8	5,000	14,300
4,4'-DDD	72-54-8	5,000	ND
ENDOSULFAN II	33212-65-9	5,000	ND
4,4'-DDT	50-29-3	5,000	42,600
ENDRIN ALDEHYDE	7421-93-4	5,000	ND
ENDOSULFAN SULFATE	1031-07-8	5,000	ND
METHOXYCHLOR	72-43-5	50,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

PREPARED BY: MAK
DATE: 5/26/98

APPROVED BY: RMK
DATE: 5/26/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486.0103.015

SAMPLE ID: 980521-G6
LAB NO: 14831
SAMPLE TYPE: SOIL
DATE SAMPLED: 5/21/98
TIME SAMPLED: 15:20

METHOD: PESTICIDES
REFERENCE: EPA 8080

DATE ANALYZED: 5/26/98
UNITS: UG/KG

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	5,000	ND
B-BHC	319-85-7	5,000	ND
LINDANE	58-89-9	5,000	ND
HEPTACHLOR	76-44-8	5,000	ND
D-BHC	319-86-8	5,000	ND
ALDRIN	309-00-2	5,000	ND
HEPTACHLOR EPOXIDE	1024-57-3	5,000	ND
ENDOSULFAN I	959-98-8	5,000	ND
4,4'-DDE	72-55-9	5,000	8,220
DIELDRIN	60-57-1	5,000	ND
ENDRIN	72-20-8	5,000	12,300
4,4'-DDD	72-54-8	5,000	ND
ENDOSULFAN II	33212-65-9	5,000	ND
4,4'-DDT	50-29-3	5,000	63,200
ENDRIN ALDEHYDE	7421-93-4	5,000	ND
ENDOSULFAN SULFATE	1031-07-8	5,000	ND
METHOXYCHLOR	72-43-5	50,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

PREPARED BY: RAK
DATE: 5/26/98

APPROVED BY: RAK
DATE: 5/26/98

K PRIME, INC.
LABORATORY REPORT

METHOD: PCB'S IN SOIL
REFERENCE: EPA 8080

CLIENT PROJECT: 486.0103.015
KPI PROJECT: 9418

UNITS: mg/Kg

SAMPLE ID	LAB ID #	DATE SAMPLED	TIME SAMPLED	SAMPLE CONC	*AROCLOR DETECTED	REPORTING LIMIT	ANALYSIS DATE
980521-G4	14829	5/21/98	15:20	7.13	1254	0.100	5/22/98

NOTES:
* - TARGET LIST INCLUDES AROCLORS 1016, 1221, 1232, 1242, 1248, 1254, 1260
ND - NOT DETECTED AT REPORTING LIMIT

APPROVED BY: BMK
DATE: 5/26/98

K PRIME, INC.

CHAIN OF CUSTODY RECORD

CONSULTING ANALYTICAL CHEMISTS 4197 Lakeside Drive, Suite 170, Richmond, CA 94806 FAX: (510) 222/4817 PHONE: (510) 222-4815

CAUTION

Client/Project ID	Address/Phone	ANALYSES	KPI Project No.
PES / LRTC	415-899-1600		9418
Project Location: RICHMOND, CA	Client Project No.: 486.0103.015		
Contact: WILL MAST	Sampler (Signature): William Mast		

Sample Identification No.	Date	Time	Lab Sample No.	Type of Sample	No. of Containers	8080							Expected Turnaround Time	Remarks
10991-521	5.21.98	1557	~~14825~~	~~AIR~~	1	X							Wed. 12:00	
3740-521	↓	1602	~~14823~~	↓	1	X							↓	
3756-521	↓	1615	~~14824~~	↓	1	X							↓	☆
980521-61	5.21.98	1520	14826	SOIL	1	X							Need by	CAUTION –
-62	↓	↓	14827	↓	1	X							Tues, 5:00	MAY BE
-63	↓	↓	14828	↓	1	X							↓	DDT PRODUCT
-64	↓	↓	14829	↓	1	X							↓	↓
-65	↓	↓	14830	↓	1	X							↓	☆
-66	↓	↓	14831	↓	1	X							↓	↓

CAUTION

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
William Mast	5-22-98	1007	[illegible]	5-22-98	1055
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time

Disposal Method

Disposed by: (Signature) Date Time

White Copy : Accompanies Samples
Yellow Copy : Sampler

K PRIME, Inc.

CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 08.03.98

TO: Mr. DON SEYMOUR
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct: 100-9418
Project: 486.0103.014

FROM: Richard A. Kagel, Ph.D. RAK 8/3/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.014" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following sample:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
EX-2-WS	WATER	07.31.98	15627

This sample was received in our laboratory on 08.01.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 100-9418
YOUR PROJECT: 4860103014

SAMPLE ID: EX-2-WS
LAB NO: 15627
SAMPLE TYPE: WATER
DATE SAMPLED: 7/31/98
TIME SAMPLED: 15:35

METHOD: PESTICIDES AND PCB'S
REFERENCE: EPA 8080

DATE ANALYZED: 8/3/98
UNITS: UG/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	20.0	ND
B-BHC	319-85-7	20.0	ND
LINDANE	58-89-9	20.0	ND
HEPTACHLOR	76-44-8	20.0	ND
D-BHC	319-86-8	20.0	ND
ALDRIN	309-00-2	20.0	1,080
HEPTACHLOR EPOXIDE	1024-57-3	20.0	ND
ENDOSULFAN I	959-98-8	100	ND
4,4'-DDE	72-55-9	20.0	474
DIELDRIN	60-57-1	20.0	439
ENDRIN	72-20-8	20.0	1,690
4,4'-DDD	72-54-8	20.0	231
ENDOSULFAN II	33212-65-9	100	ND
4,4'-DDT	50-29-3	100	638
ENDRIN ALDEHYDE	7421-93-4	100	ND
ENDOSULFAN SULFATE	1031-07-8	200	ND
METHOXYCHLOR	72-43-5	200	ND
CHLORDANE	57-74-9	200	ND
TOXPHENE	8001-35-2	200	ND
AROCLOR 1016	12674-11-2	200	ND
AROCLOR 1221	11104-28-2	200	ND
AROCLOR 1232	11141-16-5	200	ND
AROCLOR 1242	53469-21-9	200	ND
AROCLOR 1248	12672-29-6	200	ND
AROCLOR 1254	11097-69-1	200	ND
AROCLOR 1260	11096-82-5	200	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: RAM
DATE: 8/3/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 100-9418
YOUR PROJECT: 4860103014

SAMPLE ID: EX-2-WS
LAB NO: 15627
SAMPLE TYPE: WATER
DATE SAMPLED: 7/31/98
TIME SAMPLED: 15:35

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/2/98
UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
DICHLORODIFLUOROMETHANE	75-71-8	20.0	ND
CHLOROMETHANE	74-87-3	20.0	ND
VINYL CHLORIDE	75-01-4	20.0	ND
BROMOMETHANE	74-83-9	20.0	ND
CHLOROETHANE	75-00-3	20.0	ND
TRICHLOROFLUOROMETHANE	75-69-4	20.0	ND
1,1-DICHLOROETHENE	75-35-4	20.0	ND
METHYLENE CHLORIDE	75-09-2	20.0	ND
TRANS-1,2-DICHLOROETHENE	156-60-5	20.0	ND
1,1-DICHLOROETHANE	75-34-3	20.0	ND
CIS-1,2-DICHLOROETHENE	156-59-2	20.0	25.2
2,2-DICHLOROPROPANE	594-20-7	20.0	ND
BROMOCHLOROMETHANE	74-97-5	20.0	ND
CHLOROFORM	67-66-3	20.0	ND
1,1,1-TRICHLOROETHANE	71-55-6	20.0	ND
CARBON TETRACHLORIDE	56-23-5	20.0	ND
1,1-DICHLOROPROPENE	563-58-6	20.0	ND
BENZENE	71-43-2	20.0	ND
1,2-DICHLOROETHANE	107-06-2	20.0	ND
TRICHLOROETHENE	79-01-6	20.0	ND
1,2-DICHLOROPROPANE	78-87-5	20.0	ND
DIBROMOMETHANE	74-95-3	20.0	ND
BROMODICHLOROMETHANE	75-27-4	20.0	ND
TRANS-1,3-DICHLOROPROPENE	10061-02-6	20.0	ND
4-METHYL-2-PENTANONE	108-10-1	20.0	ND
TOLUENE	108-88-3	20.0	ND
CIS-1,3-DICHLOROPROPENE	10061-01-5	20.0	ND
1,1,2-TRICHLOROETHANE	79-00-5	20.0	ND
TETRACHLOROETHENE	127-18-4	20.0	ND
1,3-DICHLOROPROPANE	142-28-9	20.0	ND
DIBROMOCHLOROMETHANE	124-48-1	20.0	ND
1,2-DIBROMOETHANE	106-93-4	20.0	ND
CHLOROBENZENE	108-90-7	20.0	25.6
1,1,1,2-TETRACHLOROETHANE	630-20-6	20.0	ND
ETHYLBENZENE	100-41-4	20.0	828
XYLENE (M+P)	1330-20-7	20.0	2,900
XYLENE (O)	1330-20-7	20.0	1,204
STYRENE	100-42-5	20.0	ND
BROMOFORM	75-25-2	20.0	ND

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 100-9418
YOUR PROJECT: 4860103014

SAMPLE ID: EX-2-WS
LAB NO: 15627
SAMPLE TYPE: WATER
DATE SAMPLED: 7/31/98
TIME SAMPLED: 15:35

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/2/98
UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
ISOPROPYLBENZENE	98-82-8	20.0	ND
1,1,2,2-TETRACHLOROETHANE	79-34-5	20.0	ND
BROMOBENZENE	108-86-1	20.0	ND
1,2,3-TRICHLOROPROPANE	96-18-4	20.0	ND
N-PROPYLBENZENE	103-65-1	20.0	ND
2-CHLOROTOLUENE	95-49-8	20.0	ND
1,3,5-TRIMETHYLBENZENE	108-67-8	20.0	ND
4-CHLOROTOLUENE	106-43-4	20.0	ND
TERT-BUTYLBENZENE	98-06-6	20.0	ND
1,2,4-TRIMETHYLBENZENE	95-63-6	20.0	30.4
SEC-BUTYLBENZENE	135-98-8	20.0	ND
1,3-DICHLOROBENZENE	541-73-1	20.0	ND
4-ISOPROPYLTOLUENE	99-87-6	20.0	ND
1,4-DICHLOROBENZENE	106-46-7	20.0	ND
N-BUTYLBENZENE	104-51-8	20.0	ND
1,2-DICHLOROBENZENE	95-50-1	20.0	34.4
1,2-DIBROMO-3-CHLOROPROPANE	96-12-8	20.0	ND
1,2,4-TRICHLOROBENZENE	120-82-1	20.0	ND
HEXACHLOROBUTADIENE	87-68-3	20.0	ND
NAPHTHALENE	91-20-3	20.0	69.2
1,2,3-TRICHLOROBENZENE	87-61-6	20.0	ND

SURROGATE RECOVERY	%
DIBROMOFLUOROMETHANE	90
TOLUENE-D8	94
4-BROMOFLUOROBENZENE	94

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

APPROVED BY: RAC
DATE: 8/3/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 100-9418
YOUR PROJECT: 4860103014

SAMPLE ID: EX-2-WS
LAB NO: 15627
SAMPLE TYPE: WATER
DATE SAMPLED: 7/31/98
TIME SAMPLED: 15:35

METHOD: TPH-G/D
REFERENCE: EPA MOD 8015

DATE ANALYZED: 8/2-3/98
UNITS: MG/L

COMPOUND NAME	REPORTING LIMIT	SAMPLE CONC
TPH-G	0.25	10.7
TPH-D*	0.05	40.7

NOTES:
ND - NOT DETECTED AT STATED REPORTING LIMIT
NA - NOT APPLICABLE

* - DIESEL RANGE EXTRACTABLES GC/FID PATTERN

DIESEL FUEL	
DEGRADED DIESEL FUEL	
PETROLEUM - HEAVIER THAN DIESEL	
PETROLEUM - LIGHTER THAN DIESEL	
UNKNOWN EXTRACTABLES PATTERN	YES

APPROVED BY: CAK
DATE: 8/3/98

K PRIME, INC.

CHAIN OF CUSTODY RECORD

CONSULTING ANALYTICAL CHEMISTS 4197 Lakeside Drive, Suite 170, Richmond, CA 94806 FAX: (510) 222/4817 PHONE: (510) 222-4815
3621 Westwind Blvd, Santa Rosa, CA 94503

Client/Project ID	Address/Phone	ANALYSES	KPI Project No.
PES Environmental / LRTC	415-899-1600		9418
Project Location: Richmond, CA	Client Project No.: 4860103014		
Contact: Don Seymour	Sampler (Signature): [signature]		

Sample Identification No.	Date	Time	Lab Sample No.	Type of Sample	No. of Containers	8260	8080	TPHg	TPHd				Expected Turnaround Time	Remarks
EX-2-WS	7/31/98	1535	15627	Water	8	X	X	X	X				24 HR	May Contain Pesticides (Warning!)

Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
[signature]	7/31/98		[signature]	8/1/98	1130
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time
Relinquished by: (Signature)	Date	Time	Received by: (Signature)	Date	Time

Disposal Method			White Copy : Accompanies Samples
Disposed by: (Signature)	Date	Time	Yellow Copy : Sampler

RECEIVED AUG 1 3 1998

K PRIME, Inc.
CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 08.11.98

TO: MR. WILL MAST
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct: 9418
Project: 486.0103.022

FROM: Richard A. Kagel, Ph.D. RAK 8/11/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.022" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
EX2-SP2 (COMP A)	SOIL	08.05.98	15659
EX2-SP2 (COMP B)	SOIL	08.05.98	15660

These samples were received in our laboratory on 08.06.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103022

SAMPLE ID: EX2-SP2(COMP A)
LAB NO: 15659
SAMPLE TYPE: SOIL
DATE SAMPLED: 8/5/98
TIME SAMPLED: 10:15

METHOD: PESTICIDES
REFERENCE: EPA 8080

DATE ANALYZED: 8/10/98
UNITS: UG/KG

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	100	ND
B-BHC	319-85-7	100	ND
LINDANE	58-89-9	100	ND
HEPTACHLOR	76-44-8	100	ND
D-BHC	319-86-8	100	ND
ALDRIN	309-00-2	100	2,000
HEPTACHLOR EPOXIDE	1024-57-3	100	ND
ENDOSULFAN I	959-98-8	500	ND
4,4'-DDE	72-55-9	100	984
DIELDRIN	60-57-1	100	1,540
ENDRIN	72-20-8	100	5,980
4,4'-DDD	72-54-8	500	1,020
ENDOSULFAN II	33212-65-9	500	ND
4,4'-DDT	50-29-3	500	2,180
ENDRIN ALDEHYDE	7421-93-4	500	ND
ENDOSULFAN SULFATE	1031-07-8	1,000	ND
METHOXYCHLOR	72-43-5	1,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: MAK
DATE: 8/11/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103022

SAMPLE ID: EX2-SP2 (COMP B)
LAB NO: 15660
SAMPLE TYPE: SOIL
DATE SAMPLED: 8/5/98
TIME SAMPLED: 10:15

METHOD: PESTICIDES
REFERENCE: EPA 8080

DATE ANALYZED: 8/10/98
UNITS: UG/KG

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	500	ND
B-BHC	319-85-7	500	ND
LINDANE	58-89-9	500	ND
HEPTACHLOR	76-44-8	500	ND
D-BHC	319-86-8	500	ND
ALDRIN	309-00-2	500	ND
HEPTACHLOR EPOXIDE	1024-57-3	500	ND
ENDOSULFAN I	959-98-8	2,500	ND
4,4'-DDE	72-55-9	500	3,440
DIELDRIN	60-57-1	500	590
ENDRIN	72-20-8	500	9,800
4,4'-DDD	72-54-8	2,500	ND
ENDOSULFAN II	33212-65-9	2,500	ND
4,4'-DDT	50-29-3	2,500	15,000
ENDRIN ALDEHYDE	7421-93-4	2,500	ND
ENDOSULFAN SULFATE	1031-07-8	5,000	ND
METHOXYCHLOR	72-43-5	5,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: SAK
DATE: 8/11/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103022

SAMPLE ID: EX2-SP2 (COMP A)
LAB NO: 15659
SAMPLE TYPE: SOIL
DATE SAMPLED: 8/5/98
TIME SAMPLED: 10:15

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/6/98
UNITS: µg/kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
DICHLORODIFLUOROMETHANE	75-71-8	5.00	ND
CHLOROMETHANE	74-87-3	5.00	ND
VINYL CHLORIDE	75-01-4	5.00	ND
BROMOMETHANE	74-83-9	5.00	ND
CHLOROETHANE	75-00-3	5.00	ND
TRICHLOROFLUOROMETHANE	75-69-4	5.00	ND
1,1-DICHLOROETHENE	75-35-4	5.00	ND
METHYLENE CHLORIDE	75-09-2	12.0	ND
TRANS-1,2-DICHLOROETHENE	156-60-5	5.00	ND
1,1-DICHLOROETHANE	75-34-3	5.00	ND
CIS-1,2-DICHLOROETHENE	156-59-2	5.00	ND
2,2-DICHLOROPROPANE	594-20-7	5.00	ND
BROMOCHLOROMETHANE	74-97-5	5.00	ND
CHLOROFORM	67-66-3	5.00	ND
1,1,1-TRICHLOROETHANE	71-55-6	5.00	ND
CARBON TETRACHLORIDE	56-23-5	5.00	ND
1,1-DICHLOROPROPENE	563-58-6	5.00	ND
BENZENE	71-43-2	5.00	ND
1,2-DICHLOROETHANE	107-06-2	5.00	ND
TRICHLOROETHENE	79-01-6	5.00	ND
1,2-DICHLOROPROPANE	78-87-5	5.00	ND
DIBROMOMETHANE	74-95-3	5.00	ND
BROMODICHLOROMETHANE	75-27-4	5.00	ND
TRANS-1,3-DICHLOROPROPENE	10061-02-6	5.00	ND
4-METHYL-2-PENTANONE	108-10-1	5.00	ND
TOLUENE	108-88-3	5.00	ND
CIS-1,3-DICHLOROPROPENE	10061-01-5	5.00	ND
1,1,2-TRICHLOROETHANE	79-00-5	5.00	ND
TETRACHLOROETHENE	127-18-4	5.00	ND
1,3-DICHLOROPROPANE	142-28-9	5.00	ND
DIBROMOCHLOROMETHANE	124-48-1	5.00	ND
1,2-DIBROMOETHANE	106-93-4	5.00	ND
CHLOROBENZENE	108-90-7	5.00	ND
1,1,1,2-TETRACHLOROETHANE	630-20-6	5.00	ND
ETHYLBENZENE	100-41-4	5.00	210
XYLENE (M+P)	1330-20-7	5.00	951
XYLENE (O)	1330-20-7	5.00	414
STYRENE	100-42-5	5.00	ND
BROMOFORM	75-25-2	5.00	ND

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103022

SAMPLE ID: EX2-SP2 (COMP A)
LAB NO: 15659
SAMPLE TYPE: SOIL
DATE SAMPLED: 8/5/98
TIME SAMPLED: 10:15

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/6/98
UNITS: µg/kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
ISOPROPYLBENZENE	98-82-8	5.00	ND
1,1,2,2-TETRACHLOROETHANE	79-34-5	5.00	ND
BROMOBENZENE	108-86-1	5.00	ND
1,2,3-TRICHLOROPROPANE	96-18-4	5.00	ND
N-PROPYLBENZENE	103-65-1	5.00	ND
2-CHLOROTOLUENE	95-49-8	5.00	ND
1,3,5-TRIMETHYLBENZENE	108-67-8	5.00	30.4
4-CHLOROTOLUENE	106-43-4	5.00	ND
TERT-BUTYLBENZENE	98-06-6	5.00	ND
1,2,4-TRIMETHYLBENZENE	95-63-6	5.00	65.0
SEC-BUTYLBENZENE	135-98-8	5.00	ND
1,3-DICHLOROBENZENE	541-73-1	5.00	ND
4-ISOPROPYLTOLUENE	99-87-6	5.00	20.8
1,4-DICHLOROBENZENE	106-46-7	5.00	ND
N-BUTYLBENZENE	104-51-8	5.00	13.3
1,2-DICHLOROBENZENE	95-50-1	5.00	33.8
1,2-DIBROMO-3-CHLOROPROPANE	96-12-8	5.00	ND
1,2,4-TRICHLOROBENZENE	120-82-1	5.00	ND
HEXACHLOROBUTADIENE	87-68-3	5.00	25.0
NAPHTHALENE	91-20-3	5.00	2,290
1,2,3-TRICHLOROBENZENE	87-61-6	5.00	ND

SURROGATE RECOVERY	%
DIBROMOFLUOROMETHANE	97
TOLUENE-D8	93
4-BROMOFLUOROBENZENE	88

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

APPROVED BY: RMK
DATE: 8/11/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103022

SAMPLE ID: EX2-SP2 (COMP B)
LAB NO: 15660
SAMPLE TYPE: SOIL
DATE SAMPLED: 8/5/98
TIME SAMPLED: 10:15

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/7/98
UNITS: µg/kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
DICHLORODIFLUOROMETHANE	75-71-8	5.00	ND
CHLOROMETHANE	74-87-3	5.00	ND
VINYL CHLORIDE	75-01-4	5.00	ND
BROMOMETHANE	74-83-9	5.00	ND
CHLOROETHANE	75-00-3	5.00	ND
TRICHLOROFLUOROMETHANE	75-69-4	5.00	ND
1,1-DICHLOROETHENE	75-35-4	5.00	ND
METHYLENE CHLORIDE	75-09-2	12.0	ND
TRANS-1,2-DICHLOROETHENE	156-60-5	5.00	ND
1,1-DICHLOROETHANE	75-34-3	5.00	ND
CIS-1,2-DICHLOROETHENE	156-59-2	5.00	ND
2,2-DICHLOROPROPANE	594-20-7	5.00	ND
BROMOCHLOROMETHANE	74-97-5	5.00	ND
CHLOROFORM	67-66-3	5.00	ND
1,1,1-TRICHLOROETHANE	71-55-6	5.00	ND
CARBON TETRACHLORIDE	56-23-5	5.00	ND
1,1-DICHLOROPROPENE	563-58-6	5.00	ND
BENZENE	71-43-2	5.00	ND
1,2-DICHLOROETHANE	107-06-2	5.00	ND
TRICHLOROETHENE	79-01-6	5.00	ND
1,2-DICHLOROPROPANE	78-87-5	5.00	ND
DIBROMOMETHANE	74-95-3	5.00	ND
BROMODICHLOROMETHANE	75-27-4	5.00	ND
TRANS-1,3-DICHLOROPROPENE	10061-02-6	5.00	ND
4-METHYL-2-PENTANONE	108-10-1	5.00	ND
TOLUENE	108-88-3	5.00	ND
CIS-1,3-DICHLOROPROPENE	10061-01-5	5.00	ND
1,1,2-TRICHLOROETHANE	79-00-5	5.00	ND
TETRACHLOROETHENE	127-18-4	5.00	ND
1,3-DICHLOROPROPANE	142-28-9	5.00	ND
DIBROMOCHLOROMETHANE	124-48-1	5.00	ND
1,2-DIBROMOETHANE	106-93-4	5.00	ND
CHLOROBENZENE	108-90-7	5.00	ND
1,1,1,2-TETRACHLOROETHANE	630-20-6	5.00	ND
ETHYLBENZENE	100-41-4	5.00	23.9
XYLENE (M+P)	1330-20-7	5.00	153
XYLENE (O)	1330-20-7	5.00	82.4
STYRENE	100-42-5	5.00	ND
BROMOFORM	75-25-2	5.00	ND

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103022

SAMPLE ID: EX2-SP2 (COMP B)
LAB NO: 15660
SAMPLE TYPE: SOIL
DATE SAMPLED: 8/5/98
TIME SAMPLED: 10:15

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/7/98
UNITS: µg/kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
ISOPROPYLBENZENE	98-82-8	5.00	ND
1,1,2,2-TETRACHLOROETHANE	79-34-5	5.00	ND
BROMOBENZENE	108-86-1	5.00	ND
1,2,3-TRICHLOROPROPANE	96-18-4	5.00	ND
N-PROPYLBENZENE	103-65-1	5.00	ND
2-CHLOROTOLUENE	95-49-8	5.00	ND
1,3,5-TRIMETHYLBENZENE	108-67-8	5.00	8.38
4-CHLOROTOLUENE	106-43-4	5.00	ND
TERT-BUTYLBENZENE	98-06-6	5.00	ND
1,2,4-TRIMETHYLBENZENE	95-63-6	5.00	17.4
SEC-BUTYLBENZENE	135-98-8	5.00	ND
1,3-DICHLOROBENZENE	541-73-1	5.00	ND
4-ISOPROPYLTOLUENE	99-87-6	5.00	ND
1,4-DICHLOROBENZENE	106-46-7	5.00	ND
N-BUTYLBENZENE	104-51-8	5.00	ND
1,2-DICHLOROBENZENE	95-50-1	5.00	6.75
1,2-DIBROMO-3-CHLOROPROPANE	96-12-8	5.00	ND
1,2,4-TRICHLOROBENZENE	120-82-1	5.00	ND
HEXACHLOROBUTADIENE	87-68-3	5.00	7.75
NAPHTHALENE	91-20-3	5.00	1,550
1,2,3-TRICHLOROBENZENE	87-61-6	5.00	ND

SURROGATE RECOVERY	%
DIBROMOFLUOROMETHANE	93
TOLUENE-D8	96
4-BROMOFLUOROBENZENE	91

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

APPROVED BY: RAK
DATE: 8/11/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 100-9418
YOUR PROJECT: 4860103022

SAMPLE ID: EX2-SP2 (COMP A)
LAB NO: 15659
SAMPLE TYPE: SOIL
DATE SAMPLED: 8/5/98
TIME SAMPLED: 10:15

METHOD: TPH-G/D
REFERENCE: EPA MOD 8015

DATE ANALYZED: 8/7&10/1998
UNITS: MG/KG

COMPOUND NAME	REPORTING LIMIT	SAMPLE CONC
TPH-G	1.00	3.73
TPH-D*	10.0	144

NOTES:
ND - NOT DETECTED AT STATED REPORTING LIMIT
NA - NOT APPLICABLE

* - DIESEL RANGE EXTRACTABLES GC/FID PATTERN

DIESEL FUEL	
DEGRADED DIESEL FUEL	
PETROLEUM - HEAVIER THAN DIESEL	
PETROLEUM - LIGHTER THAN DIESEL	
UNKNOWN EXTRACTABLES PATTERN	YES

PREPARED BY: AB
DATE: 8.11.98

APPROVED BY: RM
DATE: 8/11/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 100-9418
YOUR PROJECT: 4860103022

SAMPLE ID: EX2-SP2 (COMP B)
LAB NO: 15660
SAMPLE TYPE: SOIL
DATE SAMPLED: 8/5/98
TIME SAMPLED: 10:15

METHOD: TPH-G/D
REFERENCE: EPA MOD 8015

DATE ANALYZED: 8/7&10/1998
UNITS: MG/KG

COMPOUND NAME	REPORTING LIMIT	SAMPLE CONC
TPH-G	1.00	1.21
TPH-D*	10.0	ND

NOTES:
ND - NOT DETECTED AT STATED REPORTING LIMIT
NA - NOT APPLICABLE

* - DIESEL RANGE EXTRACTABLES GC/FID PATTERN

DIESEL FUEL	
DEGRADED DIESEL FUEL	
PETROLEUM - HEAVIER THAN DIESEL	
PETROLEUM - LIGHTER THAN DIESEL	
UNKNOWN EXTRACTABLES PATTERN	

PREPARED BY: AB
DATE: 8.11.98

APPROVED BY: RAK
DATE: 8/11/98

PES ENVIRONMENTAL, Inc.
Engineering & Environmental Services

CHAIN OF CUSTODY RECORD

KPI PROJ# 9418

1682 NOVATO BOULEVARD, SUITE 100
NOVATO, CALIFORNIA 94947
(415) 899-1600 FAX (415) 899-1601

SAMPLERS: DJS

JOB NUMBER: 4860103022

NAME / LOCATION: LRTC

PROJECT MANAGER: WILL MAST

RECORDER: [signature]

DATE YR	DATE MO	DATE DY	DATE TIME	SAMPLE NUMBER / DESIGNATION	SOURCE CODE	MATRIX Water	MATRIX Sedim't	MATRIX Soil	MATRIX Oil	# CONTAINERS & PRESERV. Unpres.	H_2SO_4	HNO_3	HCl	Filtered	DEPTH IN FEET	COL MTD CD	QA CODE	EPA 601 / 8010	EPA 602 / 8020 (BTEX)	EPA 624 / 8240	EPA 625 / 8270	TPHg by 5030 / 8015 (mod)	TPHd by 3550 / 8015 (mod)	8080	8260	KPI Samp #
18	08	05	1015	EN42-SP2	49			X		8						1	0					X	X	X	X	(A)15659/(B)15660

NOTE

72-HOUR
PREPARE TWO 4-POINT COMPOSITS
ANALYZE TWO COMPOSITE SAMPLES

May contain pesticides

CHAIN OF CUSTODY RECORD

RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
[signature]			
RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
DISPATCHED BY: (Signature) / DATE / TIME	RECEIVED FOR LAB BY: (Signature)	DATE 8/6/95	TIME 1300

METHOD OF SHIPMENT:

RECEIVED AUG 2 1 1998

K PRIME, Inc.

CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 08.19.98

TO: Mr. WILL MAST
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Acct: 9418
Project: 486.0103.022

Phone: 415.899.1600
FAX: 415.899.1601

FROM: Richard A. Kagel, Ph.D. RAK 8/19/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.022" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following sample:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
EX-1-SS1	PRODUCT	08.18.98	15848

This sample was received in our laboratory on 08.19.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103022

SAMPLE ID: EX1-SS1
LAB NO: 15848
SAMPLE TYPE: PRODUCT
DATE SAMPLED: 8/18/98
TIME SAMPLED: 14:30

METHOD: PESTICIDES
REFERENCE: EPA 8080

DATE ANALYZED: 8/19/98
UNITS: MG/KG

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	2,500	ND
B-BHC	319-85-7	2,500	ND
LINDANE	58-89-9	2,500	ND
HEPTACHLOR	76-44-8	2,500	ND
D-BHC	319-86-8	2,500	ND
ALDRIN	309-00-2	2,500	ND
HEPTACHLOR EPOXIDE	1024-57-3	2,500	ND
ENDOSULFAN I	959-98-8	12,500	ND
4,4'-DDE	72-55-9	2,500	ND
DIELDRIN	60-57-1	2,500	ND
ENDRIN	72-20-8	2,500	21,800
4,4'-DDD	72-54-8	12,500	ND
ENDOSULFAN II	33212-65-9	12,500	ND
4,4'-DDT	50-29-3	12,500	67,000
ENDRIN ALDEHYDE	7421-93-4	12,500	ND
ENDOSULFAN SULFATE	1031-07-8	25,000	ND
METHOXYCHLOR	72-43-5	25,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: BMC
DATE: 8/19/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103022

SAMPLE ID: EX1-SS1
LAB NO: 15848
SAMPLE TYPE: PRODUCT
DATE SAMPLED: 8/18/98
TIME SAMPLED: 14:30

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/19/98
UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
DICHLORODIFLUOROMETHANE	75-71-8	5.00	ND
CHLOROMETHANE	74-87-3	5.00	ND
VINYL CHLORIDE	75-01-4	5.00	ND
BROMOMETHANE	74-83-9	5.00	ND
CHLOROETHANE	75-00-3	5.00	ND
TRICHLOROFLUOROMETHANE	75-69-4	5.00	ND
1,1-DICHLOROETHENE	75-35-4	5.00	ND
METHYLENE CHLORIDE	75-09-2	12.0	ND
TRANS-1,2-DICHLOROETHENE	156-60-5	5.00	ND
1,1-DICHLOROETHANE	75-34-3	5.00	ND
CIS-1,2-DICHLOROETHENE	156-59-2	5.00	ND
2,2-DICHLOROPROPANE	594-20-7	5.00	ND
BROMOCHLOROMETHANE	74-97-5	5.00	ND
CHLOROFORM	67-66-3	5.00	ND
1,1,1-TRICHLOROETHANE	71-55-6	5.00	ND
CARBON TETRACHLORIDE	56-23-5	5.00	ND
1,1-DICHLOROPROPENE	563-58-6	5.00	ND
BENZENE	71-43-2	5.00	ND
1,2-DICHLOROETHANE	107-06-2	5.00	ND
TRICHLOROETHENE	79-01-6	5.00	ND
1,2-DICHLOROPROPANE	78-87-5	5.00	ND
DIBROMOMETHANE	74-95-3	5.00	ND
BROMODICHLOROMETHANE	75-27-4	5.00	ND
TRANS-1,3-DICHLOROPROPENE	10061-02-6	5.00	ND
4-METHYL-2-PENTANONE	108-10-1	5.00	ND
TOLUENE	108-88-3	5.00	ND
CIS-1,3-DICHLOROPROPENE	10061-01-5	5.00	ND
1,1,2-TRICHLOROETHANE	79-00-5	5.00	ND
TETRACHLOROETHENE	127-18-4	5.00	ND
1,3-DICHLOROPROPANE	142-28-9	5.00	ND
DIBROMOCHLOROMETHANE	124-48-1	5.00	ND
1,2-DIBROMOETHANE	106-93-4	5.00	ND
CHLOROBENZENE	108-90-7	5.00	ND
1,1,1,2-TETRACHLOROETHANE	630-20-6	5.00	ND
ETHYLBENZENE	100-41-4	5.00	ND
XYLENE (M+P)	1330-20-7	5.00	ND
XYLENE (O)	1330-20-7	5.00	ND
STYRENE	100-42-5	5.00	ND
BROMOFORM	75-25-2	5.00	ND

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103022

SAMPLE ID: EX1-SS1
LAB NO: 15848
SAMPLE TYPE: PRODUCT
DATE SAMPLED: 8/18/98
TIME SAMPLED: 14:30

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/19/98
UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
ISOPROPYLBENZENE	98-82-8	5.00	ND
1,1,2,2-TETRACHLOROETHANE	79-34-5	5.00	ND
BROMOBENZENE	108-86-1	5.00	ND
1,2,3-TRICHLOROPROPANE	96-18-4	5.00	ND
N-PROPYLBENZENE	103-65-1	5.00	ND
2-CHLOROTOLUENE	95-49-8	5.00	ND
1,3,5-TRIMETHYLBENZENE	108-67-8	5.00	ND
4-CHLOROTOLUENE	106-43-4	5.00	ND
TERT-BUTYLBENZENE	98-06-6	5.00	ND
1,2,4-TRIMETHYLBENZENE	95-63-6	5.00	ND
SEC-BUTYLBENZENE	135-98-8	5.00	ND
1,3-DICHLOROBENZENE	541-73-1	5.00	ND
4-ISOPROPYLTOLUENE	99-87-6	5.00	ND
1,4-DICHLOROBENZENE	106-46-7	5.00	ND
N-BUTYLBENZENE	104-51-8	5.00	ND
1,2-DICHLOROBENZENE	95-50-1	5.00	ND
1,2-DIBROMO-3-CHLOROPROPANE	96-12-8	5.00	ND
1,2,4-TRICHLOROBENZENE	120-82-1	5.00	7.63
HEXACHLOROBUTADIENE	87-68-3	5.00	ND
NAPHTHALENE	91-20-3	5.00	ND
1,2,3-TRICHLOROBENZENE	87-61-6	5.00	ND

SURROGATE RECOVERY	%
DIBROMOFLUOROMETHANE	86
TOLUENE-D8	93
4-BROMOFLUOROBENZENE	86

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

APPROVED BY: RMK
DATE: 8/19/98

PES ENVIRONMENTAL, Inc.
Engineering & Environmental Services

CHAIN OF CUSTODY RECORD

KPI PROJ# 9418

1682 NOVATO BOULEVARD, SUITE 100
NOVATO, CALIFORNIA 94947
(415) 899-1600 FAX (415) 899-1601

SAMPLERS: DJS

JOB NUMBER: 486 0103 022

NAME / LOCATION: LRTC

PROJECT MANAGER: Will MAST

RECORDER: [signature]

DATE YR	MO	DY	TIME	SAMPLE NUMBER / DESIGNATION	SOURCE CODE	MATRIX: Solid	Water	Sedim't	Soil	Oil	# CONTAINERS & PRESERV.: Unpres.	H_2SO_4	HNO_3	HCl	Filtered	DEPTH IN FEET	COL MTD CD	QA CODE	ANALYSIS REQUESTED: EPA 601 / 8010	EPA 602 / 8020 (BTEX)	EPA 624 / 8240	EPA 625 / 8270	TPHg by 5030 / 8015 (mod)	TPHd by 3550 / 8015 (mod)	8080 (PESTICIDES)	8260	KPI SAMP #
48	08	18	1430	EX1-SS1	49	X					1						10								X	X	15848

NOTE
CAUTION, MAY CONTAIN PESTICIDES
8-12 HOUR TAT

CHAIN OF CUSTODY RECORD

RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
[signature]	Errol (VTC)	8/18	5:20
Errol (VTC)	[signature] NEILS WORDEN	3/18	613

DISPATCHED BY: (Signature)	DATE	TIME	RECEIVED FOR LAB BY: (Signature)	DATE	TIME

METHOD OF SHIPMENT:

RECEIVED DEC 0 2 1998

K PRIME, Inc.
CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 08.31.98

TO: Mr. BILL FRIZELL
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct: 9418
Project: 486.0103.015

FROM: Richard A. Kagel, Ph.D.
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.015" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
EPA-1	SOLID	08.25.98	15938
CS-1	SOLID	08.26.98	15939
CS-2	SOLID	08.26.98	15940
UST-1	LIQUID/SOLID	08.26.98	15941

These samples were received in our laboratory on 08.26.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

METHOD: PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: CS-1
LAB NO: 15939
SAMPLE TYPE: SOLID
DATE SAMPLED: 8/26/98
TIME SAMPLED: 9:30

DATE EXTRACTED: 8/27/98
DATE ANALYZED: 8/31/98

UNITS: mg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	10	ND
B-BHC	319-85-7	10	ND
LINDANE	58-89-9	10	ND
HEPTACHLOR	76-44-8	10	ND
D-BHC	319-86-8	10	ND
ALDRIN	309-00-2	10	28.7
HEPTACHLOR EPOXIDE	1024-57-3	10	ND
ENDOSULFAN I	959-98-8	10	ND
4,4'-DDE	72-55-9	20	105
DIELDRIN	60-57-1	20	21.9
ENDRIN	72-20-8	20	ND
4,4'-DDD	72-54-8	20	ND
ENDOSULFAN II	33212-65-9	20	ND
4,4'-DDT	50-29-3	20	ND
ENDRIN ALDEHYDE	7421-93-4	20	ND
ENDOSULFAN SULFATE	1031-07-8	20	ND
METHOXYCHLOR	72-43-5	100	ND
CHLORDANE	57-74-9	100	ND
TOXPHENE	8001-35-2	200	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: AMK
DATE: 8/31/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

METHOD: PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: CS-2
LAB NO: 15940
SAMPLE TYPE: SOLID
DATE SAMPLED: 8/26/98
TIME SAMPLED: 10:00

DATE EXTRACTED: 8/27/98
DATE ANALYZED: 8/27/98

UNITS: ug/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	50.0	ND
B-BHC	319-85-7	50.0	ND
LINDANE	58-89-9	50.0	ND
HEPTACHLOR	76-44-8	50.0	ND
D-BHC	319-86-8	50.0	ND
ALDRIN	309-00-2	50.0	ND
HEPTACHLOR EPOXIDE	1024-57-3	50.0	ND
ENDOSULFAN I	959-98-8	50.0	ND
4,4'-DDE	72-55-9	100	315
DIELDRIN	60-57-1	100	ND
ENDRIN	72-20-8	100	740
4,4'-DDD	72-54-8	100	ND
ENDOSULFAN II	33212-65-9	100	ND
4,4'-DDT	50-29-3	100	1,580
ENDRIN ALDEHYDE	7421-93-4	100	ND
ENDOSULFAN SULFATE	1031-07-8	100	ND
METHOXYCHLOR	72-43-5	500	ND
CHLORDANE	57-74-9	500	ND
TOXPHENE	8001-35-2	1,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: [illegible]
DATE: 8/31/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

SAMPLE ID: UST-1
LAB NO: 15941
SAMPLE TYPE: WATER
DATE SAMPLED: 8/26/98
TIME SAMPLED: 15:45

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/27/98
UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
DICHLORODIFLUOROMETHANE	75-71-8	200	ND
CHLOROMETHANE	74-87-3	200	ND
VINYL CHLORIDE	75-01-4	200	ND
BROMOMETHANE	74-83-9	200	ND
CHLOROETHANE	75-00-3	200	ND
TRICHLOROFLUOROMETHANE	75-69-4	200	ND
1,1-DICHLOROETHENE	75-35-4	200	ND
METHYLENE CHLORIDE	75-09-2	2000	ND
TRANS-1,2-DICHLOROETHENE	156-60-5	200	ND
1,1-DICHLOROETHANE	75-34-3	200	ND
CIS-1,2-DICHLOROETHENE	156-59-2	200	ND
2,2-DICHLOROPROPANE	594-20-7	200	ND
BROMOCHLOROMETHANE	74-97-5	200	ND
CHLOROFORM	67-66-3	200	ND
1,1,1-TRICHLOROETHANE	71-55-6	200	ND
CARBON TETRACHLORIDE	56-23-5	200	ND
1,1-DICHLOROPROPENE	563-58-6	200	ND
BENZENE	71-43-2	200	7,080
1,2-DICHLOROETHANE	107-06-2	200	ND
TRICHLOROETHENE	79-01-6	200	ND
1,2-DICHLOROPROPANE	78-87-5	200	ND
DIBROMOMETHANE	74-95-3	200	ND
BROMODICHLOROMETHANE	75-27-4	200	ND
TRANS-1,3-DICHLOROPROPENE	10061-02-6	200	ND
4-METHYL-2-PENTANONE	108-10-1	200	ND
TOLUENE	108-88-3	200	17,600
CIS-1,3-DICHLOROPROPENE	10061-01-5	200	ND
1,1,2-TRICHLOROETHANE	79-00-5	200	ND
TETRACHLOROETHENE	127-18-4	200	ND
1,3-DICHLOROPROPANE	142-28-9	200	ND
DIBROMOCHLOROMETHANE	124-48-1	200	ND
1,2-DIBROMOETHANE	106-93-4	200	ND
CHLOROBENZENE	108-90-7	200	ND
1,1,1,2-TETRACHLOROETHANE	630-20-6	200	ND
ETHYLBENZENE	100-41-4	200	432
XYLENE (M+P)	1330-20-7	200	12,400
XYLENE (O)	1330-20-7	200	5,480
STYRENE	100-42-5	200	ND
BROMOFORM	75-25-2	200	ND

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

SAMPLE ID: UST-1
LAB NO: 15941
SAMPLE TYPE: WATER
DATE SAMPLED: 8/26/98
TIME SAMPLED: 15:45

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/27/98
UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
ISOPROPYLBENZENE	98-82-8	200	ND
1,1,2,2-TETRACHLOROETHANE	79-34-5	200	ND
BROMOBENZENE	108-86-1	200	ND
1,2,3-TRICHLOROPROPANE	96-18-4	200	ND
N-PROPYLBENZENE	103-65-1	200	ND
2-CHLOROTOLUENE	95-49-8	200	ND
1;3,5-TRIMETHYLBENZENE	108-67-8	200	1,240
4-CHLOROTOLUENE	106-43-4	200	ND
TERT-BUTYLBENZENE	98-06-6	200	ND
1,2,4-TRIMETHYLBENZENE	95-63-6	200	4,720
SEC-BUTYLBENZENE	135-98-8	200	ND
1,3-DICHLOROBENZENE	541-73-1	200	ND
4-ISOPROPYLTOLUENE	99-87-6	200	ND
1,4-DICHLOROBENZENE	106-46-7	200	ND
N-BUTYLBENZENE	104-51-8	200	260
1,2-DICHLOROBENZENE	95-50-1	200	ND
1,2-DIBROMO-3-CHLOROPROPANE	96-12-8	200	ND
1,2,4-TRICHLOROBENZENE	120-82-1	200	ND
HEXACHLOROBUTADIENE	87-68-3	200	ND
NAPHTHALENE	91-20-3	200	1,480
1,2,3-TRICHLOROBENZENE	87-61-6	200	ND

SURROGATE RECOVERY	%
DIBROMOFLUOROMETHANE	98
TOLUENE-D8	99
4-BROMOFLUOROBENZENE	97

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

APPROVED BY: RMC
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

METHOD: PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: UST-1
LAB NO: 15941
SAMPLE TYPE: WATER
DATE SAMPLED: 8/26/98
TIME SAMPLED: 15:45

DATE EXTRACTED: 8/27/98
DATE ANALYZED: 8/27/98

UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	50.0	ND
B-BHC	319-85-7	50.0	ND
LINDANE	58-89-9	50.0	ND
HEPTACHLOR	76-44-8	50.0	ND
D-BHC	319-86-8	50.0	868
ALDRIN	309-00-2	50.0	236
HEPTACHLOR EPOXIDE	1024-57-3	50.0	ND
ENDOSULFAN I	959-98-8	50.0	ND
4,4'-DDE	72-55-9	100	384
DIELDRIN	60-57-1	100	280
ENDRIN	72-20-8	100	1,570
4,4'-DDD	72-54-8	100	ND
ENDOSULFAN II	33212-65-9	100	ND
4,4'-DDT	50-29-3	100	1,630
ENDRIN ALDEHYDE	7421-93-4	100	ND
ENDOSULFAN SULFATE	1031-07-8	100	ND
METHOXYCHLOR	72-43-5	500	ND
CHLORDANE	57-74-9	500	ND
TOXPHENE	8001-35-2	1,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: [illegible]
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

METHOD: PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: UST-1
LAB NO: 15941
SAMPLE TYPE: HYDROCARBON*
DATE SAMPLED: 8/26/98
TIME SAMPLED: 15:45

DATE EXTRACTED: 8/27/98
DATE ANALYZED: 8/27/98

UNITS: mg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	20.0	ND
B-BHC	319-85-7	20.0	ND
LINDANE	58-89-9	20.0	ND
HEPTACHLOR	76-44-8	20.0	ND
D-BHC	319-86-8	20.0	467
ALDRIN	309-00-2	20.0	149
HEPTACHLOR EPOXIDE	1024-57-3	20.0	ND
ENDOSULFAN I	959-98-8	20.0	ND
4,4'-DDE	72-55-9	40.0	226
DIELDRIN	60-57-1	40.0	184
ENDRIN	72-20-8	40.0	761
4,4'-DDD	72-54-8	40.0	ND
ENDOSULFAN II	33212-65-9	40.0	ND
4,4'-DDT	50-29-3	40.0	751
ENDRIN ALDEHYDE	7421-93-4	40.0	ND
ENDOSULFAN SULFATE	1031-07-8	40.0	ND
METHOXYCHLOR	72-43-5	200	ND
CHLORDANE	57-74-9	200	ND
TOXPHENE	8001-35-2	400	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE
* - SAMPLE CONSISTED OF THE FLOATING PRODUCT FROM A WATER SAMPLE

APPROVED BY: RMC
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

SAMPLE ID: UST-1
LAB NO: 15941
SAMPLE TYPE: HYDROCARBON*
DATE SAMPLED: 8/26/98
TIME SAMPLED: 15:45

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/27/98
UNITS: mg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
DICHLORODIFLUOROMETHANE	75-71-8	400	ND
CHLOROMETHANE	74-87-3	400	ND
VINYL CHLORIDE	75-01-4	400	ND
BROMOMETHANE	74-83-9	400	ND
CHLOROETHANE	75-00-3	400	ND
TRICHLOROFLUOROMETHANE	75-69-4	400	ND
1,1-DICHLOROETHENE	75-35-4	400	ND
METHYLENE CHLORIDE	75-09-2	4000	ND
TRANS-1,2-DICHLOROETHENE	156-60-5	400	ND
1,1-DICHLOROETHANE	75-34-3	400	ND
CIS-1,2-DICHLOROETHENE	156-59-2	400	ND
2,2-DICHLOROPROPANE	594-20-7	400	ND
BROMOCHLOROMETHANE	74-97-5	400	ND
CHLOROFORM	67-66-3	400	ND
1,1,1-TRICHLOROETHANE	71-55-6	400	ND
CARBON TETRACHLORIDE	56-23-5	400	ND
1,1-DICHLOROPROPENE	563-58-6	400	ND
BENZENE	71-43-2	400	1,496
1,2-DICHLOROETHANE	107-06-2	400	ND
TRICHLOROETHENE	79-01-6	400	ND
1,2-DICHLOROPROPANE	78-87-5	400	ND
DIBROMOMETHANE	74-95-3	400	ND
BROMODICHLOROMETHANE	75-27-4	400	ND
TRANS-1,3-DICHLOROPROPENE	10061-02-6	400	ND
4-METHYL-2-PENTANONE	108-10-1	400	ND
TOLUENE	108-88-3	400	14,000
CIS-1,3-DICHLOROPROPENE	10061-01-5	400	ND
1,1,2-TRICHLOROETHANE	79-00-5	400	ND
TETRACHLOROETHENE	127-18-4	400	ND
1,3-DICHLOROPROPANE	142-28-9	400	ND
DIBROMOCHLOROMETHANE	124-48-1	400	ND
1,2-DIBROMOETHANE	106-93-4	400	ND
CHLOROBENZENE	108-90-7	400	ND
1,1,1,2-TETRACHLOROETHANE	630-20-6	400	ND
ETHYLBENZENE	100-41-4	400	1,120
XYLENE (M+P)	1330-20-7	400	30,400
XYLENE (O)	1330-20-7	400	12,000
STYRENE	100-42-5	400	ND
BROMOFORM	75-25-2	400	ND

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

SAMPLE ID: UST-1
LAB NO: 15941
SAMPLE TYPE: HYDROCARBON*
DATE SAMPLED: 8/26/98
TIME SAMPLED: 15:45

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 8/27/98
UNITS: mg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
ISOPROPYLBENZENE	98-82-8	400	ND
1,1,2,2-TETRACHLOROETHANE	79-34-5	400	ND
BROMOBENZENE	108-86-1	400	ND
1,2,3-TRICHLOROPROPANE	96-18-4	400	ND
N-PROPYLBENZENE	103-65-1	400	ND
2-CHLOROTOLUENE	95-49-8	400	ND
1,3,5-TRIMETHYLBENZENE	108-67-8	400	6,000
4-CHLOROTOLUENE	106-43-4	400	ND
TERT-BUTYLBENZENE	98-06-6	400	ND
1,2,4-TRIMETHYLBENZENE	95-63-6	400	21,600
SEC-BUTYLBENZENE	135-98-8	400	ND
1,3-DICHLOROBENZENE	541-73-1	400	ND
4-ISOPROPYLTOLUENE	99-87-6	400	720
1,4-DICHLOROBENZENE	106-46-7	400	ND
N-BUTYLBENZENE	104-51-8	400	1,840
1,2-DICHLOROBENZENE	95-50-1	400	ND
1,2-DIBROMO-3-CHLOROPROPANE	96-12-8	400	ND
1,2,4-TRICHLOROBENZENE	120-82-1	400	ND
HEXACHLOROBUTADIENE	87-68-3	400	ND
NAPHTHALENE	91-20-3	400	4,160
1,2,3-TRICHLOROBENZENE	87-61-6	400	ND

SURROGATE RECOVERY	%
DIBROMOFLUOROMETHANE	91
TOLUENE-D8	97
4-BROMOFLUOROBENZENE	95

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE
* - SAMPLE CONSISTED OF THE FLOATING PRODUCT FROM A WATER SAMPLE

APPROVED BY: RAM
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

SAMPLE ID: UST-1
LAB NO: 15941
SAMPLE TYPE: WATER
DATE SAMPLED: 8/26/98
TIME SAMPLED: 15:45

METHOD: TPH-G/D
REFERENCE: EPA MOD 8015

DATE ANALYZED: 8/27/98
UNITS: mg/L

COMPOUND NAME	REPORTING LIMIT	SAMPLE CONC
TPH-G	4.00	178
TPH-D*	25.0	680

NOTES:
ND - NOT DETECTED AT STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

* - DIESEL RANGE EXTRACTABLES GC/FID PATTERN

DIESEL FUEL	
DEGRADED DIESEL FUEL	
PETROLEUM - HEAVIER THAN DIESEL	
PETROLEUM - LIGHTER THAN DIESEL	YES
UNKNOWN EXTRACTABLES PATTERN	

APPROVED BY: RAM
DATE: 8/27/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

SAMPLE ID:	UST-1
LAB NO:	15941
SAMPLE TYPE:	HYDROCARBON*
DATE SAMPLED:	8/26/98
TIME SAMPLED:	15:45

METHOD: TPH-G/D
REFERENCE: EPA MOD 8015

DATE ANALYZED:	8/27/98
UNITS:	mg/L

COMPOUND NAME	REPORTING LIMIT	SAMPLE CONC
TPH-G	10,000	512,000
TPH-D*	2,000	303,000

NOTES:
ND - NOT DETECTED AT STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE
† - SAMPLE CONSISTED OF THE FLOATING PRODUCT FROM A WATER SAMPLE

* - DIESEL RANGE EXTRACTABLES GC/FID PATTERN

DIESEL FUEL	
DEGRADED DIESEL FUEL	
PETROLEUM - HEAVIER THAN DIESEL	
PETROLEUM - LIGHTER THAN DIESEL	YES
UNKNOWN EXTRACTABLES PATTERN	

APPROVED BY: RMC
DATE: 8/27/98

K PRIME, INC.

CHAIN OF CUSTODY RECORD

CONSULTING ANALYTICAL CHEMISTS 3621 Westwind Blvd., Santa Rosa, CA 95403 PHONE: (707) 527-7574 FAX: (707) 527-7879

Client/Project ID	Address/Phone	KPI Project No.
[illegible]	[illegible]	9418
Project Location	Client Project No.	
[illegible]		
Contact	Sampler (Signature)	
[illegible]	DJS	

ANALYSES

Sample Identification No.	Date	Time	Lab Sample No.	Type of Sample	No. of Containers	[illegible]	8260	TPH Gasoline	TPH Diesel				Expected Turnaround Time	Remarks
[illegible]	[illegible]	[illegible]	15938	[illegible]	[illegible]	[illegible]	Hold per Don Seymour 8/26						8 HR	[illegible]
														[illegible]
														[illegible]
[illegible]	[illegible]	[illegible]	15939	[illegible]	[illegible]	[illegible]							48 HR	[illegible]
[illegible]	[illegible]	[illegible]	15940	[illegible]	[illegible]	[illegible]							[illegible]	[illegible]
[illegible]	8-26-98	15:45	15941	LIQUID	4	X	X	X	X				8 HR	

Relinquished by: (Signature)	Received by: (Signature)	Date	Time
DJS	[illegible]	8/26/98	16:05
[illegible]	[illegible]	8/26/98	1750

Disposal Method

Disposed by: (Signature)	Date	Time

White Copy : Accompanies Samples
Yellow Copy : Sampler

K PRIME, INC.

CHANGE ORDER

CONSULTING ANALYTICAL CHEMISTS 3621 Westwind Blvd. Santa Rosa CA 95403 PHONE: 707.527.7574 FAX: 707.527.7879

Client/Project ID	Address/Phone: 1682 Novato Blvd. Novato CA 94947 415.899.1600/1601	ANALYSES	KPI Project No.: 9418-15941
Project Location: RICHMOND LEVIN	Client Project No. 486.0103.015		
Contact: DOUG SEYMOUR	Sampler (Signature)		

Sample Identification	Lab Sample No.	Date	Time	Type of Sample	No. of Containers	8080 Pesticides	8260	TPH-G	TPH-D	HOLD							Turn-around	Remarks
EPA-1	15938	25-Aug-98	15:00	SOLID	1					√							NA	DO NOT ANALYZE
SS-6	15939	26-Aug-98	9:30	SOLID	1	√											48 Hr	No Change
SS-7	15940	27-Aug-98	10:00	SOLID	1	√											48 Hr	No Change
SS-8	15941	28-Aug-98	15:45	LIQUID	4	√	√	√	√								8 Hr	No Change
END OF LIST																		

	Date	Time	
DOUG SEYMOUR	26-Aug-98	17:50	Approved by: (Signature) Ginger Brinlee
Authorized by: (Signature)	Date	Time	Approved by: (Signature)
Authorized by: (Signature)	Date	Time	Approved by: (Signature)

Comments: No Analysis for sample EPA-1 (15938) NOTE: Sample UST-1 (15941) has two discrete phases.

Date Time

RECEIVED SEP 2 2 1998

K PRIME, Inc.

CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 09.18.98

TO: Mr. BILL FRIZELL
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Acct: 9418
Project: 486.0103.022

Phone: 415.899.1600
FAX: 415.899.1601

FROM: Richard A. Kagel, Ph.D. RAK 9/18/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.022" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
UST-E	SOIL	09.02.98	16259
UST-W	SOIL	09.02.98	16260

These samples were received in our laboratory on 09.11.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

METHOD: PESTICIDES AND PCB'S
REFERENCE: EPA 8080

SAMPLE ID: UST-E/UST-W
LAB NO: 16259-16260
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/2/98
TIME SAMPLED: 9:00-9:10

DATE EXTRACTED: 9/15/98
DATE ANALYZED: 9/15/98

UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	5.00	ND
B-BHC	319-85-7	5.00	ND
LINDANE	58-89-9	5.00	ND
HEPTACHLOR	76-44-8	5.00	ND
D-BHC	319-86-8	5.00	ND
ALDRIN	309-00-2	5.00	ND
HEPTACHLOR EPOXIDE	1024-57-3	5.00	ND
ENDOSULFAN I	959-98-8	5.00	ND
4,4'-DDE	72-55-9	10.0	ND
DIELDRIN	60-57-1	10.0	ND
ENDRIN	72-20-8	10.0	ND
4,4'-DDD	72-54-8	10.0	ND
ENDOSULFAN II	33212-65-9	10.0	ND
4,4'-DDT	50-29-3	10.0	ND
ENDRIN ALDEHYDE	7421-93-4	10.0	ND
ENDOSULFAN SULFATE	1031-07-8	10.0	ND
METHOXYCHLOR	72-43-5	50.0	ND
CHLORDANE	57-74-9	50.0	ND
TOXPHENE	8001-35-2	100	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: BAK
DATE: 9/18/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103022

SAMPLE ID: UST-E/UST-W
LAB NO: 16259-16260
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/2/98
TIME SAMPLED: 9:00-9:10

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 9/15/98
UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
DICHLORODIFLUOROMETHANE	75-71-8	5.00	ND
CHLOROMETHANE	74-87-3	5.00	ND
VINYL CHLORIDE	75-01-4	5.00	ND
BROMOMETHANE	74-83-9	5.00	ND
CHLOROETHANE	75-00-3	5.00	ND
TRICHLOROFLUOROMETHANE	75-69-4	5.00	ND
1,1-DICHLOROETHENE	75-35-4	5.00	ND
METHYLENE CHLORIDE	75-09-2	16.0	ND
TRANS-1,2-DICHLOROETHENE	156-60-5	5.00	ND
1,1-DICHLOROETHANE	75-34-3	5.00	ND
CIS-1,2-DICHLOROETHENE	156-59-2	5.00	15.5
2,2-DICHLOROPROPANE	594-20-7	5.00	ND
BROMOCHLOROMETHANE	74-97-5	5.00	ND
CHLOROFORM	67-66-3	5.00	ND
1,1,1-TRICHLOROETHANE	71-55-6	5.00	ND
CARBON TETRACHLORIDE	56-23-5	5.00	ND
1,1-DICHLOROPROPENE	563-58-6	5.00	ND
BENZENE	71-43-2	5.00	337
1,2-DICHLOROETHANE	107-06-2	5.00	ND
TRICHLOROETHENE	79-01-6	5.00	ND
1,2-DICHLOROPROPANE	78-87-5	5.00	ND
DIBROMOMETHANE	74-95-3	5.00	ND
BROMODICHLOROMETHANE	75-27-4	5.00	ND
TRANS-1,3-DICHLOROPROPENE	10061-02-6	5.00	ND
TOLUENE	108-88-3	5.00	23.4
CIS-1,3-DICHLOROPROPENE	10061-01-5	5.00	ND
1,1,2-TRICHLOROETHANE	79-00-5	5.00	44.1
TETRACHLOROETHENE	127-18-4	5.00	ND
1,3-DICHLOROPROPANE	142-28-9	5.00	ND
DIBROMOCHLOROMETHANE	124-48-1	5.00	ND
1,2-DIBROMOETHANE	106-93-4	5.00	ND
CHLOROBENZENE	108-90-7	5.00	6.75
1,1,1,2-TETRACHLOROETHANE	630-20-6	5.00	ND
ETHYLBENZENE	100-41-4	5.00	111
XYLENE (M+P)	1330-20-7	5.00	47.0
XYLENE (O)	1330-20-7	5.00	11.8
STYRENE	100-42-5	5.00	ND
BROMOFORM	75-25-2	5.00	ND
ISOPROPYLBENZENE	98-82-8	5.00	15.5

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103022

SAMPLE ID: UST-E/UST-W
LAB NO: 16259-16260
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/2/98
TIME SAMPLED: 9:00-9:10

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 9/15/98
UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
1,1,2,2-TETRACHLOROETHANE	79-34-5	5.00	ND
BROMOBENZENE	108-86-1	5.00	ND
1,2,3-TRICHLOROPROPANE	96-18-4	5.00	ND
N-PROPYLBENZENE	103-65-1	5.00	16.6
2-CHLOROTOLUENE	95-49-8	5.00	ND
1,3,5-TRIMETHYLBENZENE	108-67-8	5.00	ND
4-CHLOROTOLUENE	106-43-4	5.00	ND
TERT-BUTYLBENZENE	98-06-6	5.00	ND
1,2,4-TRIMETHYLBENZENE	95-63-6	5.00	61.9
SEC-BUTYLBENZENE	135-98-8	5.00	ND
1,3-DICHLOROBENZENE	541-73-1	5.00	ND
4-ISOPROPYLTOLUENE	99-87-6	5.00	6.88
1,4-DICHLOROBENZENE	106-46-7	5.00	ND
N-BUTYLBENZENE	104-51-8	5.00	ND
1,2-DICHLOROBENZENE	95-50-1	5.00	ND
1,2-DIBROMO-3-CHLOROPROPANE	96-12-8	5.00	ND
1,2,4-TRICHLOROBENZENE	120-82-1	5.00	ND
HEXACHLOROBUTADIENE	87-68-3	5.00	ND
NAPHTHALENE	91-20-3	5.00	ND
1,2,3-TRICHLOROBENZENE	87-61-6	5.00	ND

SURROGATE RECOVERY	%
DIBROMOFLUOROMETHANE	92
TOLUENE-D8	88
4-BROMOFLUOROBENZENE	93

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

APPROVED BY: BAK
DATE: 9/18/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 022

SAMPLE ID:	UST-E/UST-W
LAB NO:	16259-16260
SAMPLE TYPE:	SOIL
DATE SAMPLED:	9/2/98
TIME SAMPLED:	9:00-9:10

METHOD: TPH-G/D
REFERENCE: EPA MOD 8015

DATE ANALYZED:	9/15/98
UNITS:	mg/Kg

COMPOUND NAME	REPORTING LIMIT	SAMPLE CONC
TPH-G	1.00	6.91
TPH-D*	10.0	ND

NOTES:
ND - NOT DETECTED AT STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

* - DIESEL RANGE EXTRACTABLES GC/FID PATTERN

DIESEL FUEL	
DEGRADED DIESEL FUEL	
PETROLEUM - HEAVIER THAN DIESEL	
PETROLEUM - LIGHTER THAN DIESEL	
UNKNOWN EXTRACTABLES PATTERN	

APPROVED BY: RAC
DATE: 9/18/98

PES ENVIRONMENTAL, Inc.
Engineering & Environmental Services

CHAIN OF CUSTODY RECORD

KPI PROJ # 9418

1682 NOVATO BOULEVARD, SUITE 100
NOVATO, CALIFORNIA 94947
(415) 899-1600 FAX (415) 899-1601

JOB NUMBER: 4860103 822

NAME / LOCATION: PES/LRTC

PROJECT MANAGER: BILL FRIZZEL

SAMPLERS: DJS

RECORDER: [signature]

DATE YR	DATE MO	DATE DY	DATE TIME	SAMPLE NUMBER / DESIGNATION	SOURCE CODE	MATRIX Water	MATRIX Sedim't	MATRIX Soil	MATRIX Oil	# CONTAINERS & PRESERV. Unpres.	H_2SO_4	HNO_3	HCl	Filtered	KPI SMP#	DEPTH IN FEET	COL MTD CD	QA CODE	EPA 601 / 8010	EPA 602 / 8020 (BTEX)	EPA 624 / 8240	EPA 625 / 8270	TPHg by 5030 / 8015 (mod)	TPHd by 3550 / 8015 (mod)	8080 (PESTICIDES)	
98	09	02	0900	UST-E	49			X		1					16259	~9					X		X	X	X	COMPOSITE INTO ONE SAMPLE
98	09	02	0910	UST-W	49			X		1					16260	~9					X		X	X	X	

NOTE
ANALYZE BY TUESDAY 9/15/98

CHAIN OF CUSTODY RECORD

RELINQUISHED BY: (Signature)	RECEIVED BY: (Signature)	DATE	TIME
[signature]	Emal (VTC)	9/11/98	100
Emal (VTC)	[signature]	9.11.98	3:50

DISPATCHED BY: (Signature)	DATE	TIME	RECEIVED FOR LAB BY: (Signature)	DATE	TIME

METHOD OF SHIPMENT:

K PRIME, Inc.

CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 09.04.98

TO: Mr. DON SEYMOUR
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct: 9418
Project: 486.0103.015

FROM: Richard A. Kagel, Ph.D.
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.015" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
STP-1A	SOIL	09.03.98	16094
STP-1B	SOIL	09.03.98	16095
STP-1C	SOIL	09.03.98	16096
STP-1D	SOIL	09.03.98	16097
STP-2A	SOIL	09.03.98	16098
STP-2B	SOIL	09.03.98	16099

These samples were received in our laboratory on 09.03.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

METHOD: PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: STP-1A/B COMP.
LAB NO: 16094/95
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:00

DATE EXTRACTED: 9/4/98
DATE ANALYZED: 9/4/98

UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A BHC	319-84-6	500	ND
B-BHC	319-85-7	500	ND
LINDANE	58-89-9	500	ND
HEPTACHLOR	76-44-8	500	ND
D-BHC	319-86-8	500	ND
ALDRIN	309-00-2	500	ND
HEPTACHLOR EPOXIDE	1024-57-3	500	ND
ENDOSULFAN I	959-98-8	500	ND
4,4'-DDE	72-55-9	1,000	1,310
DIELDRIN	60-57-1	1,000	4,820
ENDRIN	72-20-8	1,000	13,800
4,4'-DDD	72-54-8	1,000	5,220
ENDOSULFAN II	33212-65-9	1,000	ND
4,4'-DDT	50-29-3	1,000	6,560
ENDRIN ALDEHYDE	7421-93-4	1,000	ND
ENDOSULFAN SULFATE	1031-07-8	1,000	ND
METHOXYCHLOR	72-43-5	5,000	ND
CHLORDANE	57-74-9	5,000	ND
TOXPHENE	8001-35-2	10,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: RMK
DATE: 9/4/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

METHOD: PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: STP-1C/D COMP.
LAB NO: 16096/97
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:10

DATE EXTRACTED: 9/4/98
DATE ANALYZED: 9/4/98

UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	50.0	ND
B-BHC	319-85-7	50.0	ND
LINDANE	58-89-9	50.0	ND
HEPTACHLOR	76-44-8	50.0	ND
D-BHC	319-86-8	50.0	ND
ALDRIN	309-00-2	50.0	79.1
HEPTACHLOR EPOXIDE	1024-57-3	50.0	ND
ENDOSULFAN I	959-98-8	50.0	ND
4,4'-DDE	72-55-9	100	393
DIELDRIN	60-57-1	100	768
ENDRIN	72-20-8	100	2,000
4,4'-DDD	72-54-8	100	291
ENDOSULFAN II	33212-65-9	100	ND
4,4'-DDT	50-29-3	100	634
ENDRIN ALDEHYDE	7421-93-4	100	ND
ENDOSULFAN SULFATE	1031-07-8	100	ND
METHOXYCHLOR	72-43-5	500	ND
CHLORDANE	57-74-9	500	ND
TOXPHENE	8001-35-2	1,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: BMC
DATE: 9/4/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

METHOD: PESTICIDES
REFERENCE: EPA 8080

SAMPLE ID: STP-2A/B COMP.
LAB NO: 16098/99
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:20

DATE EXTRACTED: 9/4/98
DATE ANALYZED: 9/4/98

UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
A-BHC	319-84-6	50.0	ND
B-BHC	319-85-7	50.0	ND
LINDANE	58-89-9	50.0	ND
HEPTACHLOR	76-44-8	50.0	ND
D-BHC	319-86-8	50.0	ND
ALDRIN	309-00-2	50.0	720
HEPTACHLOR EPOXIDE	1024-57-3	50.0	ND
ENDOSULFAN I	959-98-8	50.0	ND
4,4'-DDE	72-55-9	100	850
DIELDRIN	60-57-1	100	1,190
ENDRIN	72-20-8	100	2,520
4,4'-DDD	72-54-8	100	1,210
ENDOSULFAN II	33212-65-9	100	ND
4,4'-DDT	50-29-3	100	2,790
ENDRIN ALDEHYDE	7421-93-4	100	ND
ENDOSULFAN SULFATE	1031-07-8	100	ND
METHOXYCHLOR	72-43-5	500	ND
CHLORDANE	57-74-9	500	ND
TOXPHENE	8001-35-2	1,000	ND

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: GMK
DATE: 9/4/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

SAMPLE ID: STP-1A/B COMP.
LAB NO: 16094/95
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:00

METHOD: TPH-G/D
REFERENCE: EPA MOD 8015

DATE ANALYZED: 9/4/98
UNITS: mg/Kg

COMPOUND NAME	REPORTING LIMIT	SAMPLE CONC
TPH-G	1.00	7.73
TPH-D*	10.0	35.9

NOTES:
ND - NOT DETECTED AT STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

* - DIESEL RANGE EXTRACTABLES GC/FID PATTERN

DIESEL FUEL	
DEGRADED DIESEL FUEL	
PETROLEUM - HEAVIER THAN DIESEL	
PETROLEUM - LIGHTER THAN DIESEL	
UNKNOWN EXTRACTABLES PATTERN	YES

APPROVED BY: RMK
DATE: 9/4/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

SAMPLE ID: STP-1C/D COMP.
LAB NO: 16096/97
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:10

METHOD: TPH-G/D
REFERENCE: EPA MOD 8015

DATE ANALYZED: 9/4/98
UNITS: mg/Kg

COMPOUND NAME	REPORTING LIMIT	SAMPLE CONC
TPH-G	1.00	115
TPH-D*	10.0	32.6

NOTES:
ND - NOT DETECTED AT STATED REPORTING LIMIT
NA NOT AVAILABLE OR APPLICABLE

* - DIESEL RANGE EXTRACTABLES GC/FID PATTERN

DIESEL FUEL	
DEGRADED DIESEL FUEL	
PETROLEUM - HEAVIER THAN DIESEL	
PETROLEUM - LIGHTER THAN DIESEL	
UNKNOWN EXTRACTABLES PATTERN	YES

APPROVED BY: RAK
DATE: 9/4/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

SAMPLE ID: STP-2A/B COMP.
LAB NO: 16098/99
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:20

METHOD: TPH-G/D
REFERENCE: EPA MOD 8015

DATE ANALYZED: 9/4/98
UNITS: mg/Kg

COMPOUND NAME	REPORTING LIMIT	SAMPLE CONC
TPH-G	1.00	ND
TPH-D*	10.0	41.7

NOTES:
ND - NOT DETECTED AT STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

* - DIESEL RANGE EXTRACTABLES GC/FID PATTERN

DIESEL FUEL	
DEGRADED DIESEL FUEL	
PETROLEUM - HEAVIER THAN DIESEL	
PETROLEUM - LIGHTER THAN DIESEL	
UNKNOWN EXTRACTABLES PATTERN	YES

APPROVED BY: RAK
DATE: 9/4/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: STP-1A/B COMP.
LAB NO: 16094/95
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:00

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 9/4/98
UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
DICHLORODIFLUOROMETHANE	75-71-8	5.00	ND
CHLOROMETHANE	74-87-3	5.00	ND
VINYL CHLORIDE	75-01-4	5.00	ND
BROMOMETHANE	74-83-9	5.00	ND
CHLOROETHANE	75-00-3	5.00	ND
TRICHLOROFLUOROMETHANE	75-69-4	5.00	ND
1,1-DICHLOROETHENE	75-35-4	5.00	ND
METHYLENE CHLORIDE	75-09-2	12.0	ND
TRANS-1,2-DICHLOROETHENE	156-60-5	5.00	ND
1,1-DICHLOROETHANE	75-34-3	5.00	ND
CIS-1,2-DICHLOROETHENE	156-59-2	5.00	ND
2,2-DICHLOROPROPANE	594-20-7	5.00	ND
BROMOCHLOROMETHANE	74-97-5	5.00	ND
CHLOROFORM	67-66-3	5.00	ND
1,1,1-TRICHLOROETHANE	71-55-6	5.00	ND
CARBON TETRACHLORIDE	56-23-5	5.00	ND
1,1-DICHLOROPROPENE	563-58-6	5.00	ND
BENZENE	71-43-2	5.00	ND
1,2-DICHLOROETHANE	107-06-2	5.00	ND
TRICHLOROETHENE	79-01-6	5.00	ND
1,2-DICHLOROPROPANE	78-87-5	5.00	ND
DIBROMOMETHANE	74-95-3	5.00	ND
BROMODICHLOROMETHANE	75-27-4	5.00	ND
TRANS-1,3-DICHLOROPROPENE	10061-02-6	5.00	ND
TOLUENE	108-88-3	5.00	ND
CIS-1,3-DICHLOROPROPENE	10061-01-5	5.00	ND
1,1,2-TRICHLOROETHANE	79-00-5	5.00	ND
TETRACHLOROETHENE	127-18-4	5.00	8.63
1,3-DICHLOROPROPANE	142-28-9	5.00	ND
DIBROMOCHLOROMETHANE	124-48-1	5.00	ND
1,2-DIBROMOETHANE	106-93-4	5.00	ND
CHLOROBENZENE	108-90-7	5.00	ND
1,1,1,2-TETRACHLOROETHANE	630-20-6	5.00	ND
ETHYLBENZENE	100-41-4	5.00	152
XYLENE (M+P)	1330-20-7	5.00	141
XYLENE (O)	1330-20-7	5.00	126
STYRENE	100-42-5	5.00	ND
BROMOFORM	75-25-2	5.00	ND
ISOPROPYLBENZENE	98-82-8	5.00	13.5

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: STP-1A/B COMP.
LAB NO: 16094/95
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:00

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 9/4/98
UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
1,1,2,2-TETRACHLOROETHANE	79-34-5	5.00	ND
BROMOBENZENE	108-86-1	5.00	ND
1,2,3-TRICHLOROPROPANE	96-18-4	5.00	ND
N-PROPYLBENZENE	103-65-1	5.00	16.1
2-CHLOROTOLUENE	95-49-8	5.00	ND
1,3,5-TRIMETHYLBENZENE	108-67-8	5.00	19.3
4-CHLOROTOLUENE	106-43-4	5.00	ND
TERT-BUTYLBENZENE	98-06-6	5.00	ND
1,2,4-TRIMETHYLBENZENE	95-63-6	5.00	86.1
SEC-BUTYLBENZENE	135-98-8	5.00	ND
1,3-DICHLOROBENZENE	541-73-1	5.00	ND
4-ISOPROPYLTOLUENE	99-87-6	5.00	19.6
1,4-DICHLOROBENZENE	106-46-7	5.00	ND
N-BUTYLBENZENE	104-51-8	5.00	12.6
1,2 DICHLOROBENZENE	95-50-1	5.00	ND
1,2-DIBROMO-3-CHLOROPROPANE	96-12-8	5.00	ND
1,2,4-TRICHLOROBENZENE	120-82-1	5.00	8.75
HEXACHLOROBUTADIENE	87-68-3	5.00	27.0
NAPHTHALENE	91-20-3	5.00	ND
1,2,3-TRICHLOROBENZENE	87-61-6	5.00	6.63

SURROGATE RECOVERY	%
DIBROMOFLUOROMETHANE	87
TOLUENE-D8	82
4-BROMOFLUOROBENZENE	95

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA NOT APPLICABLE OR AVAILABLE

APPROVED BY: AAK
DATE: 9/4/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: STP-1C/D COMP.
LAB NO: 16096/97
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:10

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 9/4/98
UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
DICHLORODIFLUOROMETHANE	75-71-8	5.00	ND
CHLOROMETHANE	74-87-3	5.00	ND
VINYL CHLORIDE	75-01-4	5.00	ND
BROMOMETHANE	74-83-9	5.00	ND
CHLOROETHANE	75-00-3	5.00	ND
TRICHLOROFLUOROMETHANE	75-69-4	5.00	ND
1,1-DICHLOROETHENE	75-35-4	5.00	ND
METHYLENE CHLORIDE	75-09-2	12.0	ND
TRANS-1,2-DICHLOROETHENE	156-60-5	5.00	ND
1,1-DICHLOROETHANE	75-34-3	5.00	ND
CIS-1,2-DICHLOROETHENE	156-59-2	5.00	11.9
2,2-DICHLOROPROPANE	594-20-7	5.00	ND
BROMOCHLOROMETHANE	74-97-5	5.00	ND
CHLOROFORM	67-66-3	5.00	ND
1,1,1-TRICHLOROETHANE	71-55-6	5.00	ND
CARBON TETRACHLORIDE	56-23-5	5.00	ND
1,1-DICHLOROPROPENE	563-58-6	5.00	ND
BENZENE	71-43-2	5.00	92
1,2-DICHLOROETHANE	107-06-2	5.00	ND
TRICHLOROETHENE	79-01-6	5.00	ND
1,2-DICHLOROPROPANE	78-87-5	5.00	ND
DIBROMOMETHANE	74-95-3	5.00	ND
BROMODICHLOROMETHANE	75-27-4	5.00	ND
TRANS-1,3-DICHLOROPROPENE	10061-02-6	5.00	ND
TOLUENE	108-88-3	5.00	76
CIS-1,3-DICHLOROPROPENE	10061-01-5	5.00	ND
1,1,2-TRICHLOROETHANE	79-00-5	5.00	ND
TETRACHLOROETHENE	127-18-4	5.00	32
1,3-DICHLOROPROPANE	142-28-9	5.00	ND
DIBROMOCHLOROMETHANE	124-48-1	5.00	ND
1,2-DIBROMOETHANE	106-93-4	5.00	ND
CHLOROBENZENE	108-90-7	5.00	260
1,1,1,2-TETRACHLOROETHANE	630-20-6	5.00	ND
ETHYLBENZENE	100-41-4	5.00	3,675
XYLENE (M+P)	1330-20-7	5.00	20,000
XYLENE (O)	1330-20-7	5.00	8,288
STYRENE	100-42-5	5.00	ND
BROMOFORM	75-25-2	5.00	ND
ISOPROPYLBENZENE	98-82-8	5.00	1,775

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: STP-1C/D COMP.
LAB NO: 16096/97
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:10

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 9/4/98
UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
1,1,2,2-TETRACHLOROETHANE	79-34-5	5.00	ND
BROMOBENZENE	108-86-1	5.00	ND
1,2,3-TRICHLOROPROPANE	96-18-4	5.00	ND
N-PROPYLBENZENE	103-65-1	5.00	979
2-CHLOROTOLUENE	95-49-8	5.00	ND
1,3,5-TRIMETHYLBENZENE	108-67-8	5.00	758
4-CHLOROTOLUENE	106-43-4	5.00	ND
TERT-BUTYLBENZENE	98-06-6	5.00	ND
1,2,4-TRIMETHYLBENZENE	95-63-6	5.00	1,738
SEC-BUTYLBENZENE	135-98-8	5.00	ND
1,3-DICHLOROBENZENE	541-73-1	5.00	13.3
4-ISOPROPYLTOLUENE	99-87-6	5.00	102
1,4-DICHLOROBENZENE	106-46-7	5.00	185
N-BUTYLBENZENE	104-51-8	5.00	99.3
1,2-DICHLOROBENZENE	95-50-1	5.00	323
1,2-DIBROMO-3-CHLOROPROPANE	96-12-8	5.00	ND
1,2,4-TRICHLOROBENZENE	120-82-1	5.00	46.1
HEXACHLOROBUTADIENE	87-68-3	5.00	125
NAPHTHALENE	91-20-3	5.00	ND
1,2,3-TRICHLOROBENZENE	87-61-6	5.00	22.9

SURROGATE RECOVERY	%
DIBROMOFLUOROMETHANE	81
TOLUENE-D8	76
4-BROMOFLUOROBENZENE	80

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

APPROVED BY: PRELIMINARY RESULTS
DATE: ck 9/4/98
ESTIMATED CONCENTRATIONS

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: STP-2A/B COMP.
LAB NO: 16098/99
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:20

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 9/4/98
UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
DICHLORODIFLUOROMETHANE	75-71-8	5.00	ND
CHLOROMETHANE	74-87-3	5.00	ND
VINYL CHLORIDE	75-01-4	5.00	ND
BROMOMETHANE	74-83-9	5.00	ND
CHLOROETHANE	75-00-3	5.00	ND
TRICHLOROFLUOROMETHANE	75-69-4	5.00	ND
1,1-DICHLOROETHENE	75-35-4	5.00	ND
METHYLENE CHLORIDE	75-09-2	12.0	ND
TRANS-1,2-DICHLOROETHENE	156-60-5	5.00	ND
1,1-DICHLOROETHANE	75-34-3	5.00	ND
CIS-1,2-DICHLOROETHENE	156-59-2	5.00	7.00
2,2-DICHLOROPROPANE	594-20-7	5.00	ND
BROMOCHLOROMETHANE	74-97-5	5.00	ND
CHLOROFORM	67-66-3	5.00	ND
1,1,1-TRICHLOROETHANE	71-55-6	5.00	ND
CARBON TETRACHLORIDE	56-23-5	5.00	ND
1,1-DICHLOROPROPENE	563-58-6	5.00	ND
BENZENE	71-43-2	5.00	ND
1,2-DICHLOROETHANE	107-06-2	5.00	ND
TRICHLOROETHENE	79-01-6	5.00	ND
1,2-DICHLOROPROPANE	78-87-5	5.00	ND
DIBROMOMETHANE	74-95-3	5.00	ND
BROMODICHLOROMETHANE	75-27-4	5.00	ND
TRANS-1,3-DICHLOROPROPENE	10061-02-6	5.00	ND
TOLUENE	108-88-3	5.00	ND
CIS-1,3-DICHLOROPROPENE	10061-01-5	5.00	ND
1,1,2-TRICHLOROETHANE	79-00-5	5.00	ND
TETRACHLOROETHENE	127-18-4	5.00	8.13
1,3-DICHLOROPROPANE	142-28-9	5.00	ND
DIBROMOCHLOROMETHANE	124-48-1	5.00	ND
1,2-DIBROMOETHANE	106-93-4	5.00	ND
CHLOROBENZENE	108-90-7	5.00	ND
1,1,1,2-TETRACHLOROETHANE	630-20-6	5.00	ND
ETHYLBENZENE	100-41-4	5.00	171
XYLENE (M+P)	1330-20-7	5.00	848
XYLENE (O)	1330-20-7	5.00	353
STYRENE	100-42-5	5.00	ND
BROMOFORM	75-25-2	5.00	ND
ISOPROPYLBENZENE	98-82-8	5.00	11.0

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 4860103015

SAMPLE ID: STP-2A/B COMP.
LAB NO: 16098/99
SAMPLE TYPE: SOIL
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:20

METHOD: VOLATILE ORGANIC COMPOUNDS
REFERENCE: EPA 8260

DATE ANALYZED: 9/4/98
UNITS: µg/Kg

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
1,1,2,2-TETRACHLOROETHANE	79-34-5	5.00	ND
BROMOBENZENE	108-86-1	5.00	ND
1,2,3-TRICHLOROPROPANE	96-18-4	5.00	ND
N-PROPYLBENZENE	103-65-1	5.00	ND
2-CHLOROTOLUENE	95-49-8	5.00	ND
1,3,5-TRIMETHYLBENZENE	108-67-8	5.00	ND
4-CHLOROTOLUENE	106-43-4	5.00	ND
TERT-BUTYLBENZENE	98-06-6	5.00	ND
1,2,4-TRIMETHYLBENZENE	95-63-6	5.00	14.9
SEC-BUTYLBENZENE	135-98-8	5.00	ND
1,3-DICHLOROBENZENE	541-73-1	5.00	ND
4-ISOPROPYLTOLUENE	99-87-6	5.00	ND
1,4-DICHLOROBENZENE	106-46-7	5.00	ND
N-BUTYLBENZENE	104-51-8	5.00	ND
1,2-DICHLOROBENZENE	95-50-1	5.00	11.0
1,2-DIBROMO-3-CHLOROPROPANE	96-12-8	5.00	ND
1,2,4-TRICHLOROBENZENE	120-82-1	5.00	ND
HEXACHLOROBUTADIENE	87-68-3	5.00	14.3
NAPHTHALENE	91-20-3	5.00	ND
1,2,3-TRICHLOROBENZENE	87-61-6	5.00	ND

SURROGATE RECOVERY	%
DIBROMOFLUOROMETHANE	83
TOLUENE-D8	79
4-BROMOFLUOROBENZENE	88

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT APPLICABLE OR AVAILABLE

APPROVED BY: PRELIMINARY RESULTS
DATE: ck 9/4/98
ESTIMATED CONCENTRATIONS

K PRIME, INC.
LABORATORY REPORT

METHOD: TOTAL LEAD
REFERENCE: EPA 3050/7420

CLIENT PROJECT: 4860103015
KPI PROJECT: 9418

UNITS: mg/Kg

SAMPLE ID	LAB ID #	DATE SAMPLED	DATE RECEIVED	SAMPLE CONC	REPORTING LIMIT	ANALYSIS DATE
STP-1A/B COMP	16094/95	9/3/98	9/3/98	45.3	5.00	9/4/98
STP-1C/D COMP	16096/97	9/3/98	9/3/98	39.6	5.00	9/4/98
STP-2A/B COMP	16098/99	9/3/98	9/3/98	40.4	5.00	9/4/98

NOTES:

ND - NOT DETECTED AT REPORTING LIMIT

APPROVED BY: Cheryl
DATE: 9/4/98

sampleID	date	time	lab_smp#	type	#of cont	ANALYSIS 8080, 8260, TPHg, TPHd, Tot.
STP-1A	09-03-98	15:00	16094	SOIL	1	✓
STP-1B	09-03-98	15:05	16095	SOIL	1	✓
STP-1C	09-03-98	15:10	16096	SOIL	1	✓
STP-1D	09-03-98	15:15	16097	SOIL	1	✓
STP-2A	09-03-98	15:20	16098	SOIL	1	✓
STP 2B	09-03-98	15:25	16099	SOIL	1	

RELINQUISHED BY: Don Seymour 9/3/98, 16:00

RECEIVED BY: [signature] 9/3/98 16:00 DATE/TIME

CLIENT: PES

PROJECT I.D. 4860103015

LOCATION: LRTC

CONTACT: DON SEYMOUR / BILL FRIZZEL

PHONE: 415 899 1600

TOT: 24 HOUR / FRIDAY 9/4, IF POSSIBLE
BY EARLY AFTERNOON

REMARKS: CAUTION, MAY CONTAIN PESTICIDES

COMPOSITE STP-1A + STP-1B

STP-1C + STP-1D

STP-2A + STP-2B

RECEIVED SEP 2 2 1998

K PRIME, Inc.

CONSULTING ANALYTICAL CHEMISTS

3621 Westwind Blvd.
Santa Rosa, CA 95403
Phone: 707 527 7574
Fax: 707 527 7879

TRANSMITTAL

DATE: 09.18.98

TO: Mr. DON SEYMOUR
PES Environmental
1682 Novato Blvd., Suite 100
Novato CA 94947

Phone: 415.899.1600
FAX: 415.899.1601

Acct: 9418
Project: 486.0103.015

FROM: Richard A. Kagel, Ph.D. RAK 9/18/98
Laboratory Director

SUBJECT: YOUR PROJECT "486.0103.015" LABORATORY RESULTS

Enclosed please find K Prime's laboratory reports for the following samples:

SAMPLE ID	SAMPLE TYPE	DATE	KPI LAB #
STP-1A	SOIL/LEACH	09.03.98	16094
STP-1B	SOIL/LEACH	09.03.98	16095
STP-1C	SOIL/LEACH	09.03.98	16096
STP-1D	SOIL/LEACH	09.03.98	16097
STP-2A	SOIL/LEACH	09.03.98	16098
STP-2B	SOIL/LEACH	09.03.98	16099

These samples were received in our laboratory on 09.03.98 and tested as requested on the chain of custody document.

Please call me if you have any questions or need further information. Thank you for this opportunity to be of service.

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

METHOD: TCLP/ENDRIN
REFERENCE: EPA 8080

SAMPLE ID: STP-1C/1D COMP
LAB NO: 16096-16097
SAMPLE TYPE: TCLP LEACHATE
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:10
DATE LEACHED: 9/10/98
DATE EXTRACTED: 9/14/98
DATE ANALYZED: 9/15/98

UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
ENDRIN	72-20-8	0.20	5.70

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: BMC
DATE: 9/18/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

METHOD: TCLP/ENDRIN
REFERENCE: EPA 8080

SAMPLE ID: STP-1A/1B COMP
LAB NO: 16094-16095
SAMPLE TYPE: TCLP LEACHATE
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:00
DATE LEACHED: 9/10/98
DATE EXTRACTED: 9/14/98
DATE ANALYZED: 9/15/98

UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
ENDRIN	72-20-8	0.20	10.2

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: LAK
DATE: 9/18/98

K PRIME, INC.
LABORATORY REPORT

OUR PROJECT: 9418
YOUR PROJECT: 486 0103 015

METHOD: TCLP/ENDRIN
REFERENCE: EPA 8080

SAMPLE ID: STP-2A/2B COMP
LAB NO: 16098-16099
SAMPLE TYPE: TCLP LEACHATE
DATE SAMPLED: 9/3/98
TIME SAMPLED: 15:20
DATE LEACHED: 9/10/98
DATE EXTRACTED: 9/14/98
DATE ANALYZED: 9/15/98

UNITS: µg/L

COMPOUND NAME	CAS NO.	REPORTING LIMIT	SAMPLE CONC
ENDRIN	72-20-8	0.20	24.7

NOTES:
ND - NOT DETECTED ABOVE THE STATED REPORTING LIMIT
NA - NOT AVAILABLE OR APPLICABLE

APPROVED BY: KMS
DATE: 9/18/98

sampleID	date	time	lab_smp#	type	#of cont	ANALYSIS 8080, 8260, TPHg, TPHd, Tc
STP-1A	09-03-98	15:00	16094	SOIL	1	✓
STP-1B	09-03-98	15:05	16095	SOIL	1	✓
STP-1C	09-03-98	15:10	16096	SOIL	1	✓
STP-1D	09-03-98	15:15	16097	SOIL	1	✓
STP-2A	09-03-98	15:20	16098	SOIL	1	✓
STP-2B	09-03-98	15:25	16099	SOIL	1	✓

RELINQUISHED BY: 9/3/98, 16:00

RECEIVED BY: 9/3/98 16:00 DATE/TIME

CLIENT: PES

PROJECT ID 4860103015

LOCATION. LRTC

CONTACT: DON SEYMOUR / BILL FRIZZEL

PHONE: 415 899 1600

TOT: 24 HOUR / FRIDAY 9/4, IF POSSIBLE BY EARLY AFTERNOON

REMARKS: CAUTION, MAY CONTAIN PESTICIDES

COMPOSITE STP-1A + STP-1B

STP-1C + STP-1D

STP-2A + STP-2B

K PRIME, INC.

CHANGE ORDER

CONSULTING ANALYTICAL CHEMISTS 3621 Westwind Blvd. Santa Rosa CA 95403 PHONE: 707.527.7574 FAX: 707.527.7879

Client/Project ID	Address/Phone: 1682 Novato Blvd. Novato CA 94947 415.899.1600/1601	ANALYSES	KPI Project No.: 9418-16094
Project Location RICHMOND LEVIN	Client Project No. 486.0103.015		
Contact DON SEYMOUR	Sampler (Signature)		

Sample Identification	Lab Sample No.	Date	Time	Type of Sample	No. of Containers	TCLP EXTRACTION	TCLP ENDRIN										Turn-around	Remarks
STP-1A	16094	03-Sep-98	15:00	SOIL	1	√	√										ASAP	Additional analysis
STP-1B	16095	03-Sep-98	15:05	SOIL	1	√	√										ASAP	Additional analysis
STP-1C	16096	03-Sep-98	15:10	SOIL	1	√	√										ASAP	Additional analysis
STP-1D	16097	03-Sep-98	15:15	SOIL	1	√	√										ASAP	Additional analysis
STP-2A	16098	03-Sep-98	15:20	SOIL	1	√	√										ASAP	Additional analysis
STP-2B	16099	03-Sep-98	15:25	SOIL	1	√	√										ASAP	Additional analysis
END OF LIST																		

	Date	Time	
DON SEYMOUR	9-Sep-98	8:50	Approved by: (Signature) Ginger Brinlee
Authorized by: (Signature)	Date	Time	Approved by: (Signature)
Authorized by: (Signature)	Date	Time	Approved by: (Signature)

Comments: Samples are composited: 1 A+B, 1 C+D, 2 A+B

Date Time

APPENDIX J

CONCRETE COMPRESSIVE STRENGTH REPORTS FOR CONCRETE CAP

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 11

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 9/18/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 012 PES Environmental # 486.0103.018

Permit No.:

Mix Data

Supplier: Sugar City

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: Area D - pour 1, LRTC Richmond CA

Contractor: Ron Bernt

Truck/Ticket:

Date Sampled: 8/10/98

Date Received: 8/14/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep: Weather:

Field Cure Temp (°F) Hi: Lo: Wind (mph):

Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):	5	
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled: 09:30	Time in Truck:	

Laboratory Data

mple umber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
2958 A	8/17/98	7	6.00	x 12.00	x	28.27	91500	3240	
2958 B	9/7/98	28	6.00	x 12.00	x	28.27	148000	5230	
2958 C	9/7/98	28	6.00	x 12.00	x	28.27	145000	5130	

Average 28 Day Strength (psi): 5180

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 9/18/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 11

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 9/18/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 012 PES Environmental # 486.0103.018

Permit No.:

Mix Data

Supplier: Sugar City

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: Area D - pour 1, LRTC Richmond CA

Contractor: Ron Bernt

Truck/Ticket:

Date Sampled: 8/10/98

Date Received: 8/14/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep: Weather:

Field Cure Temp (°F) Hi: Lo: Wind (mph):

Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):	5	
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled: 09:30	Time in Truck:	

Laboratory Data

mple umber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
2958 A	8/17/98	7	6.00	x 12.00	x	28.27	91500	3240	
2958 B	9/7/98	28	6.00	x 12.00	x	28.27	148000	5230	
2958 C	9/7/98	28	6.00	x 12.00	x	28.27	145000	5130	

Average 28 Day Strength (psi): 5180

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 9/18/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

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KLEINFELDER
707-571-1883
2240 North Point Parkway, Santa Rosa, CA 95407

RECEIVED OCT 0 1 1998

Report No.: 12

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 9/22/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 013 PES Environmental 486.0103.018

Permit No.:

Mix Data

Supplier: Sugar City

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: Area D - pour 2, LTRC Richmond, CA

Contractor: Ron Bernt

Truck/Ticket:

Date Sampled: 8/12/98

Date Received: 8/14/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Weather:

Field Cure Temp (°F) Hi: Lo:

Wind (mph):

Field Cure Time:

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled: 12:30	Time in Truck:	

Laboratory Data

mple umber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
2959 A	8/19/98	7	6.00 x	12.00 x		28.27	75000	2650	
2959 B	9/9/98	28	6.00 x	12.00 x		28.27	159000	5620	
2959 C	9/9/98	28	6.00 x	12.00 x		28.27	155000	5480	

Average 28 Day Strength (psi): 5550

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 9/25/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 13

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 9/22/98 Last Reissued on:

Project No.: 41374401 Ref. No.:
Project: PES Environmental Misc. Lab. Testing

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Phase: 011 PES Environmental # 486.0103.018
Permit No.:

Mix Data

Supplier: Sugar City
Mix No.: NA
Design Strength: psi @ days

Cement Type:
Cement Factor (sk/cu. yd.):
Max. Size Agg. (in.):
Admixtures:

Sample Data

Source of Sample: Area D - pour 2, LRTC Richmond, CA
Contractor: Ron Bernt
Truck/Ticket:
Date Sampled: 8/12/98
Date Received: 8/14/98
Sampled By:
Submitted By:
Curing Method:
Specimen Prep: Weather:
Field Cure Temp (°F) Hi: Lo: Wind (mph):
Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):	8	
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled: 09:30	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
2960 A	8/19/98	7	6.00	x 12.00	x	28.27	77500	2740	
2960 B	9/9/98	28	6.00	x 12.00	x	28.27	155000	5480	
2960 C	9/9/98	28	6.00	x 12.00	x	28.27	157000	5550	

Average 28 Day Strength (psi): 5520

All fractures were conical in nature unless noted otherwise.
Remarks:

CC:

Reviewed on 9/22/98 by: Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 14

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 9/22/98

Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 014 PES Environmental

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond, CA

Contractor:

Truck/Ticket:

Date Sampled: 8/18/98

Date Received: 8/24/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Weather:

Field Cure Temp (°F) Hi: Lo:

Wind (mph):

Field Cure Time:

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3011 A	8/25/98	7	6.00 x	12.00 x		28.27	83000	2940	
3011 B	9/15/98	28	6.00 x	12.00 x		28.27	150000	5310	
3011 C	9/15/98	28	6.00 x	12.00 x		28.27	157500	5570	

Average 28 Day Strength (psi): 5440

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 9/22/98 by: Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 15

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 9/22/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 015 LRTC Richmond

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond

Contractor:

Truck/Ticket:

Date Sampled: 8/20/98

Date Received: 8/27/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Field Cure Temp (°F) Hi: Lo:

Field Cure Time:

Weather:

Wind (mph):

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142	6	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

mple umber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3027 A	8/27/98	7	6.00	x 12.00	x	28.27	81000	2870	
3027 B	9/17/98	28	6.00	x 12.00	x	28.27	150000	5310	
3027 C	9/17/98	28	6.00	x 12.00	x	28.27	154000	5450	

Average 28 Day Strength (psi): 5380

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 9/22/98 by: Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 16

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

ɔort Date: 9/22/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 016 LRTC Richmond

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond, CA

Contractor:

Truck/Ticket:

Date Sampled: 8/20/98

Date Received: 8/27/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Field Cure Temp (°F) Hi: Lo:

Field Cure Time:

Weather:

Wind (mph):

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

ɔmple ɹmber	Date Tested	Age (days)	Dimensions (in.) Diam. Ht. Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3028 A	8/27/98	7	6.00 x 12.00 x	28.27	82500	2920	
3028 B	9/17/98	28	6.00 x 12.00 x	28.27	153000	5410	
3028 C	9/17/98	28	6.00 x 12.00 x	28.27	150000	5310	

Average 28 Day Strength (psi): 5360

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 9/22/98 by: Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 17

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

ıort Date: 10/2/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 016 LRTC Richmond

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond

Contractor:

Truck/Ticket:

Date Sampled: 8/25/98

Date Received: 8/27/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Field Cure Temp (°F) Hi: Lo:

Field Cure Time:

Weather:

Wind (mph):

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

ımple ımber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3029 A	9/1/98	7	6.00	x 12.00	x	28.27	99500	3520	
3029 B	9/22/98	28	6.00	x 12.00	x	28.27	155500	5500	
3029 C	9/22/98	28	6.00	x 12.00	x	28.27	157000	5550	

Average 28 Day Strength (psi): 5530

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/3/98 by:

Timothy Casey

Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883
2240 North Point Parkway, Santa Rosa, CA 95407

RECEIVED OCT 0 7 1998

Report No.: 18

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

ɔort Date: 10/2/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 018 PES

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond, CA

Contractor:

Truck/Ticket:

Date Sampled: 8/26/98

Date Received: 8/28/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Field Cure Temp (°F) Hi: Lo:

Field Cure Time:

Weather:

Wind (mph):

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

ɔmple ɹmber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3047 A	9/2/98	7	6.00	x 12.00	x	28.27	91000	3220	
3047 B	9/23/98	28	6.00	x 12.00	x	28.27	153000	5410	
3047 C	9/23/98	28	6.00	x 12.00	x	28.27	155000	5480	

Average 28 Day Strength (psi): 5450

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/3/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 19

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

ɔort Date: 10/2/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 017 PES

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond, CA

Contractor:

Truck/Ticket:

Date Sampled: 8/26/98

Date Received: 8/28/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Weather:

Field Cure Temp (°F) Hi: Lo:

Wind (mph):

Field Cure Time:

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142	4.5	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

mple umber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3048 A	9/2/98	7	6.00	x 12.00	x	28.27	93000	3290	
3048 B	9/23/98	28	6.00	x 12.00	x	28.27	162500	5750	
3048 C	9/23/98	28	6.00	x 12.00	x	28.27	165000	5840	

Average 28 Day Strength (psi): 5800

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/3/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 23

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

ıort Date: 10/2/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 020 PES

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond, CA

Contractor:

Truck/Ticket:

Date Sampled: 9/1/98

Date Received: 9/14/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Field Cure Temp (°F) Hi: Lo:

Field Cure Time:

Weather:

Wind (mph):

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142	4	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

nple ımber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3106 A	9/14/98	13	6.00 x	12.00 x		28.27	128500	4550	
3106 B	9/29/98	28	6.00 x	12.00 x		28.27	153500	5430	
3106 C	9/29/98	28	6.00 x	12.00 x		28.27	147500	5220	

Average 28 Day Strength (psi): 5330

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/3/98 by: Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

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RECEIVED OCT 0 7 1998

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 22

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

ɔort Date: 10/5/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 019 PES

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond, CA

Contractor:

Truck/Ticket:

Date Sampled: 9/3/98

Date Received: 9/14/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Field Cure Temp (°F) Hi: Lo:

Field Cure Time:

Weather:

Wind (mph):

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142	3	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

ɔmple ɹmber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3105 A	9/14/98	11	6.00	x 12.00	x	28.27	96500	3410	
3105 B	10/1/98	28	6.00	x 12.00	x	28.27	147500	5220	
3105 C	10/1/98	28	6.00	x 12.00	x	28.27	142500	5040	

Average 28 Day Strength (psi): 5130

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/5/98 by: Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

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707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 20

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 10/8/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 022 PES

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond, CA

Contractor:

Truck/Ticket:

Date Sampled: 9/9/98

Date Received: 9/14/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Field Cure Temp (°F) Hi: Lo:

Field Cure Time:

Weather:

Wind (mph):

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

mple umber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3103 A	9/16/98	7	6.00	x 12.00	x	28.27	94500	3340	
3103 B	10/7/98	28	6.00	x 12.00	x	28.27	165000	5840	
3103 C	10/7/98	28	6.00	x 12.00	x	28.27	162500	5750	

Average 28 Day Strength (psi): 5800

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/8/98 by: Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883
2240 North Point Parkway, Santa Rosa, CA 95407

RECEIVED OCT 13 1998

Report No.: 21

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 10/8/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 021 PES

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample:

Contractor:

Truck/Ticket:

Date Sampled: 9/9/98

Date Received: 9/14/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Field Cure Temp (°F) Hi: Lo:

Field Cure Time:

Weather:

Wind (mph):

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3104 A	9/16/98	7	6.00 x	12.00 x		28.27	90000	3180	
3104 B	10/7/98	28	6.00 x	12.00 x		28.27	152500	5390	
3104 C	10/7/98	28	6.00 x	12.00 x		28.27	157500	5570	

Average 28 Day Strength (psi): 5480

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/8/98 by: Timothy Casey

Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

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2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 26

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 10/12/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 024 LRTC Richmond

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond, CA set 2

Contractor:

Truck/Ticket:

Date Sampled: 9/11/98

Date Received: 9/17/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Weather:

Field Cure Temp (°F) Hi: Lo:

Wind (mph):

Field Cure Time:

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

mple mber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3133 A	9/18/98	7	6.00 x	12.00 x		28.27	89500	3170	
3133 B	10/9/98	28	6.00 x	12.00 x		28.27	155000	5480	
3133 C	10/9/98	28	6.00 x	12.00 x		28.27	156500	5540	

Average 28 Day Strength (psi): 5510

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/12/98 by: Timothy Casey

Timothy Casey

Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

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KLEINFELDER
707-571-1883

RECEIVED OCT 1 4 1998

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 27

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 10/12/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 023 LRTC Richmond

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond, CA set 1

Contractor:

Truck/Ticket:

Date Sampled: 9/11/98

Date Received: 9/17/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep: Weather:

Field Cure Temp (°F) Hi: Lo: Wind (mph):

Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3134 A	9/18/98	7	6.00 x	12.00 x		28.27	79000	2790	
3134 B	10/9/98	28	6.00 x	12.00 x		28.27	145000	5130	
3134 C	10/9/98	28	6.00 x	12.00 x		28.27	141500	5010	

Average 28 Day Strength (psi): 5070

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/12/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

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707-571-1883

RECEIVED OCT 19 1998

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 24

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 10/15/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 025 LRTC Richmond

Permit No.:

Mix Data

Supplier: Sugar City

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond, CA - slab on grade

Contractor: Ron Bernt

Truck/Ticket:

Date Sampled: 9/15/98

Date Received: 9/17/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Weather:

Field Cure Temp (°F) Hi: Lo:

Wind (mph):

Field Cure Time:

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142	6	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3123 A	9/22/98	7	6.00	x 12.00	x	28.27	92000	3250	
3123 B	10/13/98	28	6.00	x 12.00	x	28.27	158000	5590	
3123 C		0	6.00	x 12.00	x	28.27	156500	5540	

Average 28 Day Strength (psi): 5590

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/15/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 25

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 10/14/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 026 LRTC Richmond

Permit No.:

Mix Data

Supplier: Sugar City

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond, CA - slab on grade

Contractor: Ron Bernt

Truck/Ticket:

Date Sampled: 9/16/98

Date Received: 9/17/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Weather:

Field Cure Temp (°F) Hi: Lo:

Wind (mph):

Field Cure Time:

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142	8	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

mple umber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3124 A	9/23/98	7	6.00	x 12.00	x	28.27	60000	2120	
3124 B	10/14/98	28	6.00	x 12.00	x	28.27	120000	4240	
3124 C	10/14/98	28	6.00	x 12.00	x	28.27	122500	4330	

Average 28 Day Strength (psi): 4290

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/14/98 by: Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 28

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 10/21/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 027 LRTC / PES 922 - D1

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: 922 - D1

Contractor:

Truck/Ticket:

Date Sampled: 9/22/98

Date Received:

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Field Cure Temp (°F) Hi: Lo:

Field Cure Time:

Weather:

Wind (mph):

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142	6.5	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

mple umber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3241 A	10/6/98	14	6.00 x	12.00	x	28.27	98500	3480	
3241 B	10/20/98	28	6.00 x	12.00	x	28.27	141000	4990	
3241 C	10/20/98	28	6.00 x	12.00	x	28.27	141500	5010	

Average 28 Day Strength (psi): 5000

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/21/98 by: Timothy Casey

Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883
2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 29

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

port Date: 10/21/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 028 LRTC /PES 422-D2

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: 422 - D2

Contractor:

Truck/Ticket:

Date Sampled: 9/22/98

Date Received:

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Field Cure Temp (°F) Hi: Lo:

Field Cure Time:

Weather:

Wind (mph):

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142	6	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

mple umber	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3242 A	10/6/98	14	6.00	x 12.00	x	28.27	111500	3940	
3242 B	10/20/98	28	6.00	x 12.00	x	28.27	133500	4720	
3242 C	10/20/98	28	6.00	x 12.00	x	28.27	132000	4670	

Average 28 Day Strength (psi): 4700

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/21/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

RECEIVED NOV 0 4 1998

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 30

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 10/30/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 029 PES ENV

Permit No.:

Mix Data

Supplier: Sugar City

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC slab on grade

Contractor: Ron Bernt

Truck/Ticket:

Date Sampled: 10/1/98

Date Received: 10/8/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Weather:

Field Cure Temp (°F) Hi: Lo:

Wind (mph):

Field Cure Time:

Rh (%):

	Measured	Specifiec
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (ps
3267 A	10/8/98	7	6.00 x	12.00 x		28.27	100000	3540	
3267 B	10/29/98	28	6.00 x	12.00 x		28.27	156000	5520	
3267 C	10/29/98	28	6.00 x	12.00 x		28.27	160000	5660	

Average 28 Day Strength (psi): 5590

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/30/98 by: Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports i reserved pending our written approval.

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KLEINFELDER
707-571-1883

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 32

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 11/4/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 031 PES

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC "C west"

Contractor:

Truck/Ticket:

Date Sampled: 10/6/98

Date Received: 10/9/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep: Weather:

Field Cure Temp (°F) Hi: Lo: Wind (mph):

Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.): ASTM C142	4	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (ps
3280 A	10/13/98	7	6.00 x	12.00	x	28.27	81500	2880	
3280 B	11/3/98	28	6.00 x	12.00	x	28.27	151500	5360	
3280 C	11/3/98	28	6.00 x	12.00	x	28.27	152500	5390	

Average 28 Day Strength (psi): 5380

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 11/4/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

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KLEINFELDER
707-571-1883

RECEIVED OCT 3 0 1998

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 31

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 10/27/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Project: PES Environmental Misc. Lab. Testing

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Phase: 030 PES Environmental

Permit No.:

Mix Data

Supplier: Sugar City

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond slab on grade

Contractor: Ron Bernt

Truck/Ticket:

Date Sampled: 9/28/98

Date Received: 10/8/98

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Weather:

Field Cure Temp (°F) Hi: Lo:

Wind (mph):

Field Cure Time:

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142	5	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3268 A	10/12/98	14	6.00	12.00	x	28.27	128500	4550	
3268 B	10/26/98	28	6.00	12.00	x	28.27	155000	5480	
3268 C	10/26/98	28	6.00	12.00	x	28.27	156000	5520	

Average 28 Day Strength (psi): 5500

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 10/27/98 by: Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER
707-571-1883

RECEIVED NOV 1 3 1998

2240 North Point Parkway, Santa Rosa, CA 95407

Report No.: 33

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

.eport Date: 11/11/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 032 PES

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: LRTC Richmond

Contractor:

Truck/Ticket:

Date Sampled: 10/13/98

Date Received:

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Weather:

Field Cure Temp (°F) Hi: Lo:

Wind (mph):

Field Cure Time:

Rh (%):

	Measured	Specifiec
Slump (in.): ASTM C142		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

ample Number	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (ps
3352 A	10/20/98	7	6.00 x	12.00	x	28.27	85000	3010	
3352 B	11/10/98	28	6.00 x	12.00	x	28.27	155000	5480	
3352 C	11/10/98	28	6.00 x	12.00	x	28.27	160000	5660	

Average 28 Day Strength (psi): 5570

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 11/11/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports reserved pending our written approval.

KLEINFELDER
707-571-1883
2240 North Point Parkway, Santa Rosa, CA 95407

RECEIVED NOV 1 8 1998

Report No.: 34

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

eport Date: 11/13/98 Last Reissued on:

Project No.: 41374401 Ref. No.:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100
Novato CA 94947

Project: PES Environmental Misc. Lab. Testing

Phase: 033 pes

Permit No.:

Mix Data

Supplier: NA

Mix No.: NA

Design Strength: psi @ days

Cement Type:

Cement Factor (sk/cu. yd.):

Max. Size Agg. (in.):

Admixtures:

Sample Data

Source of Sample: Area B west side

Contractor: NA

Truck/Ticket:

Date Sampled: 10/15/98

Date Received:

Sampled By:

Submitted By:

Curing Method:

Specimen Prep:

Weather:

Field Cure Temp (°F) Hi: Lo:

Wind (mph):

Field Cure Time:

Rh (%):

	Measured	Specified
Slump (in.): ASTM C142	6	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F): ASTM C1064		
Air Content (%): ASTM C231		
Unit Weight (pcf): ASTM C138		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

ample Number	Date Tested	Age (days)	Dimensions (in.) Diam.	Ht.	Len. (n/a)	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (ps
3378 A	10/22/98	7	6.00 x	12.00 x		28.27	86000	3040	
3378 B	11/12/98	28	6.00 x	12.00 x		28.27	152500	5390	
3378 C	11/12/98	28	6.00 x	12.00 x		28.27	150000	5310	

Average 28 Day Strength (psi): 5350

All fractures were conical in nature unless noted otherwise.

Remarks:

CC:

Reviewed on 11/13/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports i. reserved pending our written approval.

KLEINFELDER

2240 North Point Parkway,
Santa Rosa, CA 95407

Report No.: 39

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 11/18/98 Last Reissued on:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100

Novato CA 94947

Project No.: 41374401 Ref. No.:
Project: PES Environmental Misc. Lab. Testing

Phase: 038 PES
Permit No.:

Mix Data — Observed by Kleinfelder

Supplier: NA
Mix No.: NA
Design Strength: 0 psi @ 0 days

Cement Type:
Cement Factor (sk/cu. yd.):
Max. Size Agg. (in.):
Admixtures:

Sample Data — Observed by Kleinfelder

Date Sampled: 10/20/98 Date Received:
Source of Sample: LRTC Richmond Area B

Contractor: NA
Truck/Ticket:
Sampled By:
Submitted By:
Curing Method:
Specimen Prep: Weather:
Field Cure Temp (°F) Hi: Lo: Wind (mph):
Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.):	6	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F):		
Air Content (%):		
Unit Weight (pcf):		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:		Time in Truck:

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions Diam.	Ht.	Len.	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3535 A	11/17/98	28	6.00 x	12.00 x		28.27	138000	4880	
3535 B	11/17/98	28	6.00 x	12.00 x		28.27	136000	4810	
3535 C	11/17/98	28	6.00 x	12.00 x		28.27	139000	4920	

Average 28 Day Strength (psi): 4870

All fractures were conical in nature unless noted otherwise.

Remarks:

Reviewed on 11/18/98 by: Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER

2240 North Point Parkway,
Santa Rosa, CA 95407

Report No.: 40

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 11/18/98 Last Reissued on:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100

Novato CA 94947

Project No.: 41374401 Ref. No.:
Project: PES Environmental Misc. Lab. Testing

Phase: 039 PES
Permit No.:

Mix Data Observed by Kleinfelder

Supplier: NA
Mix No.: NA
Design Strength: 0 psi @ 0 days

Cement Type:
Cement Factor (sk/cu. yd.):
Max. Size Agg. (in.):
Admixtures:

Sample Data Observed by Kleinfelder

Date Sampled: 10/20/98 Date Received:
Source of Sample:

Contractor: NA
Truck/Ticket:
Sampled By:
Submitted By:
Curing Method:
Specimen Prep: Weather:
Field Cure Temp (°F) Hi: Lo: Wind (mph):
Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.):	6	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F):		
Air Content (%):		
Unit Weight (pcf):		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:		Time in Truck:

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions Diam.	Ht.	Len.	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3536 A	11/17/98	28	6.00 x	12.00 x		28.27	140000	4950	
3536 B	11/17/98	28	6.00 x	12.00 x		28.27	139000	4920	
3536 C	11/17/98	28	6.00 x	12.00 x		28.27	137500	4860	

Average 28 Day Strength (psi): 4910

All fractures were conical in nature unless noted otherwise.

Remarks:

Reviewed on 11/18/98 by: Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER

2240 North Point Parkway,
Santa Rosa, CA 95407

Report No.: 35

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 11/20/98 Last Reissued on:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100

Novato CA 94947

Project No.: 41374401 Ref. No.:
Project: PES Environmental Misc. Lab. Testing

Phase: 034 PES / LRTC Richmond, CA
Permit No.:

Mix Data — Observed by Kleinfelder

Supplier: Sugar City
Mix No.: NA
Design Strength: 0 psi @ 0 days

Cement Type:
Cement Factor (sk/cu. yd.):
Max. Size Agg. (in.):
Admixtures:

Sample Data — Observed by Kleinfelder

Date Sampled: 10/22/98 Date Received:
Source of Sample: Area B - north center slab on grade - Set 1 of 2

Contractor: Ron Bernt
Truck/Ticket:
Sampled By:
Submitted By:
Curing Method:
Specimen Prep: Weather:
Field Cure Temp (°F) Hi: Lo: Wind (mph):
Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.):	5	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F):		
Air Content (%):		
Unit Weight (pcf):		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions Diam.	Ht.	Len.	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi
3423 A	10/29/98	7	6.00 x	12.00 x		28.27	102500	3630	
3423 B	11/19/98	28	6.00 x	12.00 x		28.27	157000	5550	
3423 C	11/19/98	28	6.00 x	12.00 x		28.27	160000	5660	

Average 28 Day Strength (psi): 5610

All fractures were conical in nature unless noted otherwise.

Remarks:

Reviewed on 11/20/98 by: Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER

2240 North Point Parkway,
Santa Rosa, CA 95407

Report No.: 36

NOV 2 4 1998

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 11/20/98 **Last Reissued on:**

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100

Novato CA 94947

Project No.: 41374401 **Ref. No.:**
Project: PES Environmental Misc. Lab. Testing

Phase: 035 PES / LRTC Richmond, CA
Permit No.:

Mix Data — Observed by Kleinfelder

Supplier: Sugar City
Mix No.: NA
Design Strength: 0 psi @ 0 days

Cement Type:
Cement Factor (sk/cu. yd.):
Max. Size Agg. (in.):
Admixtures:

Sample Data — Observed by Kleinfelder

Date Sampled: 10/22/98 **Date Received:**
Source of Sample: Area B - north center slab on grade - Set 2 of 2

Contractor: Ron Bernt
Truck/Ticket:
Sampled By:
Submitted By:
Curing Method:
Specimen Prep: **Weather:**
Field Cure Temp (°F) Hi: **Lo:** **Wind (mph):**
Field Cure Time: **Rh (%):**

	Measured	Specified
Slump (in.):	6	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F):		
Air Content (%):		
Unit Weight (pcf):		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions Diam.	Ht.	Len.	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3424 A	10/29/98	7	6.00 x	12.00 x		28.27	89500	3170	
3424 B	11/19/98	28	6.00 x	12.00 x		28.27	159000	5620	
3424 C	11/19/98	28	6.00 x	12.00 x		28.27	155000	5480	

Average 28 Day Strength (psi): 5550

All fractures were conical in nature unless noted otherwise.

Remarks:

Reviewed on 11/20/98 **by:** Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

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KLEINFELDER

2240 North Point Parkway,
Santa Rosa, CA 95407

Report No.: 37

RECEIVED NOV 2 7 1998

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 11/25/98 Last Reissued on:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100

Novato CA 94947

Project No.: 41374401 Ref. No.:
Project: PES Environmental Misc. Lab. Testing

Phase: 036 PES
Permit No.:

Mix Data — Observed by Kleinfelder

Supplier: NA
Mix No.: NA
Design Strength: 0 psi @ 0 days

Cement Type:
Cement Factor (sk/cu. yd.):
Max. Size Agg. (in.):
Admixtures:

Sample Data — Observed by Kleinfelder

Date Sampled: 10/27/98 Date Received:
Source of Sample:
Contractor:
Truck/Ticket:
Sampled By:
Submitted By:
Curing Method:
Specimen Prep: Weather:
Field Cure Temp (°F) Hi: Lo: Wind (mph):
Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.):		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F):		
Air Content (%):		
Unit Weight (pcf):		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions Diam.	Ht.	Len.	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3487 A	11/5/98	9	6.00 x	12.00 x		28.27	91000	3220	
3487 B	11/24/98	28	6.00 x	12.00 x		28.27	159500	5640	
3487 C	11/24/98	28	6.00 x	12.00 x		28.27	157000	5550	

Average 28 Day Strength (psi): 5600

All fractures were conical in nature unless noted otherwise.

Remarks:

Reviewed on 11/25/98 by:

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER

RECEIVED DEC 0 3 1998

2240 North Point Parkway,
Santa Rosa, CA 95407

Report No.: 38

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 12/1/98 **Last Reissued on:**

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100

Novato CA 94947

Project No.: 41374401 **Ref. No.:**
Project: PES Environmental Misc. Lab. Testing

Phase: 037 Pes
Permit No.:

Mix Data — Reported to Kleinfelder

Supplier: NA
Mix No.: NA
Design Strength: 0 psi @ 0 days

Cement Type:
Cement Factor (sk/cu. yd.):
Max. Size Agg. (in.):
Admixtures:

Sample Data — Reported to Kleinfelder

Date Sampled: 10/29/98 **Date Received:**
Source of Sample:

Contractor:
Truck/Ticket:
Sampled By:
Submitted By:
Curing Method:
Specimen Prep: **Weather:**
Field Cure Temp (°F) Hi: **Lo:** **Wind (mph):**
Field Cure Time: **Rh (%):**

	Measured	Specifiec
Slump (in.):		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F):		
Air Content (%):		
Unit Weight (pcf):		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number		Date Tested	Age (days)	Dimensions Diam.		Ht.		Len.	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi
3488	A	11/5/98	7	6.00	x	12.00	x		28.27	70500	2490	
3488	B	11/26/98	28	6.00	x	12.00	x		28.27	146000	5160	
3488	C	11/26/98	28	6.00	x	12.00	x		28.27	149000	5270	

Average 28 Day Strength (psi): 5220

All fractures were conical in nature unless noted otherwise.

Remarks:

Reviewed on 12/1/98 **by:** Timothy Casey

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER

2240 North Point Parkway,
Santa Rosa, CA 95407

Report No.: 42

RECEIVED DEC 0 7 1998

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 12/2/98 **Last Reissued on:**

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100

Novato CA 94947

Project No.: 41374401 **Ref. No.:**
Project: PES Environmental Misc. Lab. Testing

Phase: 041 PES
Permit No.:

Mix Data Reported to Kleinfelder

Supplier: Sugar City
Mix No.: NA
Design Strength: 0 psi @ 0 days

Cement Type:
Cement Factor (sk/cu. yd.):
Max. Size Agg. (in.):
Admixtures:

Sample Data Reported to Kleinfelder

Date Sampled: 11/3/98 **Date Received:**
Source of Sample: Slab-on-grade area A S. central perimeter

Contractor: Ron Bernt
Truck/Ticket:
Sampled By:
Submitted By:
Curing Method:
Specimen Prep: **Weather:**
Field Cure Temp (°F) Hi: **Lo:** **Wind (mph):**
Field Cure Time: **Rh (%):**

	Measured	Specified
Slump (in.):	4	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F):		
Air Content (%):		
Unit Weight (pcf):		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:		Time in Truck:

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions Diam.	Ht.	Len.	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3585 A	11/18/98	15	6.00 x	12.00 x		28.27	101000	3570	
3585 B	12/1/98	28	6.00 x	12.00 x		28.27	142000	5020	
3585 C	12/1/98	28	6.00 x	12.00 x		28.27	137000	4850	

Average 28 Day Strength (psi): 4940

All fractures were conical in nature unless noted otherwise.

Remarks:

Reviewed on 12/2/98 **by:** Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER

2240 North Point Parkway,
Santa Rosa, CA 95407

Report No.: 41

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 12/3/98 Last Reissued on:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100

Novato CA 94947

Project No.: 41374401 Ref. No.:
Project: PES Environmental Misc. Lab. Testing

Phase: 040 PES
Permit No.:

Mix Data Reported to Kleinfelder

Supplier: NA
Mix No.: NA
Design Strength: 0 psi @ 0 days

Cement Type:
Cement Factor (sk/cu. yd.):
Max. Size Agg. (in.):
Admixtures:

Sample Data Reported to Kleinfelder

Date Sampled: 11/4/98 Date Received:
Source of Sample:

Contractor: NA
Truck/Ticket:
Sampled By:
Submitted By:
Curing Method:
Specimen Prep: Weather:
Field Cure Temp (°F) Hi: Lo: Wind (mph):
Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.):		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F):		
Air Content (%):		
Unit Weight (pcf):		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions Diam.	Ht.	Len.	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3537 A	11/11/98	7	6.00 x	12.00 x		28.27	69500	2460	
3537 B	12/2/98	28	6.00 x	12.00 x		28.27	136500	4830	
3537 C	12/2/98	28	6.00 x	12.00 x		28.27	132000	4670	

Average 28 Day Strength (psi): 4750

All fractures were conical in nature unless noted otherwise.

Remarks:

Reviewed on 12/3/98 by: Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER

2240 North Point Parkway,
Santa Rosa, CA 95407

Report No.: 43

RECEIVED DEC 0 7 1998

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 12/4/98 Last Reissued on:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100

Novato CA 94947

Project No.: 41374401 Ref. No.:
Project: PES Environmental Misc. Lab. Testing

Phase: 042 PES
Permit No.:
Reported to Kleinfelder

Mix Data

Supplier: Sugar City
Mix No.: NA
Design Strength: 0 psi @ 0 days

Cement Type:
Cement Factor (sk/cu yd.):
Max. Size Agg. (in.):
Admixtures:
Reported to Kleinfelder

Sample Data

Date Sampled: 11/5/98 Date Received:
Source of Sample: Slab-on-grade area A drive ramp channel bank

Contractor: Ron Bernt
Truck/Ticket:
Sampled By:
Submitted By:
Curing Method:
Specimen Prep: Weather:
Field Cure Temp (°F) Hi: Lo: Wind (mph):
Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.):		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F):		
Air Content (%):		
Unit Weight (pcf):		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number		Date Tested	Age (days)	Dimensions Diam.	Ht.	Len.	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3586	A	11/19/98	14	6.00 x	12.00 x		28.27	102500	3630	
3586	B	12/3/98	28	6.00 x	12.00 x		28.27	138500	4900	
3586	C	12/3/98	28	6.00 x	12.00 x		28.27	136500	4830	

Average 28 Day Strength (psi): 4870

All fractures were conical in nature unless noted otherwise.

Remarks:

Reviewed on 12/4/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER

2240 North Point Parkway,
Santa Rosa, CA 95407

Report No.: 44

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 12/4/98 Last Reissued on:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100

Novato CA 94947

Project No.: 41374401 Ref. No.:
Project: PES Environmental Misc. Lab. Testing

Phase: 043 PES
Permit No.:

Mix Data

Reported to Kleinfelder

Supplier: Sugar City
Mix No.: NA
Design Strength: 0 psi @ 0 days

Cement Type:
Cement Factor (sk/cu. yd.):
Max. Size Agg. (in.):
Admixtures:

Sample Data

Reported to Kleinfelder

Date Sampled: 11/5/98 Date Received:
Source of Sample: Slab-on-grade area A, channel bank

Contractor: Ron Bernt
Truck/Ticket:
Sampled By:
Submitted By:
Curing Method:
Specimen Prep: Weather:
Field Cure Temp (°F) Hi: Lo: Wind (mph):
Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.):		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F):		
Air Content (%):		
Unit Weight (pcf):		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number		Date Tested	Age (days)	Dimensions Diam.		Ht.		Len.	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3587	A	12/3/98	28	6.00	x	12.00	x		28.27	117500	4160	
3587	B	12/3/98	28	6.00	x	12.00	x		28.27	120000	4240	
3587	C	12/3/98	28		x		x					

Average 28 Day Strength (psi): 4200

All fractures were conical in nature unless noted otherwise.

Remarks:

Reviewed on 12/4/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER

2240 North Point Parkway,
Santa Rosa, CA 95407

Report No.: 45

RECEIVED DEC 16 1998

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 12/10/98 **Last Reissued on:**

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100

Novato CA 94947

Project No.: 41374401 **Ref. No.:**
Project: PES Environmental Misc. Lab. Testing

Phase: 044 PES
Permit No.:

Mix Data

Reported to Kleinfelder

Supplier: Sugar City
Mix No.: NA
Design Strength: 0 psi @ 0 days

Cement Type:
Cement Factor (sk/cu. yd.):
Max. Size Agg. (in.):
Admixtures:

Sample Data

Reported to Kleinfelder

Date Sampled: 11/11/98 **Date Received:**
Source of Sample: Slab-on-grade area A top of pad (N.)

Contractor: Ron Bernt
Truck/Ticket:
Sampled By:
Submitted By:
Curing Method:
Specimen Prep: **Weather:**
Field Cure Temp (°F) Hi: Lo: **Wind (mph):**
Field Cure Time: **Rh (%):**

	Measured	Specified
Slump (in.):		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F):		
Air Content (%):		
Unit Weight (pcf):		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions Diam.	Ht.	Len.	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi
3589 A	11/19/98	8	6.00 x	12.00 x		28.27	94000	3330	
3589 B	12/9/98	28	6.00 x	12.00 x		28.27	172000	6080	
3589 C	12/9/98	28	6.00 x	12.00 x		28.27	171000	6050	

Average 28 Day Strength (psi): 6070

All fractures were conical in nature unless noted otherwise.

Remarks:

Reviewed on 12/10/98 **by:**

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER

2240 North Point Parkway,
Santa Rosa, CA 95407

Report No.: 46

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 12/10/98 Last Reissued on:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100

Novato CA 94947

Project No.: 41374401 Ref. No.:
Project: PES Environmental Misc. Lab. Testing

Phase: 045 PES
Permit No.:

Mix Data

Reported to Kleinfelder

Supplier: Sugar City
Mix No.: NA
Design Strength: 0 psi @ 0 days

Cement Type:
Cement Factor (sk/cu. yd.):
Max. Size Agg. (in.):
Admixtures:

Sample Data

Reported to Kleinfelder

Date Sampled: 11/11/98 Date Received:
Source of Sample: Slab-on-grade area A top of pad (N.)

Contractor: Ron Bernt
Truck/Ticket:
Sampled By:
Submitted By:
Curing Method:
Specimen Prep:
Field Cure Temp (°F) Hi: Lo:
Field Cure Time:

Weather:
Wind (mph):
Rh (%):

	Measured	Specifie
Slump (in.):		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F):		
Air Content (%):		
Unit Weight (pcf):		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number		Date Tested	Age (days)	Dimensions Diam.		Ht.		Len.	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi
3590	A	11/19/98	8	6.00	x	12.00	x		28.27	105000	3710	
3590	B	12/9/98	28	6.00	x	12.00	x		28.27	163500	5780	
3590	C	12/9/98	28	6.00	x	12.00	x		28.27	163500	5780	

Average 28 Day Strength (psi): 5780

All fractures were conical in nature unless noted otherwise.

Remarks:

Reviewed on 12/10/98 by: Timothy Casey

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER

2240 North Point Parkway,
Santa Rosa, CA 95407

Report No.: 47

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 12/15/98 Last Reissued on:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100

Novato CA 94947

Project No.: 41374401 Ref. No.:
Project: PES Environmental Misc. Lab. Testing

Phase: 046 PES
Permit No.:

Mix Data

Reported to Kleinfelder

Supplier: Sugar City
Mix No.: NA
Design Strength: 0 psi @ 0 days

Cement Type:
Cement Factor (sk/cu. yd.):
Max. Size Agg. (in.):
Admixtures:

Sample Data

Reported to Kleinfelder

Date Sampled: 11/13/98 Date Received:
Source of Sample: Slab-on-grade LRTC-Area A S. half W. end

Contractor: Ron Bernt
Truck/Ticket:
Sampled By:
Submitted By:
Curing Method:
Specimen Prep: Weather:
Field Cure Temp (°F) Hi: Lo: Wind (mph):
Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.):		
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F):		
Air Content (%):		
Unit Weight (pcf):		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number	Date Tested	Age (days)	Dimensions Diam.	Ht.	Len.	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3603 A	11/20/98	7	6.00 x	12.00 x		28.27	85000	3010	
3603 B	12/11/98	28	6.00 x	12.00 x		28.27	161500	5710	
3603 C	12/11/98	28	6.00 x	12.00 x		28.27	167000	5910	

Average 28 Day Strength (psi): 5810

All fractures were conical in nature unless noted otherwise.

Remarks:

Reviewed on 12/15/98 by:

Timothy Casey
Materials Engineer

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

KLEINFELDER

2240 North Point Parkway,
Santa Rosa, CA 95407

Report No.: 48

RECEIVED DEC 2 1 1998

CONCRETE CYLINDER COMPRESSIVE STRENGTH REPORT ASTM C39

Report Date: 12/15/98 Last Reissued on:

Report To: William F. Frizzell
PES Environmental, Inc.
1682 Novato Blvd. Ste. 100

Novato CA 94947

Project No.: 41374401 Ref. No.:
Project: PES Environmental Misc. Lab. Testing

Phase: 047 PES
Permit No.:

Mix Data

Reported to Kleinfelder

Supplier: Sugar City
Mix No.: NA
Design Strength: 0 psi @ 0 days

Cement Type:
Cement Factor (sk/cu. yd.):
Max. Size Agg. (in.):
Admixtures:

Sample Data

Reported to Kleinfelder

Date Sampled: 11/13/98 Date Received:
Source of Sample: Slab-on-grade LRTC-Area A S. half E. end

Contractor: Ron Bernt
Truck/Ticket:
Sampled By:
Submitted By:
Curing Method:
Specimen Prep: Weather:
Field Cure Temp (°F) Hi: Lo: Wind (mph):
Field Cure Time: Rh (%):

	Measured	Specified
Slump (in.):	5	
Slump w/plasticizer (in.):		
Air Temperature (°F):		
Mix Temperature (°F):		
Air Content (%):		
Unit Weight (pcf):		
Batch Size (cy):		
Water Added (gal):		
Time Batched:		
Time Sampled:	Time in Truck:	

Laboratory Data

Sample Number		Date Tested	Age (days)	Dimensions Diam.		Ht.		Len.	Area (in²)	Ultimate Load (lbs.)	Compressive Strength (psi)	Required Strength (psi)
3604	A	11/20/98	7	6.00	x	12.00	x		28.27	101500	3590	
3604	B	12/11/98	28	6.00	x	12.00	x		28.27	169000	5980	
3604	C	12/11/98	28	6.00	x	12.00	x		28.27	161000	5690	

Average 28 Day Strength (psi): 5840

All fractures were conical in nature unless noted otherwise.

Remarks:

Reviewed on 12/15/98 by:

Unless prior arrangements have been made, all HOLD specimens will be discarded if design strength is attained.

As a mutual protection to our clients and ourselves, all reports submitted are the confidential property of our clients, and authorization for publication of statements, conclusions, or extracts from our reports is reserved pending our written approval.

DISTRIBUTION

REPORT REQUESTING CERTIFICATION OF COMPLETION OF UPLAND CAP INSTALLATION FORMER UNITED HECKATHORN FACILITY RICHMOND, CALIFORNIA

SEPTEMBER 16, 1999

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