R. W. L. Investments, Inc. 4919 Tidewater Ave. Unit B. Oakland, CA 94601

Ph# 510 434-0175

RECEIVED

1:01 pm, Jan 26, 2009

Alameda County Environmental Health

January 19, 2009

Jerry Wickham Senior Hazardous Materials Specialist Alameda County Health Care Services Agency 1131 Harbor Bay Parkway, Ste.250 Alameda, CA 94502

Subject:

Letter of Transmittal for

Site Assessment Report

4919 Tidewater Avenue, Oakland, California

Case No. RO0000107

Dear Mr. Wickham,

On behalf of R. W. L. Investments, Inc., ETIC Engineering, Inc. prepared the Site Assessment Report dated January 19, 2009 for the above-referenced site.

I declare, under penalty of perjury, that the information and/or recommendations contained in the report is true and correct to the best of my knowledge.

If you have any questions or comments, please contact me at (510) 434-0175 or Maura Dougherty (extension 41) or Alan Anselmo (extension 19) of ETIC Engineering, Inc. at (925) 602-4710.

Sincerely,

R. W. L. Investments, Inc.

Bob Lawlor President



Site Assessment Report

Former DiSalvo Trucking 4919 Tidewater Avenue, Unit B Oakland, California 94601

Fuel Leak Case Number: RO0000107

January 2009

Prepared For:

R.W.L. Investments, Inc. 4919 Tidewater Avenue, Unit B Oakland, California 94601

Prepared By:

ETIC Engineering, Inc. 2285 Morello Avenue Pleasant Hill, California 94523



Site Assessment Report

Former DiSalvo Trucking 4919 Tidewater Avenue, Unit B Oakland, California 94601

Fuel Leak Case Number: RO0000107

January 2009

Prepared For:

R.W.L. Investments, Inc. 4919 Tidewater Avenue, Unit B Oakland, California 94601

Prepared By:

ETIC Engineering, Inc. 2285 Morello Avenue Pleasant Hill, California 94523

Nathan Diem Staff Geologist

Maura E. Dougherty, P.E.

Project Manager

January 23,2009
Date

Jenuary 23, 2009

allog /

TABLE OF CONTENTS

LIST (OF FIGURES	ii
LIST (OF TABLES	ii
LIST (OF APPENDIXES	ii
GENE	RAL INFORMATION	iii
1.0	INTRODUCTION	1
2.0 2.1 2.2 2.3 2.4	SITE BACKGROUND DESCRIPTION OF SITE LOCAL GEOLOGY AND HYDROGEOLOGY TOPOGRAPHY AND SURFACE WATER UST HISTORY	1 2 2
2.5 2.6 2.7	ENVIRONMENTAL INVESTIGATIONS (1989 THROUGH 2008) GROUNDWATER MONITORING (1994 THROUGH PRESENT) CURRENT SITE STATUS	6
3.0 3.1 3.2 3.3	SOIL AND GROUNDWATER INVESTIGATION BORING LOCATIONS DRILLING AND SAMPLING DISPOSAL OF INVESTIGATIVE-DERIVED WASTE	7 7
4.0 4.1 4.2 4.3	DATA EVALUATION	9 10
5.0	EVALUATION OF GROUNDWATER MONITORING WELL MW-1	11
6.0	SUMMARY AND CONCLUSIONS	11
7.0	REFERENCES	12

LIST OF FIGURES

Figure 1. Site Location and Topographic Map

Figure 2. Site Map

Figure 3. Site Map with Historical Sampling Locations

Figure 4. TPH-d Isoconcentration Contours for Shallow Groundwater

LIST OF TABLES

Table 1. Monitoring Well Construction Details

Table 2. Groundwater Elevation Data

Table 3. Analytical Data for Soil Samples

Table 4. Analytical Data for Grab Groundwater Samples

LIST OF APPENDIXES

Appendix A. Regulatory Correspondence

Appendix B. Drilling Permit

Appendix C. Boring Logs

Appendix D. Laboratory Analytical Reports and Chain-of-Custody Documentation

GENERAL INFORMATION

Site Location

Former DiSalvo Trucking 4919 Tidewater Avenue, Unit B Oakland, California 94601

Alameda County

Township 2 South, Range 3 West, Section 17 of the Mount Diablo Baseline and Meridian

Responsible Party

Bob Lawlor R.W.L. Investments, Inc. 4919 Tidewater Avenue, Unit B Oakland, California 94601

Environmental Consultant

ETIC Engineering, Inc. 2285 Morello Avenue Pleasant Hill, California 94523

Maura E. Dougherty Project Manager (925) 602-4710 ext. 41 mdougherty@eticeng.com

Regulatory Agency

Alameda County Health Care Services Agency 1131 Harbor Bay Parkway Suite 250 Alameda, California 94502-6577

Jerry Wickham Senior Hazardous Materials Specialist (510) 567-6791 jerry.wickham@acgov.org

1.0 INTRODUCTION

On behalf of R.W.L. Investments, Inc., ETIC Engineering, Inc. (ETIC) has prepared this *Site Assessment Report* for the former DiSalvo Trucking facility located at 4919 Tidewater Avenue in Oakland, California (the Site). ETIC conducted the activities in general accordance with the *Revised Remedial Action Plan (RAP)* dated July 15, 2008. The *Revised RAP* was approved by the Alameda Health Care Services Agency (ACHCSA) in their letter dated August 14, 2008 (ACHCSA, 2008b). The ACHCSA approval letter is included in Appendix A. Further clarification of the scope of work and reporting deadlines are documented in written correspondence between ETIC and ACHCSA and are included in Appendix A.

2.0 SITE BACKGROUND

2.1 DESCRIPTION OF SITE

The Site is located east of the San Francisco Bay in southwest Oakland, approximately 600 feet southeast of the Tidewater Avenue and Lesser Street intersection, on the southwest side of Tidewater Avenue (Figure 1). The Site is located in Section 17 of Township 2 South, Range 3 West. The Site is currently owned by R.W.L. Investments, Inc. and leased to Heitz Trucking.

The 3.61 acre property contains an approximately 11,800 square-foot concrete warehouse and loading dock terminal along the north side of the Site, an office trailer, and an approximately 2,770 square-foot truck repair shop and maintenance building along the south side of the Site (Figure 2). An aboveground fuel storage tank is located north of the maintenance building, and outside yard areas are located along the northwest side of the building and between the buildings.

The Site is listed as a fuel leak case and is overseen by ACHCSA.

2.2 LOCAL GEOLOGY AND HYDROGEOLOGY

Soil borings from previous onsite investigations indicate that the area beneath the Site was likely filled to create land and lift the surface roughly 5 feet above the high tide line (ART, 2007). The soil beneath the Site consists mostly of gravel and sand fill with concrete and asphalt debris (ART, 2007). The thickness of the fill material varies across the Site from about 1.5 feet thick near the southern corner to 4 to 5 feet along the northwestern property boundary to greater than 9 feet thick along Tidewater Avenue (ART, 2007). The fill is underlain by organic clay with thin interbeds of peat.

Groundwater flow direction in the area of the Site is toward the San Francisco Bay and has ranged from approximately west to south-southwest. Historically, depths to groundwater measured in monitoring wells at the Site have ranged from 1.14 to 3.88 feet below ground surface (bgs). The hydraulic gradient has historically ranged from 0.0002 to 0.008 foot-per-foot.

Groundwater gauging data measured from observation wells in the vicinity of MW-2 has been evaluated for the presence of a vertical hydraulic gradient. Well OB-5 is the only observation well screened within the clay formation between 10 and 15 feet bgs. Wells OB-3, OB-4, and OB-6 are screened within the shallower fill material between 2 and 10 feet bgs. During the June 2008 groundwater monitoring event, observation well OB-5 had the deepest depth to groundwater measurement (11.00 feet bgs) while measurements in wells OB-3, OB-4, and OB-6 ranged from 2.60 to 2.87 feet bgs (ETIC, 2008b). Although groundwater elevations for the observation wells cannot be calculated until the top of well casing elevations are surveyed, well construction and gauging data support the possibility of a downward, vertical hydraulic gradient at the Site.

Monitoring well construction details are presented in Table 1. Historical groundwater elevation data are presented in Table 2.

2.3 TOPOGRAPHY AND SURFACE WATER

The land surface in the area of the Site generally slopes down to the west toward San Francisco Bay. The Site property is relatively flat with little topographic change. The elevation of the Site is approximately 5 feet above mean sea level (msl).

The San Leandro Bay is located approximately 200 feet to the south of the Site. San Leandro Bay is connected to San Francisco Bay and the Oakland Estuary. Lake Merritt is a tidal lagoon located 5.7 miles northwest of the Site. The salt/freshwater lake covers an area of approximately 155 acres and the primary uses are recreation and aesthetics.

2.4 UST HISTORY

One 10,000-gallon diesel underground storage tank (UST), one 5,000-gallon diesel UST, and one 280-gallon used-oil UST were operated at the Site until their removal in March 1989 (GET, 1989a). The USTs were reportedly installed in 1968 with a remote dispenser system (GET, 1989b). The remote dispenser system consisted of four remote hydrants in two separate lines, one on the north side and one on the south side of the trucking terminal building. Two pressurized single-wall 2-inch diameter galvanized steel lines were connected to a red jacket pump located on the 10,000-gallon diesel UST. One 2-inch diameter product line crossed underneath the trucking terminal building and connected to the first remote hydrant on the north side of the building and the second 2-inch product line connected to the first remote hydrant on the south side of the building, adjacent to the USTs. A 1-½-inch diameter galvanized steel line connected the first hydrant to the second remote hydrant in each line. The hydrant lines were located approximately 2 feet bgs (GET, 1989b).

In March 1989, the three USTs, fill lines, and the southern remote hydrant dispenser lines were removed. Two areas of corrosion were visible when the hydrant line was removed (GET,

connected to the first remote hydrant on the north side of the building and the second 2-inch product line connected to the first remote hydrant on the south side of the building, adjacent to the USTs. A 1-½-inch diameter galvanized steel line connected the first hydrant to the second remote hydrant in each line. The hydrant lines were located approximately 2 feet bgs (GET, 1989b).

In March 1989, the three USTs, fill lines, and the southern remote hydrant dispenser lines were removed. Two areas of corrosion were visible when the hydrant line was removed (GET, 1989b). During removal activities a 550-gallon UST was discovered and also removed. Visual inspection identified two holes in the 550-gallon UST. In addition, a 10-inch diameter pipeline crossing the excavation was discovered. The pipe was broken during excavation activities and "diesel-like fuel" drained into the UST excavation (GTE, 1994a). The pipe was cut, the middle section was removed, and the ends were capped at the limits of the excavation (GTE, 1994a).

Petroleum hydrocarbons were detected at concentrations up to 240 milligrams per kilogram (mg/kg) in soil samples collected from the UST excavation. Diesel-impacted groundwater was observed flowing into the open UST excavation from the northeastern corner. The liquid-phase hydrocarbons (LPH) and contaminated groundwater were pumped from the excavation pit for disposal. In April 1989, a recovery well and recovery trench were installed from which an estimated 2,400 gallons of diesel fuel and 20,000 gallons of contaminated groundwater were recovered between April and August 1989 (GTE, 1991).

Approximately 3,000 cubic yards of excavated soil was stockpiled and treated onsite by enhanced biodegradation in 1990 (GTE, 1991). The stockpile was located adjacent to the excavation area. Soil was sampled and remediated under supervision of ACHCSA (GTE, 1994b). Confirmation soil sample results are included in the 1994 letter from Gen-Tech Environmental (GTE) to the ACHCSA (GTE, 1994b). Based on the results of confirmation samples collected on May 21, 1990, "some of the treated soil was used to fill pot holes and depressions onsite, and the remainder was moved to the front of the property (bordering Tidewater Avenue) and used for a planter berm" (GTE, 1994b). According to property owner Mr. Bob Lawlor, during a telephone conversation on July 2, 2008, the stockpiled material remains at the Site (Lawlor, 2008a). The stockpile was noted as the "debris pile" in the Murray Engineers, Inc. report (Murray) (Murray, 2006).

2.5 ENVIRONMENTAL INVESTIGATIONS (1989 THROUGH 2008)

Subsurface investigations were performed at the Site from 1989 to 2008. Historical groundwater monitoring well, soil, and grab groundwater sampling locations are presented on Figure 3. These investigations confirmed the presence of diesel- and gasoline-impacted soil and groundwater beneath the Site and identified LPH at various

locations including in monitoring wells MW-2 and MW-3. Total petroleum hydrocarbons in the diesel range (TPH-d), total petroleum hydrocarbons in the gasoline range (TPH-g), benzene, toluene, ethylbenzene, and xylenes (BTEX), and fuel oxygenate methyl tertiary butyl ether (MTBE) have been detected in groundwater samples collected at the Site.

In May 1989, Geo-Environmental Technology (GET) performed a shallow soil investigation at the Site in which 11 soil samples and one groundwater sample were collected from 22 shallow soil borings (BH-1 through BH-22). Samples were not collected from borings with obvious petroleum impacts (GET, 1989b). Soil sampling confirmed the presence of diesel-impacted soil in the area of the former UST excavation and along the former fuel dispenser hydrant line extending from the former USTs to the northeast. The maximum TPH-d concentration (46,000 mg/kg) was detected in a soil sample collected at 5 feet bgs from boring BH-11, located approximately 10 feet west of the former UST excavation (GET, 1989b). Oil and grease was detected in this same sample at a concentration of 27,000 mg/kg.

In an April 1994 soil and groundwater investigation, GTE drilled 14 borings (EB-1 through EB-11 and MW-1 through MW-3), collected soil and groundwater samples, and installed three groundwater monitoring wells (MW-1 through MW-3) (GTE, 1994c). The maximum concentrations of TPH-d (29,000 mg/kg) and oil and grease (36,000 mg/kg) in soil were detected in samples from boring MW-2. The maximum concentrations of TPH-d detected during grab groundwater sampling were 64,000 micrograms per liter (µg/L) from boring EB-2 and 73,000 µg/L from boring EW-4. Groundwater monitoring well sampling conducted on April 14, 1994 indicated LPH in monitoring well MW-2 and elevated concentrations of TPH-d and TPH-g (7,700 µg/L and 250 µg/L, respectively) in well MW-3 (GTE, 1994c).

In July 1995, Environmental Restoration Services (Enrest) drilled two soil borings and installed monitoring well MW-4 (ART, 2007). MW-4 was installed on the northern side of the terminal building. TPH-g (250 μ g/L) and low concentrations of BTEX were detected in the August 1995 groundwater sample from MW-4.

PIERS Environmental (PIERS) drilled 16 soil borings (SB-1 through SB-16) during a soil and groundwater investigation in December 2000. Eight soil samples between 6 and 7 feet bgs and 16 grab groundwater samples were collected and analyzed for TPH-d. The only TPH-d detection in soil was 14 mg/kg in a sample collected from SB-16 at 6.5 feet bgs. The maximum TPH-d concentration in groundwater was 670,000 μ g/L (SB-10) (PIERS, 2000). PIERS identified two main areas of TPH-d impacted soil: 1) located in the area of the former UST excavation and 2) from the northeast end of the recovery trench to the area of MW-2. TPH-d concentrations in groundwater along the northwestern property boundary were 44,000 μ g/L (SB-14) and 48,000 μ g/L (SB-15) and

PIERS concluded that the groundwater contamination plume extended offsite to the northwest (PIERS, 2000).

In February and April 2006, ERAS Environmental (ERAS) conducted additional subsurface investigations to further delineate vertical and lateral extents of diesel impacts in soil and groundwater at the Site (ERAS, 2006). In February 2006, ERAS collected soil and groundwater samples from soil borings B-1 through B-9 for TPH-d analysis and Murray collected soil samples from borings B-6 through B-9 for geotechnical analysis (named B-1 through B-4 for the Murray report). In April 2006, an 8-inch dewatering well (EW-1) and four observation wells (OB-3 through OB-6) were installed and soil and groundwater samples were collected from borings B-10 through B-15. No LPH was encountered during these investigations. The maximum detection of TPH-d in soil was 5,400 mg/kg collected from B-9 at 4.5 feet bgs, located adjacent to the southwestern corner of the former UST excavation. The maximum concentration of TPH-d in groundwater was 2,500,000 μg/L collected from B-12 located northwest of the former UST excavation (ERAS, 2006).

Geotechnical results were reported by Murray in an April 2006 Limited Geotechnical Evaluation Contaminated Soil Replacement Report. The report summarized the subsurface geology and provided shoring design parameters for potential excavation activities at the Site.

Applied Remedial Technologies, Inc. (ART) conducted a groundwater aquifer test and construction dewatering analysis. ART performed both a step drawdown pumping test and a constant-rate aquifer test at well EW-1. Pumping from EW-1 (screened across the fill material and approximately three feet into the clay unit underlying the fill material) resulted in drawdown in all observation wells screened in fill material. No drawdown was observed in well OB-5, which was screened in the clay unit, located approximately seven feet from EW-1 (ART, 2006).

In February 2007, ART prepared a *Feasibility Study Report* to address the removal of petroleum hydrocarbons from the Site subsurface. Based on the feasibility evaluation of remedial alternatives, ART recommended groundwater extraction and treatment with limited source area remediation.

In their May 29, 2007 letter, the ACHCSA requested the preparation of a RAP for the Site. In accordance with this request, ETIC submitted the RAP dated September 14, 2007 (ETIC, 2007). The RAP included a description of how the affected soil area would be precisely determined and how remedial alternatives other than excavation would be evaluated.

ACHCSA responded to the RAP with a letter dated May 1, 2008. The letter concurred with ETIC's proposal to perform a geophysical survey at the Site with the purpose of

locating existing utilities, utility trenches that act as preferential pathways, and abandoned, underground piping. The ACHCSA also included several technical comments which they requested be addressed in a revised RAP.

A geophysical survey was conducted at the Site on June 3, 2008 by NORCAL Geophysical Consultants, Inc. The survey identified multiple utility lines on the north and south side of the trucking terminal building. Several lines were identified as known utilities including sanitary sewer and electrical. Other lines were potentially identified as former fuel lines or fuel hydrant piping. All detected lines, including unidentified and undifferentiated lines were presented in the *Revised RAP*.

A Revised RAP was prepared and submitted to ACHCSA on July 15, 2008. The Revised RAP included a summary of the geophysical survey and addressed the ACHCSA's comments in their May 1, 2008 letter (ACHCSA, 2008a). ACHCSA approved the Revised RAP in their August 14, 2008 letter (ACHCSA, 2008b).

2.6 GROUNDWATER MONITORING (1994 THROUGH PRESENT)

Groundwater monitoring has been conducted at the Site intermittently since April 1994. Two monitoring wells, MW-2 and MW-3, historically have had LPH, which was removed by bailing. Groundwater flow direction has generally flowed from approximately west to south-southwest with a relatively shallow gradient. The second semi-annual 2008 groundwater sampling event took place in December 2008.

2.7 CURRENT SITE STATUS

The August 14, 2008 letter from ACHCSA approved the *Revised RAP* with three technical comments. ACHCSA requested that the boring located along the northern property boundary (originally C-8) be removed from the scope of work. ACHCSA also requested the addition of three borings along the shoreline area to investigate groundwater discharge to surface water. Per September 16, 2008 e-mail correspondence, an additional boring along the southern property boundary (C-16) was added to the scope of work to aid in the delineation of groundwater along the downgradient property boundary and in lieu of sampling at the shoreline (ACHCSA, 2008c). This correspondence is included in Appendix A.

The ACHCSA approval letter also requested that a recommendation for the evaluation of MW-1 be presented in the *Site Assessment Report*. In recent groundwater sampling events, monitoring well MW-1 has dewatered after the purging of one gallon. A discussion of MW-1 is presented in Section 5.0 of this report.

This report has been prepared in accordance with the ACHCSA August 14, 2008 letter. Section 3.0 presents a description of activities associated with the soil and groundwater

investigation. Section 4.0 includes an evaluation of both hydrogeologic and laboratory analytical data from the investigation. Section 5.0 presents an evaluation of well MW-1.

3.0 SOIL AND GROUNDWATER INVESTIGATION

The results of previous soil and groundwater investigations performed indicated that additional characterization of the extent of contamination was needed. Additional information was needed to delineate the vertical and lateral extent of TPH-d contamination in the area of the former UST excavation, the former fuel hydrant lines on the northern and southern sides of the building, in the area of MW-2, and along the perimeter of the property. Soil and shallow groundwater samples were collected from 16 borings to further characterize petroleum hydrocarbon contamination in the targeted areas. Soil and groundwater sampling activities took place on September 24 and 25, 2008.

3.1 BORING LOCATIONS

The September 2008 boring locations (C-1 through C-16) are shown on Figure 3. Boring locations C-1, C-2, C-3, and C-4 were located in the northeastern portion of the Site and were chosen to delineate the upgradient extent of the plume. Borings C-5 and C-8 were located in the area northwest of the trucking terminal building and were placed adjacent to the former fuel hydrant dispenser line identified during the geophysical survey and confirmed by Bob Lawlor. Borings C-6, C-7, C-9, and C-10 were located within and near the central area of the Site, near the recovery trench. These locations were placed adjacent to utility lines detected in the geophysical survey. Boring C-12 was placed downgradient of the former UST excavation. Borings C-11, C-13, C-14, C-15, and C-16 were located along the downgradient property boundary of the Site.

3.2 DRILLING AND SAMPLING

A drilling permit was obtained from ACHCSA. The permit is included in Appendix B. A site-specific health and safety plan was prepared and implemented during drilling and sampling activities. Prior to drilling activities, the proposed soil boring locations were marked and checked for the presence of underground utilities by Underground Service Alert. Subdynamic Locating Service, Inc., a private utility-locating contractor, was also hired to check for the presence of underground utilities.

Drilling was performed by Environmental Control Associates, Inc., C57-licensed contractor, using a direct-push Geoprobe 5410 or 6600 rig equipped with a 1.25-inch diameter dual-tube sampling system. Drilling equipment and sampling tools were decontaminated prior to beginning the field program. Reusable sampling equipment was

thoroughly washed with a Liqui-Nox solution, rinsed with tap water, and then rinsed with distilled water prior to each use.

Each boring location was cleared with a hand auger to an approximate depth of 2 feet bgs. A slide hammer was then used to collect an initial soil sample between 2 and 2.5 feet bgs. The borings were then advanced with the drilling rig until first groundwater was encountered while continuously logging soil lithology. One groundwater sample was collected from the shallow aquifer at each location. Once a shallow groundwater sample was collected, borings C-1, C-7, and C-12 were advanced to an approximate depth of 30 feet bgs and the remaining borings except C-15 were advanced to approximately 20 feet bgs, while continuously logging soil lithology. C-15 was terminated at 24 feet bgs due to flowing sands. In borings C-1, C-7, and C-12 groundwater was also encountered below 10 feet bgs, and a second groundwater sample was collected by hydropunch from a new boring drilled a few feet from original boring.

An ETIC geologist supervised drilling and sampling activities. Soil was examined for lithologic identification and visible signs of contamination in accordance with the Unified Soil Classification System and the Standard Practice for Description and Identification of Soils (Visual-Manual Procedure), American Society for Testing and Materials (ASTM) Designation D2488 (ASTM 2000), and the observations were recorded in the field logs. Copies of the boring logs are included in Appendix C. Technical guidance was provided by a California Professional Engineer.

A photoionization detector was used to monitor for organic vapors. Measurements of headspace vapors from soil samples were recorded on the boring logs.

In addition to the initial soil samples that were collected at 2 or 2.5 feet bgs, soil samples were also generally collected at 5-foot intervals and where petroleum hydrocarbon impacts were evident. The samples were cut directly from the acetate direct-push liners, sealed with plastic end caps, labeled, stored on ice in a thermally-insulated cooler, and then transported under chain-of-custody protocol to KIFF Analytical LLC (KIFF), a state-certified analytical laboratory. Groundwater samples were collected from 15 of the 16 boring locations using a peristaltic pump and temporary PVC casing screened across the groundwater level. LPH was detected in groundwater in C-9 and therefore no sample was collected for laboratory analysis for this location. The samples were collected in clean 40-milliter, hydrochloric-acid-preserved, volatile organic analysis vials supplied by the analytical laboratory. The sample containers were sealed, labeled, stored on ice in a thermally-insulated cooler, and then transported under chain-of-custody protocol to KIFF. Soil and groundwater samples were analyzed for TPH-d by EPA Method 8015M with silica gel cleanup and BTEX by EPA Method 8260B.

The completed borings were filled and sealed with a grout mixture consisting of neat cement, in accordance with ACHCSA and Department of Water Resources requirements.

3.3 DISPOSAL OF INVESTIGATIVE-DERIVED WASTE

Soil and water derived from the subsurface investigation were contained in drums and stored temporarily at the Site. A composite soil sample and a water sample were collected and submitted for laboratory analyses including BTEX, TPH-g, and volatile organic compounds by EPA Method 8260B, TPH-d with silica gel cleanup by EPA Method 8015M, and total lead by EPA Method 6010. Waste will be profiled and delivered to an approved disposal facility.

4.0 DATA EVALUATION

4.1 HYDROGEOLOGIC DATA

Groundwater flow direction at the Site is generally toward the San Francisco Bay and historically has ranged from approximately west to south-southwest. Historically, depths to groundwater measured in monitoring wells at the Site have ranged from 1.14 to 3.88 feet bgs. The hydraulic gradient has historically ranged from 0.0002 to 0.008 foot-per-foot.

Soil encountered during subsurface investigations at the Site consisted of clay, silt, sand, and gravel. A sand and gravel layer, varying from approximately one to five feet thick, was encountered directly beneath the asphalt throughout most of the Site. Groundwater was initially detected within this sand and gravel layer, at approximately three to five feet bgs, in some of the borings. Between approximately four to eight feet bgs, alternating lenses of silt, silty sand, and sandy silt were encountered. Sand and gravel is noted to extend to approximately 11 to 12 feet bgs within the former UST excavation. presence of visible product and a strong petroleum hydrocarbon odor was noted from approximately five to seven feet bgs during the sampling and logging of boring C-9, drilled within the former UST excavation. A predominantly sand layer, located between approximately three and eight feet bgs, exists near the geographic center of the Site, in the area of boring C-7. The sand is loose, moist, and had a petroleum hydrocarbon odor. Clay is predominantly encountered between the approximate depths of seven to 19 feet bgs throughout most of the Site. Below the clay, sand with varying amounts of silt and/or clay has been deposited until approximately 29 feet bgs, which is underlain by clay and clayey silt. Second groundwater was encountered in the deeper borings at approximately 20 feet bgs.

4.2 ANALYTICAL DATA FOR SOIL

A total of 83 soil samples were collected from soil borings C-1 through C-16 for laboratory analyses. The samples were analyzed for TPH-d and BTEX. Analytical data for soil samples collected during this investigation are presented in Table 3. Laboratory analytical reports and chain-of-custody documentation are included in Appendix D.

TPH-d was detected in 74 soil samples. Concentrations ranged from 1.3 mg/kg in C-15 at 24 feet bgs to 3,500 mg/kg C-7 at 5 feet bgs. In a December 28, 2005 letter, ACHCSA conditionally approved a cleanup goal of 500 mg/kg for TPH-d in soil. Only seven samples collected from C-1, C-6, C-7, C-9, C-12, and C-16 between two and six feet bgs had concentrations of TPH-d which exceeded this cleanup goal.

Benzene was detected in one of the 83 samples at a concentration of 0.014 mg/kg in boring C-8 at 2.5 feet bgs. The corresponding ESL for benzene is 0.044 mg/kg where groundwater is a current or potential source of drinking water. Where groundwater is not a current or potential source of drinking water, the residential ESL is 0.12 mg/kg and the commercial/industrial ESL is 0.27 mg/kg. Toluene was detected in two samples at concentrations of 0.0061 mg/kg in boring C-7 at five feet bgs and 0.0082 mg/kg in boring C-2 at 5 feet bgs. The corresponding residential and commercial/industrial ESL for toluene is 2.9 mg/kg where groundwater is a current or potential source of drinking water, and 9.3 mg/kg where it is not. Ethylbenzene was detected in one sample at a concentration of 0.015 mg/kg in boring C-8 at a depth of 2.5 feet bgs. The corresponding residential ESL for ethylbenzene is 2.3 mg/kg and the commercial/industrial ESL for ethylbenzene is 3.3 mg/kg where groundwater is a current or potential source of drinking water. Where groundwater is not a current or potential source of drinking water, the residential ESL is 2.3 mg/kg and the commercial/industrial ESL is 4.7 mg/kg. Xylenes were detected in four samples at concentrations ranging from 0.0058 mg/kg in boring C-12 at 2.5 feet bgs to 0.066 mg/kg in boring C-8 at a depth of 2.5 feet bgs. The corresponding residential and commercial/industrial ESL for total xylenes is 2.3 mg/kg where groundwater is a current or potential source of drinking water, and 11 mg/kg where it is not.

4.3 ANALYTICAL DATA FOR GROUNDWATER

A total of 18 grab groundwater samples were collected during the September 2008 soil and groundwater investigation. The samples were analyzed for TPH-d and BTEX. LPH was detected in the groundwater from boring C-9 and as a result, a sample was not collected from this location for laboratory analysis.

Analytical data for the grab groundwater samples are presented in Table 4. Laboratory analytical reports and chain-of-custody documentation are included in Appendix D. Isoconcentration contours for TPH-d in shallow groundwater using current data are presented on Figure 4.

TPH-d was detected in 13 of the 18 samples, at concentrations ranging from 74 μ g/L in C-5 to 26,000 μ g/L in C-6. TPH-d was not detected in the northeastern portion of the Site (C-1, C-2, and C-4). In the ACHCSA December 28, 2005 letter, a cleanup goal for TPH-d in groundwater of 640 μ g/L was approved. Five groundwater samples had concentrations of TPH-d above the cleanup goal. All five samples were collected at depths less than 10 feet bgs. Three of these samples were collected in the vicinity of the recovery trench (C-6, C-7, and C-10) and two of these samples were collected along the southern property boundary, downgradient of the former UST excavation (C-15 and C-16). Nine groundwater samples were collected below 10 feet bgs. TPH-d was detected in four of the nine samples. The maximum detection in groundwater below 10 feet bgs was 640 μ g/L in C-8. BTEX was not detected in any of the groundwater samples collected.

5.0 EVALUATION OF MONITORING WELL MW-1

In order to address the ACHCSA's comment in their August 14, 2008 letter regarding groundwater monitoring well MW-1, ETIC evaluated the well's ability to provide representative groundwater samples. MW-1 was constructed with a screened interval of three to eight feet bgs. Although the well dewaters after one gallon during purging, it does recover enough to allow for the collection of a groundwater sample. It is believed that this well does provide a representative sample for the conditions of groundwater in the vicinity of the well.

6.0 SUMMARY AND CONCLUSIONS

In accordance with the *Revised RAP*, a soil and groundwater investigation was performed at the Site in September 2008. Sixteen borings were drilled up- and downgradient of the former UST excavation, adjacent to former hydrant dispenser lines, and along the property boundary for the collection of soil and groundwater samples.

Soil encountered in the 16 borings consisted of clay, silt, sand, and gravel. Sampling confirmed the presence of petroleum hydrocarbons. The highest concentrations of TPH-d were detected in soil samples collected between two and six feet bgs. Seven soil samples had TPH-d concentrations higher than the cleanup goal of 500 mg/kg.

Grab groundwater samples were also collected during this investigation. LPH was detected in groundwater in the boring in the northern portion of the former UST excavation (C-9). The highest concentrations of TPH-d were found in samples collected near the recovery trench and downgradient of the former UST excavation. Five samples had TPH-d concentrations higher than the cleanup goal of 640 µg/L.

In the *Revised RAP*, ETIC proposed the installation of an additional groundwater monitoring well in the northern corner of the Site. The proposed well was to target the fill material in the northern corner of the Site and to delineate the lateral extent of groundwater contamination at the Site. However, TPH-d was not detected in groundwater samples collected from borings in the northeastern portion of the Site (C-1, C-2, and C-4) during the September 2008 investigation. Per the November 3, 2008 e-mail correspondence, the ACHCSA approved ETIC's request to eliminate the well installation activities based on the results of the September 2008 investigation (ACHCSA, 2008d). This correspondence is included in Appendix A.

In summary, the soil and groundwater investigation confirmed the presence of TPH-d in the shallow soil and shallow groundwater (above 10 feet bgs) beneath the site.

7.0 REFERENCES

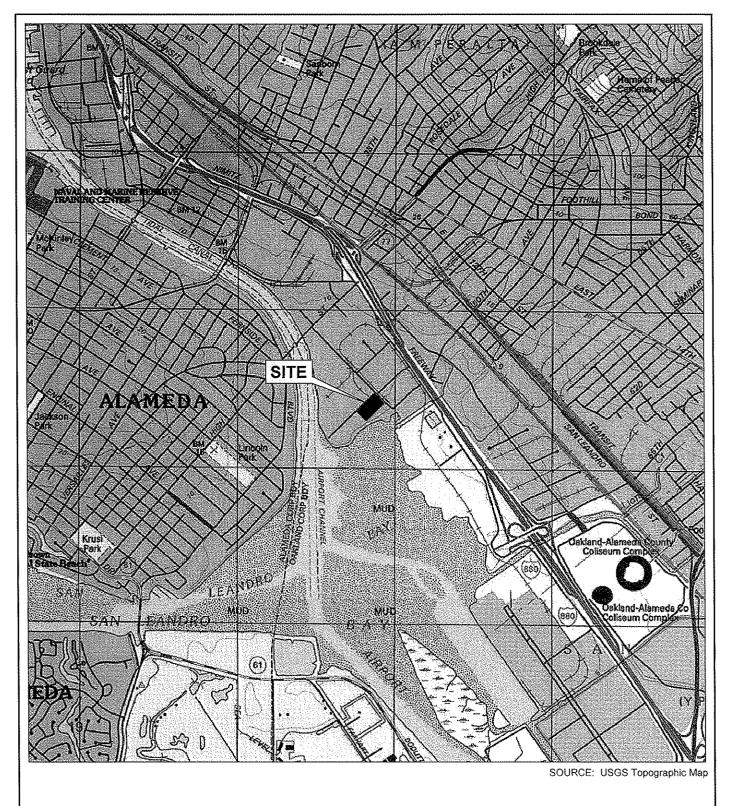
- ACHCSA, 2008a. Letter: Fuel Leak Case No. RO0000107 & Global ID T0600100451, DiSalvo Trucking, 4919 Tidewater Ave., Oakland 94601. May 1.
- ACHCSA, 2008b. Letter Re: Fuel Leak Case No. RO0000107 & Global ID T0600100451, DiSalvo Trucking, 4919 Tidewater Ave., Oakland 94601. August 14.
- ACHCSA, 2008c. E-mail: 4919 Tidewater Ave., Oakland 94601. September 16.
- ACHCSA, 2008d. E-mail: 4919 Tidewater Ave., Oakland 94601. November 3
- Applied Remedial Technologies, Inc. (ART), 2006. Aquifer Testing & Dewatering Analysis, Heitz Trucking, 4919 Tidewater Avenue, Unit B, Oakland, California. May 25.
- ART, 2007. Feasibility Study Report, Heitz Trucking, 4919 Tidewater Avenue, Unit B, Oakland, California. February 26.
- ERAS Environmental, Inc. (ERAS), 2005. Technical Summary, Groundwater monitoring Report for Quarter 3 2005, and Work Plan for Feasibility Study/Remedial Investigation, 4919 Tidewater Avenue, Oakland, California. November 7.

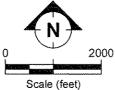
- ERAS, 2006. Report of Environmental Investigations, 4919 Tidewater Avenue, Oakland, California. May 12.
- ETIC, 2007. Remedial Action Plan, Heitz Trucking, 4919 Tidewater Avenue, Unit B, Oakland, California 94601. Fuel Leak Case Number: RO0000107. September 14.
- ETIC Engineering, Inc. (ETIC), 2008a. Revised Remedial Action Plan, Heitz Trucking, 4919 Tidewater Avenue, Unit B, Oakland, California 94601. July 15.
- ETIC Engineering, Inc. (ETIC), 2008b. Semi-annual Groundwater Monitoring Report Second Quarter 2008, Former DiSalvo Trucking, 4919 Tidewater Avenue, Unit B, Oakland, California 94601. Fuel Leak Case Number: RO0000107. July 24.
- Geo-Environmental Technology (GET), 1989a. Letter Re: Underground Tank Removal, 4919 Tidewater Ave., Oakland, California 94612. April 27.
- GET, 1989b. Technical Report Preliminary Investigation, DiSalvo Trucking, 4919 Tidewater Avenue, Oakland, California. June 15.
- Gen-Tech Environmental (GTE), 1991. Contaminated Site Interim Report and Technical Work Plan for Migration Control, 4919 Tidewater Ave., Oakland, CA 94612. March 12.
- GTE, 1994a. Summary Report of Previous Site Activity for DiSalvo Trucking, 4919 Tidewater Avenue, Oakland, California. March 24.
- GTE, 1994b. Letter Re: Supplemental Technical Report Letter on Bioremediation of Contaminated Soils and Trench Installation for the Di Salvo Trucking Facility at 4919 Tidewater Ave., Oakland, CA 94601. July 12.
- GTE, 1994c. Soil and Groundwater Investigation Site at 4919 Tidewater Avenue, Oakland, CA. May 17.
- Lawlor, 2008a. Telephone conversation discussing the remains of excavated, stockpiled soil. July 2.
- Lawlor, Bob (Lawlor), 2008b. Conversation discussing the identity of mapped, undifferentiated utility lines. June 26.
- Murray Engineers, Inc. (Murray), 2006. Limited Geotechnical Evaluation, Contaminated Soil Replacement, 4919 Tidewater Avenue, Oakland, California. April.

NORCAL Geophysical Consultants, Inc. (NORCAL), 2008. Letter Re: Geophysical Survey Heitz Trucking Facility, Oakland, CA NORCAL Job# 08-554.05. June 20.

PIERS Environmental (PIERS), 2000. Investigative Report. December 27.



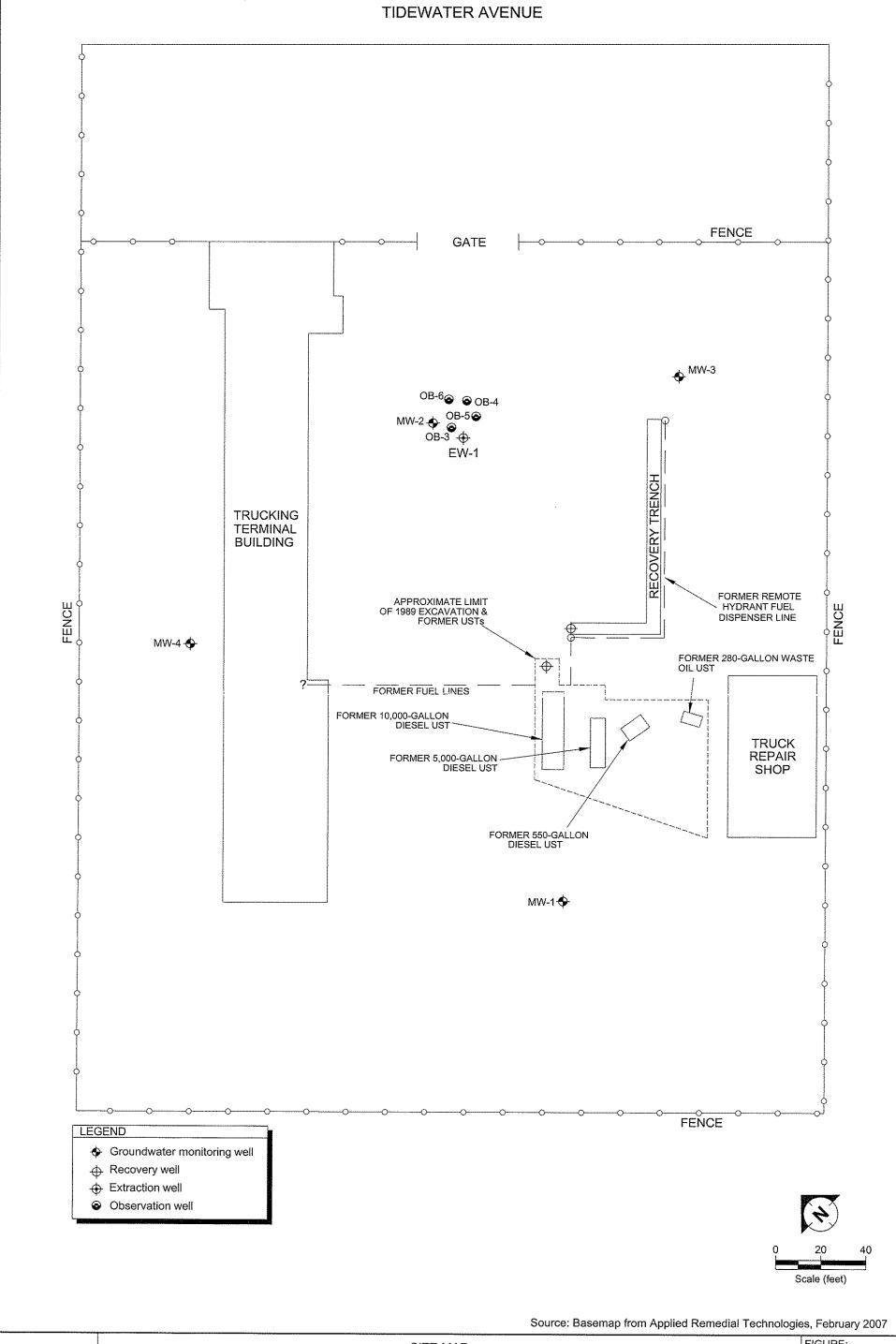




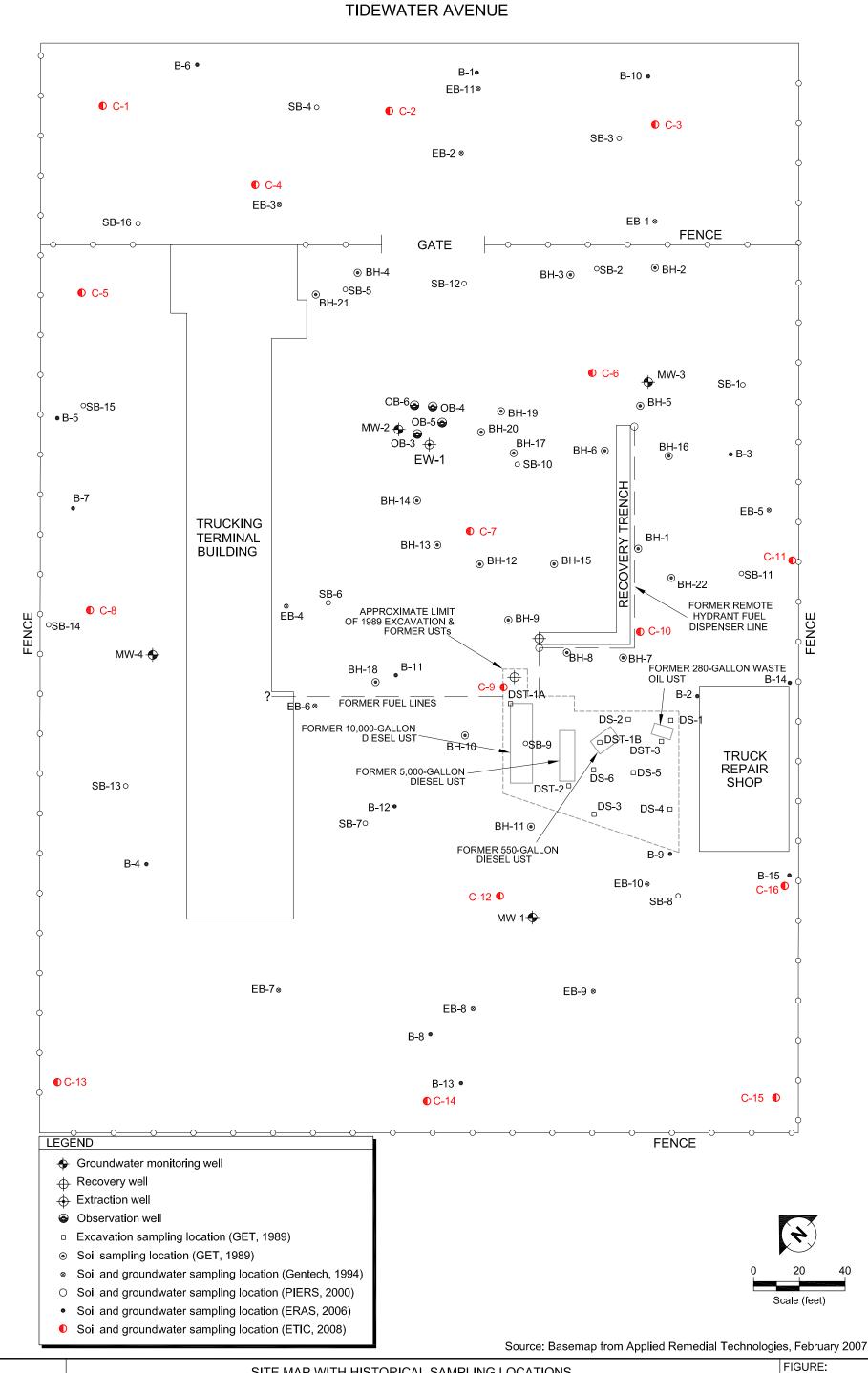
ETIC ENGINEERING

SITE LOCATION AND TOPOGRAPHIC MAP FORMER DISALVO TRUCKING 4919 TIDEWATER AVENUE OAKLAND, CALIFORNIA FIGURE:

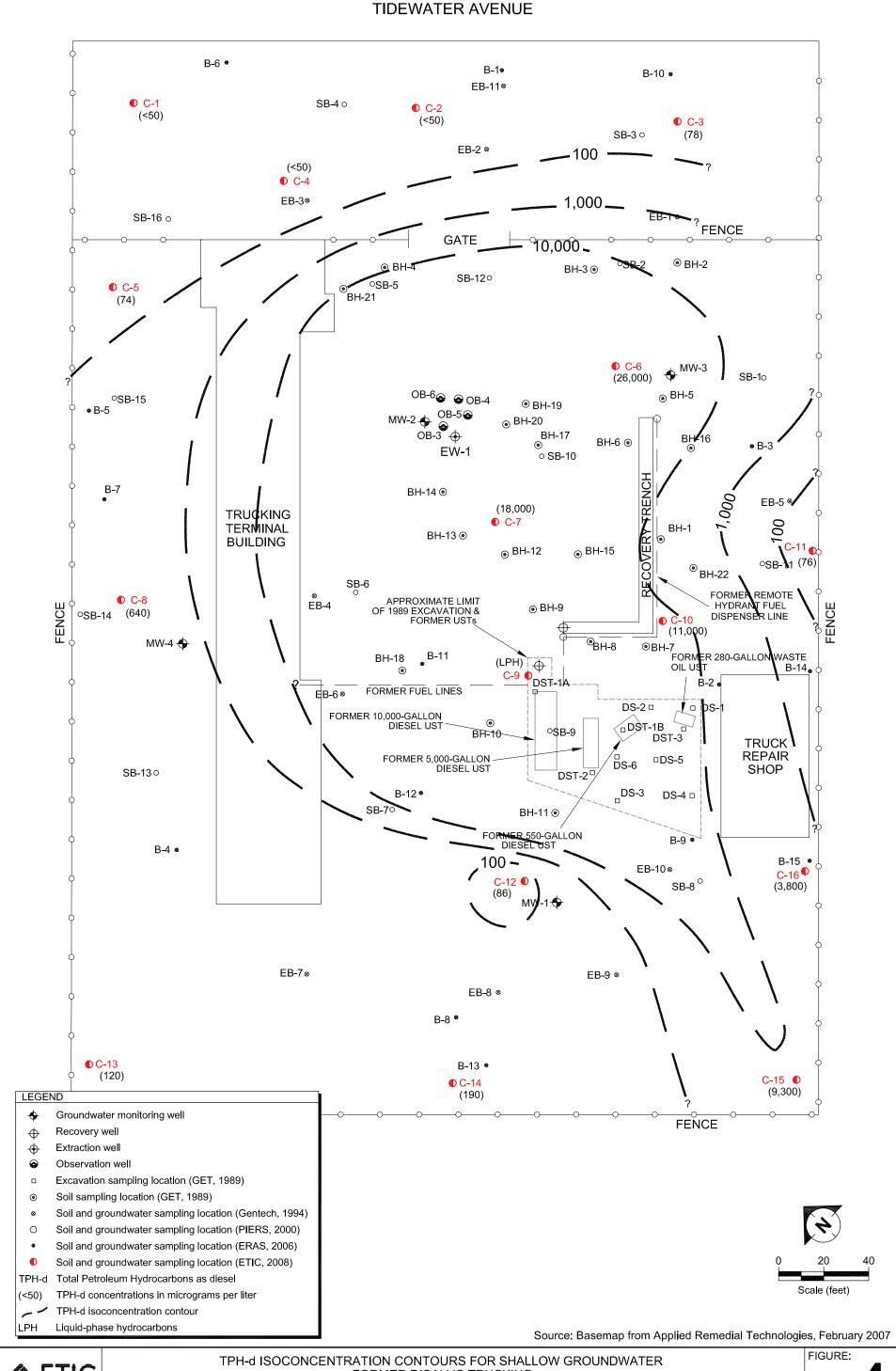
1



SAMPLE0807.DWG 08/17/07



08/11/02



Tables

Table 1 Monitoring Well Construction Details Former DiSalvo Trucking 4919 Tidewater Avenue Oakland, California 94601

Monitoring Well	Date Installed	Top of Casing Elevation (feet msl)	Casing Material	Boring Depth (feet)	Well Depth (feet)	Boring Diameter (inches)	Casing Diameter (inches)	Slot Size (inches)	Screened Interval (feet)	Filter Pack Interval (feet)	Filter Pack Material
MW-1	4/8/1994		Sch. 40 PVC	8	8	NDA	2	0.020	3-8	2.5-8	#2/12 Sand
TAT AA - 1	4/0/1994	2.68	SCII. 40 F V C	0	0	NDA	<u> </u>	0.020	3-0	2.3-0	#2/12 Salia
MW-2	4/8/1994	3.50	Sch. 40 PVC	8	8	NDA	2	0.02	3-8	2.5-8	#2/12 Sand
MW-3	4/8/1994	2.90	Sch. 40 PVC	8	8	NDA	2	0.020	3-8	2.5-8	#2/12 Sand
MW-4	7/19/1995	3.87	Sch. 40 PVC	8	8	NDA	2	0.020	3-8	2.5-8	#2/12 Sand
OB-3	4/7/2006	NDA	Sch. 40 PVC	8	8	8	2	0.020	2-7	1.5-7	#2/12 Sand
OB-4	4/7/2006	NDA	Sch. 40 PVC	NDA	10	8	2	0.020	2.5-10	2-10	#2/12 Sand
OB-5	4/7/2006	NDA	Sch. 40 PVC	NDA	15	NDA	2	0.020	10-15	8.5-15	#2/12 Sand
ОВ-6	4/7/2006	NDA	Sch. 40 PVC	NDA	7.5	8	2	0.020	2-6.5	1-6.5	#2/12 Sand
EW-1	4/14/2006	NDA	Sch. 40 PVC	11.5	11.5	36	12	0.032	NDA	NDA	#2/12 Sand-1/4" gravel mix

Notes:

Sch. 40 PVC = Schedule 40 polyvinyl chloride.

msl = Mean sea level.

NDA = No data available.

Table 2 Groundwater Elevation Data Former DiSalvo Trucking 4919 Tidewater Avenue Oakland, California 94601

Monitoring Well	Gauging Date	Top of Casing Elevation (feet msl)	Depth to Water (feet bgs)	Free Product Thickness (feet)	Groundwater Elevation (feet msl)
MW-1	4/14/1994	2.68	1.26	0.00	1.42
MW-1	11/17/1994	2.68	3.88	0.00	-1.20
MW-1	8/13/1995	2.68	3.09	0.00	-0.41
MW-1	8/23/1999	2.68	2.17	0.00	0.51
MW-1	5/26/1999	2.68	2.29	0.00	0.39
MW-1	4/26/2001	2.68	1.14	0.00	1.54
MW-1	9/5/2002	2.68	2.15	0.00	0.53
MW-1	8/18/2005	2.68	2.54	0.00	0.14
MW-1	8/19/2005	2.68	6.10	0.00	-3.42
MW-1	1/25/2006	2.68	2.02	0.00	0.66
MW-1	5/9/2006	2.68	0.30	0.00	2.38
MW-1	7/12/2006	2.68	1.81	0.00	0.87
MW-1	6/27/2007	2.68	1.82	0.00	0.86
MW-1	11/26/2007	2.68	3.80	0.00	-1.12
MW-1	6/9/2008	2.68	1.78	0.00	0.90
MW-1	12/11/2008	2.68	4.03	0.00	-1.35
MW-2	4/14/1994	3.50	1.92	0.00	1.58
MW-2	11/18/1994	3.50	1.78	0.00	1.72
MW-2	8/13/1995	3.50	2.95	0.00	0.55
MW-2	8/23/1999	3.50	2.89	0.00	0.61
MW-2	5/26/1999	3.50	2.96	0.00	0.54
MW-2	4/26/2001	3.50	1.74	0.00	1.76
MW-2	9/5/2002	3.50	3.06	0.00	0.44
MW-2	8/18/2005	3.50	2.62	0.00	0.88
MW-2	8/19/2005	3.50	2.62	0.00	0.88
MW-2	1/25/2006	3.50	1.27	0.00	2.23

Table 2 Groundwater Elevation Data Former DiSalvo Trucking 4919 Tidewater Avenue Oakland, California 94601

Monitoring Well	Gauging Date	Top of Casing Elevation (feet msl)	Depth to Water (feet bgs)	Free Product Thickness (feet)	Groundwater Elevation (feet msl)
MW-2	7/12/2006	3.50	2.42	0.00	1.08
MW-2	6/27/2007	3.50	2.46	0.00	1.04
MW-2	11/26/2007	3.50	2.74	0.00	0.76
MW-2	6/9/2008	3,50	2.63	0.00	0.87
MW-2	12/11/2008	3.50	3.21	0.00	0.29
MW-3	4/14/1994	2.90	1.33	0.00	1.57
MW-3	11/18/1994	2.90	1.23	0.00	1.67
MW-3	8/13/1995	2.90	2.18	0.00	0.72
MW-3	8/23/1999	2.90	2.18	0.00	0.72
MW-3	5/26/1999	2.90	2.50	0.00	0.40
MW-3	4/26/2001	2.90	1.29	0.00	1.61
MW-3	9/5/2002	2.90	2.34	0.00	0.56
MW-3	8/18/2005	2.90	2.08	0.04	0.85
MW-3	8/19/2005	2.90	2.10	0.03	0.82
MW-3	1/25/2006	2.90	0.97	0.00	1.93
MW-3	7/12/2006	2.90	1.82	0.00	1.08
MW-3	6/27/2007	2.90	1.90	0.00	1.00
MW-3	11/26/2007	2.90	2.18	0.00	0.72
MW-3	6/9/2008	2.90	2.13	0.02	0.77
MW-3	12/11/2008	2.90	2.53	0.00	0.37
MW-4	8/13/1995	3.87	3.33	0.00	0.54
MW-4	5/26/1999	3.87	3.31	0.00	0.56
MW-4	4/26/2001	3.87	1.69	0.00	2.18
MW-4	9/5/2002	3.87	3.31	0.00	0.56
MW-4	8/18/2005	3.87	3.37	0.00	0.50
MW-4	8/19/2005	3.87	3.46	0.00	0.41

Table 2 Groundwater Elevation Data Former DiSalvo Trucking 4919 Tidewater Avenue Oakland, California 94601

Monitoring Well	Gauging Date	Top of Casing Elevation (feet msl)	Depth to Water (feet bgs)	Free Product Thickness (feet)	Groundwater Elevation (feet msl)
MW-4	1/25/2006	3.87	2.50	0.00	1.37
MW-4	7/12/2006	3.87	3.09	0.00	0.78
MW-4	6/27/2007	3.87	3.26	0.00	0.61
MW-4	11/26/2007	3.87	3.58	0.00	0.29
MW-4	6/9/2008	3.87	3.41	0.00	0.46
MW-4	12/11/2008	3.87	3.98	0.00	-0.11

Notes:

msl = Mean sea level.

bgs = Below ground surface.

Table 3
Analytical Data for Soil Samples
TPH-d and BTEX
Former DiSalvo Trucking
4919 Tidewater Avenue
Oakland, California 94601

Sampling Location	Sample ID	Sampling Date	Depth (feet bgs)	TPH-d (mg/kg)	Benzene (mg/kg)	Toluene (mg/kg)	Ethylbenzene (mg/kg)	Xylenes (mg/kg)
C-1	C-1,2	9/24/2008	2.0	710	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-1	C-1,5	9/24/2008	5.0	1.5	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-1	C-1,10	9/24/2008	10.0	5.8	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-1	C-1,15	9/24/2008	15.0	5.2	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-1	C-1,20	9/24/2008	20.0	< 1.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-1	C-1,25	9/24/2008	25.0	1.9	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-1	C-1,30	9/24/2008	30.0	< 1.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-2	C-2,2	9/24/2008	2.0	51	< 0.0050	0.0082	< 0.0050	0.021
C-2	C-2,5	9/24/2008	5.0	1.4	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-2	C-2,10	9/24/2008	10.0	5.1	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-2	C-2, 15	9/24/2008	15.0	4.1	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-2	C-2, 20	9/24/2008	20.0	< 1.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-3	C-3,2	9/24/2008	2.0	170	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-3	C-3,5	9/24/2008	5.0	< 1.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-3	C-3,10	9/24/2008	10.0	4.1	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-3	C-3,15	9/24/2008	15.0	2.6	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-3	C-3,20	9/24/2008	20.0	< 1.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-4	C-4,2	9/24/2008	2.0	1.6	< 0.0050	< 0.0050	< 0.0050	< 0.0050

Table 3
Analytical Data for Soil Samples
TPH-d and BTEX
Former DiSalvo Trucking
4919 Tidewater Avenue
Oakland, California 94601

Sampling Location	Sample ID	Sampling Date	Depth (feet bgs)	TPH-d (mg/kg)	Benzene (mg/kg)	Toluene (mg/kg)	Ethylbenzene (mg/kg)	Xylenes (mg/kg)
C-4	C-4,5	9/24/2008	5.0	< 1.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-4	C-4,10	9/24/2008	10.0	5.5	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-4	C-4,15	9/24/2008	15.0	5.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-4	C-4,20	9/24/2008	20.0	7.2	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-5	C-5,2.5	9/25/2008	2.5	220	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-5	C-5,5	9/25/2008	5.0	190	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-5	C-5,10	9/25/2008	10.0	9.3	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-5	C-5,15	9/25/2008	15.0	4.3	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-5	C-5,20	9/25/2008	20.0	3.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-6	C-6,2	9/24/2008	2.0	74	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-6	C-6,5	9/24/2008	5.0	2,600	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-6	C-6,10	9/24/2008	10.0	8.8	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-6	C-6,15	9/24/2008	15.0	5.3	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-6	C-6,20	9/24/2008	20.0	7.4	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-7	C-7,2.5	9/24/2008	2.5	520	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-7	C-7,5	9/24/2008	5.0	3,500	< 0.0050	0.0061	< 0.0050	0.0070
C-7	C-7,10	9/24/2008	10.0	8.2	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-7	C-7,15	9/24/2008	15.0	8.9	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-7	C-7,19.5	9/24/2008	19.5	10	< 0.0050	< 0.0050	< 0.0050	< 0.0050

Table 3
Analytical Data for Soil Samples
TPH-d and BTEX
Former DiSalvo Trucking
4919 Tidewater Avenue
Oakland, California 94601

Sampling Location	Sample ID	Sampling Date	Depth (feet bgs)	TPH-d (mg/kg)	Benzene (mg/kg)	Toluene (mg/kg)	Ethylbenzene (mg/kg)	Xylenes (mg/kg)
C-7	C-7,25	9/24/2008	25.0	<1.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-7	C-7,30	9/24/2008	30.0	4.7	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-8	C-8,2.5	9/25/2008	2.5	160	0.014	< 0.0050	0.015	0.066
C-8	C-8,5	9/25/2008	5.0	210	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-8	C-8,10	9/25/2008	10.0	8.3	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-8	C-8,15	9/25/2008	15.0	13	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-8	C-8,20	9/25/2008	20.0	8.8	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-9	C-9,5	9/25/2008	5.0	2,400	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-9	C-9,10	9/25/2008	10.0	310	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-9	C-9,15	9/25/2008	15.0	5.4	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-9	C-9,20	9/25/2008	20.0	9.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-10	C-10,2	9/24/2008	2.0	160	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-10	C-10,5	9/24/2008	5.0	23	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-10	C-10,10	9/24/2008	10.0	9.1	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-10	C-10,20	9/24/2008	20.0	7.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-11	C-11,5	9/24/2008	5.0	320	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-11	C-11,10	9/24/2008	10.0	9.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-11	C-11,20	9/24/2008	20.0	3.7	< 0.0050	< 0.0050	< 0.0050	< 0.0050

Table 3
Analytical Data for Soil Samples
TPH-d and BTEX
Former DiSalvo Trucking
4919 Tidewater Avenue
Oakland, California 94601

Sampling Location	Sample ID	Sampling Date	Depth (feet bgs)	TPH-d (mg/kg)	Benzene (mg/kg)	Toluene (mg/kg)	Ethylbenzene (mg/kg)	Xylenes (mg/kg)
C-12	C-12,2.5	9/25/2008	2.5	1,500	< 0.0050	< 0.0050	< 0.0050	0.0058
C-12	C-12,5	9/25/2008	5.0	14	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-12	C-12,10	9/25/2008	10.0	5.7	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-12	C-12,15	9/25/2008	15.0	6.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-12	C-12,20	9/25/2008	20.0	2.1	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-12	C-12,25	9/25/2008	25.0	< 1.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-12	C-12,30	9/25/2008	30.0	< 1.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-13	C-13,2.5	9/25/2008	2.5	370	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-13	C-13,5	9/25/2008	5.0	4.9	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-13	C-13,10	9/25/2008	10.0	4.7	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-13	C-13,15	9/25/2008	15.0	5.7	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-13	C-13,20	9/25/2008	20.0	4.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-14	C-14,2.5	9/25/2008	2.5	300	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-14	C-14,5	9/25/2008	5.0	6.2	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-14	C-14,10	9/25/2008	10.0	9.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-14	C-14,15	9/25/2008	15.0	10	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-14	C-14,20	9/25/2008	20.0	7.2	< 0.0050	< 0.0050	< 0.0050	< 0.0050
		<u>.</u>						
C-15	C-15,2	9/25/2008	2.0	46	< 0.0050	< 0.0050	< 0.0050	< 0.0050

Table 3 Analytical Data for Soil Samples TPH-d and BTEX Former DiSalvo Trucking 4919 Tidewater Avenue Oakland, California 94601

Sampling Location	Sample ID	Sampling Date	Depth (feet bgs)	TPH-d (mg/kg)	Benzene (mg/kg)	Toluene (mg/kg)	Ethylbenzene (mg/kg)	Xylenes (mg/kg)
C-15	C-15,5	9/25/2008	5.0	380	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-15	C-15,10	9/25/2008	10.0	7.4	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-15	C-15,15	9/25/2008	15.0	5.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-15	C-15,20	9/25/2008	20.0	8.6	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-15	C-15,24	9/25/2008	24.0	1.3	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-16	C-16,2.5	9/25/2008	2.5	200	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-16	C-16,6.0	9/25/2008	6.0	3,100	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-16	C-16,12	9/25/2008	12.0	54	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-16	C-16,16	9/25/2008	16.0	11	< 0.0050	< 0.0050	< 0.0050	< 0.0050
C-16	C-16,20	9/25/2008	20.0	7.0	< 0.0050	< 0.0050	< 0.0050	< 0.0050

Notes:

TPH-d = Total petroleum hydrocarbons quantified as diesel. Analyzed by EPA Method 8015M with silica gel cleanup.

<50 = Analyte not detected above the laboratory method reporting limit indicated.

mg/kg = milligrams per kilogram

bgs = Below ground surface.

Table 4 Analytical Data for Grab Groundwater Samples TPH-d and BTEX Former DiSalvo Trucking 4919 Tidewater Avenue Oakland, California 94601

Sample Location	Sample ID	Sampling Date	TPH-d (µg/L)	Benzene (µg/L)	Toluene (μg/L)	Ethylbenzene (μg/L)	Xylenes (µg/L)
C-1	C-1W.12	9/24/2008	< 50	< 0.50	< 0.50	< 0.50	< 0.50
C-1	C-1W,20	9/24/2008	< 50	< 0.50	< 0.50	< 0.50	< 0.50
C-2	C-2W,12	9/24/2008	< 50	< 0.50	< 0.50	< 0.50	< 0.50
C-3	C-3W,8	9/24/2008	78	< 0.50	< 0.50	< 0.50	< 0.50
C-4	C-4W,16	9/24/2008	< 50	< 0.50	< 0.50	< 0.50	< 0.50
C-5	C-5W,20	9/25/2008	74	< 0.50	< 0.50	< 0.50	< 0.50
C-6	C-6W,7	9/24/2008	26,000	< 0.50	< 0.50	< 0.50	< 0.50
C-7	C-7W,7	9/24/2008	18,000	< 0.50	< 0.50	< 0.50	< 0.50
C-7	C-7W,23	9/24/2008	< 80	< 0.50	< 0.50	< 0.50	< 0.50
C-8	C-8W,20	9/25/2008	640	< 0.50	< 0.50	< 0.50	< 0.50
C-10	C-10W,8	9/24/2008	11,000	< 0.50	< 0.50	< 0.50	< 0.50
C-11	C-11W,8	9/24/2008	76	< 0.50	< 0.50	< 0.50	< 0.50
C-12	C-12W,20	9/25/2008	86	< 0.50	< 0.50	< 0.50	< 0.50

Table 4 Analytical Data for Grab Groundwater Samples TPH-d and BTEX Former DiSalvo Trucking 4919 Tidewater Avenue Oakland, California 94601

Sample Location	Sample ID	Sampling Date	TPH-d (µg/L)	Benzene (µg/L)	Toluene (µg/L)	Ethylbenzene (µg/L)	Xylenes (μg/L)
C-13	C-13W,8	9/25/2008	120	< 0.50	< 0.50	< 0.50	< 0.50
C-14	C-14W,8	9/25/2008	190	< 0.50	< 0.50	< 0.50	< 0.50
C-15	C-15W,8	9/25/2008	9,300	< 0.50	< 0.50	< 0.50	< 0.50
C-15	C-15W,24	9/25/2008	130	< 0.50	< 0.50	< 0.50	< 0.50
C-16	C-16W,8	9/25/2008	3,800	< 0.50	< 0.50	< 0.50	< 0.50

Notes:

TPH-d = Total petroleum hydrocarbons quantified as diesel. Analyzed by EPA Method 8015M with silica gel cleanup.

<50 = Analyte not detected above the laboratory method reporting limit indicated.

μg/L = Micrograms per liter.

Appendix A Regulatory Correspondence

ALAMEDA COUNTY HEALTH CARE SERVICES







August 14, 2008

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

Mr. Bob Lawlor RWL Investments, Inc. 4919 Tidewater Avenue, Unit B Oakland, CA 94601-4914

Subject: Fuel Leak Case No. RO0000107 and Geotracker Global ID T0600100451, Di Salvo Trucking, 4919 Tidewater Avenue, Oakland, CA 94601

Dear Mr. Lawlor:

Alameda County Environmental Health (ACEH) staff has reviewed the case file for the abovereferenced site, including the most recent document entitled, "Revised Remedial Action Plan, Former Disalvo Trucking, 4919 Tidewater Avenue, Unit B, Oakland, California, 94601," (RAP) dated July 15, 2008 and prepared on your behalf by ETIC Engineering. The RAP presents the results of a geophysical survey, proposes sampling soil and groundwater in 16 soil borings, and proposes the installation, development, and sampling of one monitoring well.

The scope of work is conditionally approved and may be implemented provided that the technical comments below are addressed and incorporated during the proposed activities. Submittal of a revised Work Plan or Work Plan Addendum is not required unless an alternate scope of work outside that described in the Work Plan and technical comment below is proposed. We request that you address the following technical comments, perform the proposed work, and send us the reports described below.

TECHNICAL COMMENTS

- 1. Proposed Boring Locations. The proposed boring locations are generally acceptable with the exception of proposed boring C-8. Boring C-8 is proposed along the northern property boundary to define the northern extent of the plume. However, proposed boring C-8 is less than 30 feet north of proposed boring C-9 and approximately 30 feet northwest of previous boring B-7. Therefore, proposed boring C-8 does not appear to be necessary at this time. Please see technical comment 2 regarding additional soil borings to assess discharge to surface water.
- 2. Discharge to Surface Water. Although three borings are proposed along the southern property boundary, the proposed borings will not directly evaluate whether groundwater contamination from the site discharges to surface water. Therefore, we request that you advance three soil borings along the shoreline area shown on Attachment 1. Soil and groundwater samples are to be collected according to the protocols proposed for the on-site soil borings. Please present the results in the Site Assessment Report requested below.

Mr. Bob Lawlor RWL Investments, Inc. RO0000107 August 14, 2008 Page 2

3. Monitoring Well MW-1. During recent groundwater sampling events, purging of one gallon of groundwater has resulted in dewatering of monitoring well MW-1. We request that monitoring well MW-1 be evaluated to assure that the well is providing representative groundwater samples. Please present recommendations to evaluate the well in the Site Assessment Report requested below.

TECHNICAL REPORT REQUEST

Please submit technical reports to Alameda Gounty Environmental Health (Attention: Jerry Wickham), according to the following schedule:

January 13, 2009 – Site Assessment Report

These reports are being requested pursuant to California Health and Safety Code Section 25296.10. 23 CCR Sections 2652 through 2654, and 2721 through 2728 outline the responsibilities of a responsible party in response to an unauthorized release from a petroleum UST system, and require your compliance with this request.

ELECTRONIC SUBMITTAL OF REPORTS

ACEH's Environmental Cleanup Oversight Programs (LOP and SLIC) require submission of reports in electronic form. The electronic copy replaces paper copies and is expected to be used for all public information requests, regulatory review, and compliance/enforcement activities. Instructions for submission of electronic documents to the Alameda County Environmental Cleanup Oversight Program FTP site are provided on the attached "Electronic Report Upload Instructions." Submission of reports to the Alameda County FTP site is an addition to existing requirements for electronic submittal of information to the State Water Resources Control Board (SWRCB) Geotracker website. In September 2004, the SWRCB adopted regulations that require electronic submittal of information for all groundwater cleanup programs. For several years, responsible parties for cleanup of leaks from underground storage tanks (USTs) have been required to submit groundwater analytical data, surveyed locations of monitoring wells, and other data to the Geotracker database over the Internet. Beginning July 1, 2005, these same reporting requirements were added to Spills, Leaks, Investigations, and Cleanup (SLIC) sites. Beginning July 1, 2005, electronic submittal of a complete copy of all reports for all sites is required in Geotracker (in PDF format). Please visit the SWRCB website for more information on these requirements (http://www.swrcb.ca.gov/ust/cleanup/electronic_reporting).

PERJURY STATEMENT

All work plans, technical reports, or technical documents submitted to ACEH must be accompanied by a cover letter from the responsible party that states, at a minimum, the following: "I declare, under penalty of perjury, that the information and/or recommendations contained in the attached document or report is true and correct to the best of my knowledge." This letter must be signed by an officer or legally authorized representative of your company. Please include a cover letter satisfying these requirements with all future reports and technical documents submitted for this fuel leak case.

Mr. Bob Lawlor RWL Investments, Inc. R00000107 August 14, 2008 Page 3

PROFESSIONAL CERTIFICATION & CONCLUSIONS/RECOMMENDATIONS

The California Business and Professions Code (Sections 6735, 6835, and 7835.1) requires that work plans and technical or implementation reports containing geologic or engineering evaluations and/or judgments be performed under the direction of an appropriately registered or certified professional. For your submittal to be considered a valid technical report, you are to present site specific data, data interpretations, and recommendations prepared by an appropriately licensed professional and include the professional registration stamp, signature, and statement of professional certification. Please ensure all that all technical reports submitted for this fuel leak case meet this requirement.

UNDERGROUND STORAGE TANK CLEANUP FUND

Please note that delays in investigation, later reports, or enforcement actions may result in your becoming ineligible to receive grant money from the state's Underground Storage Tank Cleanup Fund (Senate Bill 2004) to reimburse you for the cost of cleanup.

AGENCY OVERSIGHT

If it appears as though significant delays are occurring or reports are not submitted as requested, we will consider referring your case to the Regional Board or other appropriate agency, including the County District Attorney, for possible enforcement actions. California Health and Safety Code, Section 25299.76 authorizes enforcement including administrative action or monetary penalties of up to \$10,000 per day for each day of violation.

If you have any questions, please call me at (510) 567-6791 or send me an electronic mail message at jerry.wickham@acgov.org.

Sincerely,

Jerry Wickham, California PG 3766, CEG 1177, and CHG 297

Senior Hazardous Materials Specialist

Attachment 1: Shoreline Area Sampling Locations

Enclosure: ACEH Electronic Report Upload (ftp) Instructions

.cc: Leroy Griffin, Oakland Fire Department, 250 Frank H. Ogawa Plaza, Ste. 3341, Oakland, CA 94612-2032

Maura Dougherty, ETIC Engineering, 2285 Morello Avenue, Pleasant Hill, CA 94523

Donna Drogos, ACEH Jerry Wickham, ACEH File

Alameda County Environmental Cleanup **Oversight Programs** (LOP and SLIC)

ISSUE DATE: July 5, 2005

REVISION DATE: December 16, 2005

PREVIOUS REVISIONS: October 31, 2005

SECTION: Miscellaneous Administrative Topics & Procedures

SUBJECT: Electronic Report Upload (ftp) Instructions

Effective January 31, 2006, the Alameda County Environmental Cleanup Oversight Programs (LOP and SLIC) require submission of all reports in electronic form to the county's ftp site. Paper copies of reports will no longer be accepted. The electronic copy replaces the paper copy and will be used for all public information requests, regulatory review, and compliance/enforcement activities.

REQUIREMENTS

Entire report including cover letter must be submitted to the ftp site as a single portable document format (PDF) with no password protection. (Please do not submit reports as attachments to electronic mail.)

It is preferable that reports be converted to PDF format from their original format, (e.g., Microsoft Word) rather than scanned.

Signature pages and perjury statements must be included and have either original or electronic signature.

Do not password protect the document. Once indexed and inserted into the correct electronic case file, the document will be secured in compliance with the County's current security standards and a password. Documents with password protection will not be accepted.

Each page in the PDF document should be rotated in the direction that will make it easiest to read on a computer

Reports must be named and saved using the following naming convention:

RO#_Report Name_Year-Month-Date (e.g., RO#5555_WorkPlan_2005-06-14)

Additional Recommendations

A separate copy of the tables in the document should be submitted by e-mail to your Caseworker in Excel format. These are for use by assigned Caseworker only.

Submission Instructions

1) Obtain User Name and Password:

- a) Contact the Alameda County Environmental Health Department to obtain a User Name and Password to upload files to the ftp site.
 - i) Send an e-mail to dehloptoxic@acgov.org

ii) Send a fax on company letterhead to (510) 337-9335, to the attention of Alicia Lam-Finneke.

- b) In the subject line of your request, be sure to include "ftp PASSWORD REQUEST" and in the body of your request, include the Contact Information, Site Addresses, and the Case Numbers (RO# available in Geotracker) you will be posting for.
- 2) Upload Files to the ftp Site

a) Using Internet Explorer (IE4+), go to ftp://alcoftp1.acgov.org

(i) Note: Netscape and Firefox browsers will not open the FTP site.

b) Click on File, then on Login As.

c) Enter your User Name and Password. (Note: Both are Case Sensitive.)

d) Open "My Computer" on your computer and navigate to the file(s) you wish to upload to the ftp site.

- e) With both "My Computer" and the ftp site open in separate windows, drag and drop the file(s) from "My Computer" to the ftp window.
- 3) Send E-mail Notifications to the Environmental Cleanup Oversight Programs

a) Send email to dehloptoxic@acgov.org notify us that you have placed a report on our ftp site.

b) Copy your Caseworker on the e-mail. Your Caseworker's e-mail address is the entire first name then a period and entire last name at acgov.org. (e.g., firstname.lastname@acgov.org)

The subject line of the e-mail must start with the RO# followed by Report Upload. (e.g., Subject: RO1234 Report Upload)

Copyright @2007 Pictometry International C

Maura Dougherty - RE: 4919 Tidewater Avenue, Oakland, California

From: "Wickham, Jerry, Env. Health" < jerry.wickham@acgov.org>

To: 'Maura Dougherty' <mdougherty@eticeng.com>

Date: 9/16/2008 5:54 PM

Subject: RE: 4919 Tidewater Avenue, Oakland, California

Maura,

Your proposal to conduct the sampling in a phased approach is acceptable.

Regards,

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

From: Maura Dougherty [mailto:mdougherty@eticeng.com]

Sent: Tuesday, September 16, 2008 4:52 PM

To: Wickham, Jerry, Env. Health

Subject: 4919 Tidewater Avenue, Oakland, California

Jerry,

This is to follow up on our phone conversation earlier today regarding the former DiSalvo Trucking site located at 4919 Tidewater Avenue in Oakland, California. Per your letter dated August 14, 2008, we have removed boring C-8 located along the northern fence line of the Site from our scope of work. Per our phone conversation today, we have added an additional location along the southern fence line between C-11 and C-15. This location will aid in determining the conditions of groundwater and soil at the property boundary. A map reflecting these changes has been attached to this email.

As we discussed, we will do this work in a phased approach and first complete the onsite sampling. If the analytical results show TPHd impacted groundwater in these boundary samples, then we will discuss offsite impacts. If the samples collected at these locations do not show TPHd impact, then we will conclude that impacted groundwater is not flowing offsite and we will not perform the shoreline sampling described in your August 14, 2008 letter.

We have scheduled the soil and groundwater sampling field work for September 24 through 26. If you have any questions please do not hesitate to contact me.

Regards, Maura

Maura Dougherty, P.E. ETIC Engineering 2285 Morello Avenue Pleasant Hill, CA 94523

(925) 602-4710 x41

Maura Dougherty - RE: 4919 Tidewater Avenue, Oakland, CA

From:

"Wickham, Jerry, Env. Health" < jerry.wickham@acgov.org>

To:

'Maura Dougherty' <mdougherty@eticeng.com>

Date:

11/4/2008 8:11 AM

Subject: RE: 4919 Tidewater Avenue, Oakland, CA

Maura,

As we discussed on October 29, 2008, I concur with the proposal to eliminate the installation of one upgradient well based on soil and groundwater sampling results from the northern corner of the site.

Regards,

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

From: Maura Dougherty [mailto:mdougherty@eticeng.com]

Sent: Monday, November 03, 2008 11:57 AM

To: Wickham, Jerry, Env. Health

Subject: 4919 Tidewater Avenue, Oakland, CA

Jerry,

This is to follow up on our phone conversation on October 29, 2008 regarding the former DiSalvo Trucking site located at 4919 Tidewater Avenue in Oakland, California. In our July 15, 2008 Revised Remedial Action Plan we had proposed to install one upgradient well on the property to further delineate the lateral extent of groundwater contamination at the Site. However, our soil and groundwater investigation confirmed that the petroleum hydrocarbon contamination in groundwater does not extend to the northern corner of the Site. As a result we are requesting to eliminate the well installation from our scope of work and instead proceed directly with the preparation of our Site Assessment Report.

If you have any questions or need any additional information please do not hesitate to contact me at 925-602-4710 x41.

Regards, Maura

Maura Dougherty, P.E. **ETIC** Engineering 2285 Morello Avenue Pleasant Hill, CA 94523

(925) 602-4710 x41

Deborah Hensley - RE: 4919 Tidewater Avenue, Oakland, California

From:

"Wickham, Jerry, Env. Health" < jerry.wickham@acgov.org>

To:

'Maura Dougherty' <mdougherty@eticeng.com>

Date:

1/13/2009 5:01 PM

Subject: RE: 4919 Tidewater Avenue, Oakland, California

CC:

Deborah Hensley < DHensley @eticeng.com>

Maura,

Submittal of the referenced report on January 19, 2009 is acceptable.

Regards,

Jerry Wickham

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

From: Maura Dougherty [mailto:mdougherty@eticeng.com]

Sent: Tuesday, January 13, 2009 4:55 PM

To: Wickham, Jerry, Env. Health

Cc: Deborah Hensley

Subject: 4919 Tidewater Avenue, Oakland, California

Jerry,

This is a follow-up to our phone conversation this afternoon regarding the former DiSalvo Trucking Facility site located at 4919 Tidewater Avenue in Oakland, California. As we discussed, we will submit the Site Assessment Report on Monday, January 19, 2009. If you have any questions or need any additional information please do not hesitate to contact me.

Thank you for your help.

Regards, Maura

Maura Dougherty, P.E. **ETIC Engineering** 2285 Morello Avenue Pleasant Hill, CA 94523

(925) 602-4710 x41

Thomas Neely - RE: Former DiSalvo Trucking, 4919 Tidwater Ave., RO#0000107

From: "Wickham, Jerry, Env. Health" < jerry.wickham@acgov.org>

To: 'Thomas Neely' <tneely@eticeng.com>

Date: 1/20/2009 7:55 AM

Subject: RE: Former DiSalvo Trucking, 4919 Tidwater Ave., RO#0000107

Mr. Neely,

Based upon your request, the schedule for report submittal is extended to January 26, 2009.

Regards,

Jerry Wickham

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

From: Thomas Neely [mailto:tneely@eticeng.com]

Sent: Monday, January 19, 2009 3:04 PM

To: Wickham, Jerry, Env. Health

Subject: Former DiSalvo Trucking, 4919 Tidwater Ave., RO#0000107

Mr. Wickham,

On behalf of Maura Dougherty, I am submitting this request for extension of the due date for submittal of the Site Assessment Report for the former DiSalvo Trucking site located at 4919 Tidewater Avenue in Oakland, California (RO #0000107). Maura has needed to attend to a family emergency, and is currently out of the area. As a primary author of the document, we are sending the signature page to Maura and should have it returned signed and stamped in a few days.

Can you extend the deadline for submittal of the report to Monday, January 26, 2009?

Thank you for your help,

Tom Neely

Thomas Neely, PG, CHG, REA II ETIC Engineering, Inc. 2285 Morello Avenue Pleasant Hill, CA 94523 (925) 602-4710 ext. 17 tneely@eticeng.com Appendix B

Drilling Permit

Alameda County Public Works Agency - Water Resources Well Permit



399 Elmhurst Street Hayward, CA 94544-1395 Telephone: (510)670-6633 Fax:(510)782-1939

Application Approved on: 09/16/2008 By jamesy

Permit Numbers: W2008-0667

Permits Valid from 09/24/2008 to 09/26/2008

Application Id:

1220552215879

City of Project Site: Oakland

Site Location:

4919 Tidewater Ave.

Oakland, Ca 94601

Project Start Date:

09/24/2008

Requested Inspection: 09/24/2008

Scheduled Inspection: 09/24/2008 at 1:30 PM (Contact your inspector, Ron Smalley at (510) 670-5407, to confirm.)

Applicant:

ETIC Engineering, Inc. - Nathan Diem

Phone: 925-602-4710 x45

Property Owner:

2285 Morello Ave., Pleasant Hill, CA 95423 R.W.L. Investments, Inc.

Phone: --

Completion Date: 09/26/2008

4919 Tidewater Ave. Unit B, Oakland, CA 94601

Client: Contact:

same as Property Owner Maura Dougherty

Phone: 925-602-4710 x41

Cell: --

Total Due:

\$230.00

Receipt Number: WR2008-0325

Total Amount Paid:

Payer Name: ETIC

Paid By: CHECK

PAID IN FULL

Work Total: \$230.00

Works Requesting Permits:

Borehole(s) for Investigation-Environmental/Monitorinia Study - 15 Boreholes Driller: Environmental Control Associates, Inc. - Lic #: 695970 - Method: DP

Specifications

Permit	Issued Dt	Expire Dt	#	Hole Diam	Max Depth
Number			Boreholes		
W2008-	09/16/2008	12/23/2008	15	2.00 in.	30.00 ft
0667					

Specific Work Permit Conditions

- 1. Backfill bore hole by tremie with cement grout or cement grout/sand mixture. Upper two-three feet replaced in kind or with compacted cuttings. All cuttings remaining or unused shall be containerized and hauled off site. The containers shall be clearly labeled to the ownership of the container and labeled hazardous or non-hazardous.
- 2. Boreholes shall not be left open for a period of more than 24 hours. All boreholes left open more than 24 hours will need approval from Alameda County Public Works Agency, Water Resources Section. All boreholes shall be backfilled according to permit destruction requirements and all concrete material and asphalt material shall be to Caltrans Spec or County/City Codes. No borehole(s) shall be left in a manner to act as a conduit at any time.
- 3. Permittee shall assume entire responsibility for all activities and uses under this permit and shall indemnify, defend and save the Alameda County Public Works Agency, its officers, agents, and employees free and harmless from any and all expense, cost, liability in connection with or resulting from the exercise of this Permit including, but not limited to, properly damage, personal injury and wrongful death.
- 4. Copy of approved drilling permit must be on site at all times. Failure to present or show proof of the approved permit application on site shall result in a fine of \$500.00.
- 5. Prior to any drilling activities onto any public right-of-ways, it shall be the applicants responsibilities to contact and coordinate a Underground Service Alert (USA), obtain encroachment permit(s), excavation permit(s) or any other permits

Alameda County Public Works Agency - Water Resources Well Permit

required for that City or to the County and follow all City or County Ordinances. It shall also be the applicants responsibilities to provide to the Cities or to Alameda County a Traffic Safety Plan for any lane closures or detours planned. No work shall begin until all the permits and requirements have been approved or obtained.

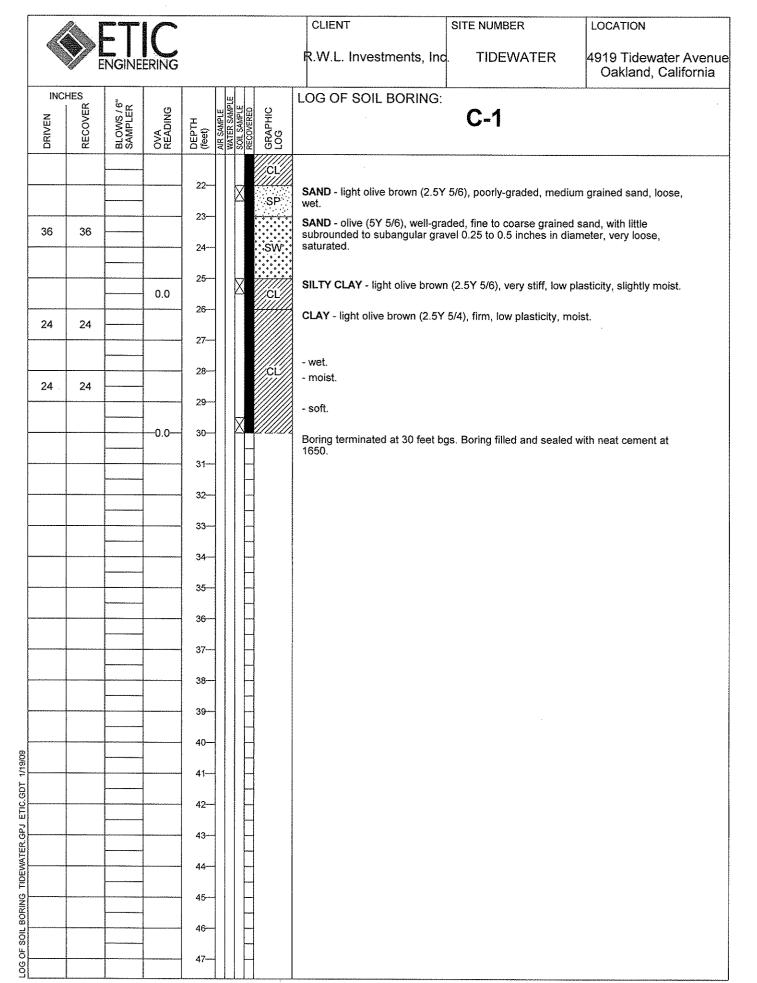
6. Permit is valid only for the purpose specified herein. No changes in construction procedures, as described on this permit application. Boreholes shall not be converted to monitoring wells, without a permit application process.

Appendix C

Boring Logs

	MAJOR DIVIS	IONS					TYPICAL NAMES
		Clean	gravels with	GW	. 6.		Well graded gravels with or without sand, little or no fines.
ဟ	GRAVELS more than half	little	or no fines	GP		3	Poorly graded gravels with or without sand, little or no fines.
COARSE-GRAINED SOILS More than half is coarser than No. 200 sieve	coarse fraction is larger than No. 4 sieve size		avels with	GM			Silty gravels, silty gravels with sand.
AINED alf is o 200 si		over	12% fines	GC			Clayey gravels, clayey gravels with sand.
RSE-GR re than ha than No. 2		Clear	n sands with	sw			Well graded sands with or without gravel, little or no fines.
JARS More than	SANDS more than half	little	or no fines	SP			Poorly graded sands with or without gravels, little or no fines.
ິ້	coarse fraction is smaller than No. 4 sieve size	Sa	ands with	SM			Silty sands with or without gravel.
		ove	r 12% fines	sc			Clayey sands with or without gravel.
				ML			Inorganic silts and very fine sands, rock flour, silts with sands and gravels.
SOILS s finer ieve	SILTS AN liquid limit s			CL			Inorganic clays of low to medium plasticity, clays with sands and gravels, lean clays.
(/)				OL.			Organic silts or clays of low plasticity.
FINE-GRAINED SOILS More than half is finer than No. 200 sieve				МН			Inorganic silts, micaceous or diatomaceous, fine sandy or silty soils, elastic silts.
More than	SILTS AN liquid limit gre			СН			Inorganic clays of high plasticity, fat clays
				ОН			Organic clays or clays of medium to high plasticity.
	HIGHLY ORGANIC	SOILS		PT		<u> </u>	Peat and other highly organic soils.
	SYMBOL	.S					DRILL LOG ROCK TYPES
\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\			Samples				Limestone
	Portland Cemen		Air				Dolomite
•	Blank Casing Bentonite Pellets		⊟ ∑ Soil			==	Mudstone
	- Contorned i Gilde					=:	Siltstone
	Filter Pack		Water		· · · · · · · · · · · · · · · · · · ·	 	Sandstone
	Screened Casing	g	Open Hole	12).\-\; <u> \/</u> \	1	Igneous
♦ E	TIC U	NIFIEC A	SOIL CLAS	SSIFIC LS US	ATIC	N NC	SYSTEM DESCRIPTIONS ETIC DRILL LOGS

								CL	IENT		SITE	NUMBER		LOCATION	
		NGINE	EDING					R.V	V.L. Investment	s, Inc		TIDEWATE	≣R ∠	1919 Tidewat Oakland, C	
LOG		DIL BO	,		(C-	1		RILLING AND MPLING METHOD	S Geo	oprobe 6	ed to 2 feet bgs v 6600 utilizing dire al-tube soil sam	ect-push tech	ger. Drilled and sar	npled with
COO	RDINA	TEQ.						W	/ATER LEVEL	დ 11	1.5				······································
		N TOP	OF CA	ASING	} :				TIME	16	348			START TIME	FINISH TIME
		ELOW							DATE	9/2	4/08			0915	1700
		COMP/ IUMBE						F	REFERENCE	G	SS			DATE 9/24/08	DATE 9/24/08
	HES	T	1	0.0	l lu	T		SURFA	ACE CONDITIONS	<u> </u>			<u> </u>		<u> </u>
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING	DEPTH (feet)	SAMPLE ED CAMDI	SAMPLE	GRAPHIC LOG					Asphalt			
R	RE	SAN	85		AIR	SOIL	80	DESCF	RIPTION BY:			M. Garcia			······································
			-	0			AC/AB ONCRE	Asph ECond	nalt to 4 inches bgs. crete from 4 inches	to 1 fo	ot bgs.				
!				1			14.4		d cleared to 2 feet b				covery.		
24	24		0.1	2		X	SP	SAN	D ~ olive grey (5Y 4	(2), po	orly-gra	aded, fine san	ıd, loose, d	iry.	
***************************************			*	3-				CLA	Y - bluish black (5B	2.5/1)	, stiff, l	ow plasticity,	moist.		
48	48			4-											
40	40]	5		X									
			0.0	6		-		_	ht petroleum hydro		odor.				
<u>.</u>				7-				- cold	or change to black,	moist.					
			-					- son	ne organic material						
48	48			- 8	-				·						
				9			CL								
			0.0-	10	1	X		Grou	ndwater sample co	llected	at 164	8 by peristalti	ic pump an	id temporary PV	/C
				11				casin	ng screened betwee	n 10 a	nd 12	feet bgs.			
				<u>▽</u> 12											
48			***************************************												
	36			13-				- with	n some silt, moist to	wet.					
***************************************				14											
	<u> </u>		0.0	15		X		SANI	DY CLAY - bluish b	ack (5	B 2.5/1), soft, low pl	asticity, fin	e grained sand,	
			0.0	16					t to wet. Y CLAY - greenish	arev (C	GLEY1	5G), firm, slic	ahtly moist.	_	
48	48			17					or change to greeni				,,		
				18					ttled with iron staini	-					
				19				borin	ndwater sample co g, with peristaltic po et bgs.	ilected imp, a	at 100 nd tem	by hydropu porary PVC c	nch of new casing scre	/ boring near orig ened between 1	ginal 8 and
			_			X		- coid	or change to (5Y 5/6 of 0.25 inches in dia	6), with meter.	some	fine grained s	and, with	little subangular	
36	36		0.0	20			//Cr//	-	Y CLAY - light olive			5/4), firm, sliç	ghtly moist.	:	
		 		21—	11		(//////		•						



A		-7			***************************************	***************************************	····	CLIENT SITE NUMBER LOCATION
		NGINE	ERING					R.W.L. Investments, Inc. TIDEWATER 4919 Tidewater Ave Oakland, Californ
LOG)IL BO			(C.	-2	DRILLING AND SAMPLING METHODS Hand cleared to 2 feet bgs with hand auger. Drilled and sampled with Geoprobe 6600 utilizing direct-push technology and driving 1.25-inch diameter dual-tube soil sampling system.
COO	RDINA	TFS.						WATER LEVEL 💆 12.0
		N TOP	OF CA	ASING	3:			TIME 1100 START FINIS
		LOW	****					DATE 9/24/08 1035 111
		COMP/ UMBE						DATE DATE DATE Property Property
	HES		***************************************)910				SURFACE CONDITIONS
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING	DEPTH (feet)	SAMPLE	SAMPLE	RECOVERED GRAPHIC LOG	Asphait
DRI) H	SAN	85	DEF (fee	AIR S	SO	26. A	DESCRIPTION BY: N. Diem
***************************************				0			AC/AB	Asphalt to 3 inches bgs.
				1				Hand cleared to 2 feet bgs with hand auger, no recovery.
24	24		0.0	2-		X	sŵ	SAND - dark gray (10YR 3/1), fine to medium grained, some gravel 0.25 to 0.5-inch in diamter, loose, moist.
			010	3-				CLAY - very dark gray (10YR3/1), hard, medium plasticity, some fine grained
				4			CL	sand, moist.
48	48			5		Z	*******	SAND - dark gray (10YR 3/1), well-graded, some gravel, loose, moist.
			0.0	6-			`.`\$W;`;	
				7				SAND - dark reddish brown (5YR 3/4), well-sorted, some gravel and clay, loose, moist.
							SP	THOSE.
48	48			8				CLAY - very dark gray (10YR 3/1), hard, high plasticity, moist.
				9				
***************************************			0.0	10		X	CL	Groundwater sample collected at 1100 by peristaltic pump and temporary PVC casing screened between 10 and 12 feet bgs.
·····				11-				
	40			⊻ 12—	1			SANDY GRAVEL - very dark gray (10YR 3/1), 0.25 to 0.50-inch diameter gravel,
48	48			13			GW	medium to coarse grained sand, well-graded, moist. CLAY - very dark gray (10YR 3/1), hard, medium plasticity, moist.
				14				
·····				15				
			0.0			X		
48	48			16			CL	- black (10YR 2/1), medium plasticity, little sand, wet.
				17	T			
				18-	4			grouigh groon (CLEV4 4/2), high plasticity attacks, we determine
				19				- grayish green (GLEY1 4/2), high plasticity, slightly moist.
			0.0-	20-		X		Boring terminated at 20 feet bgs. Boring filled and sealed with neat cement at
				21				1100.

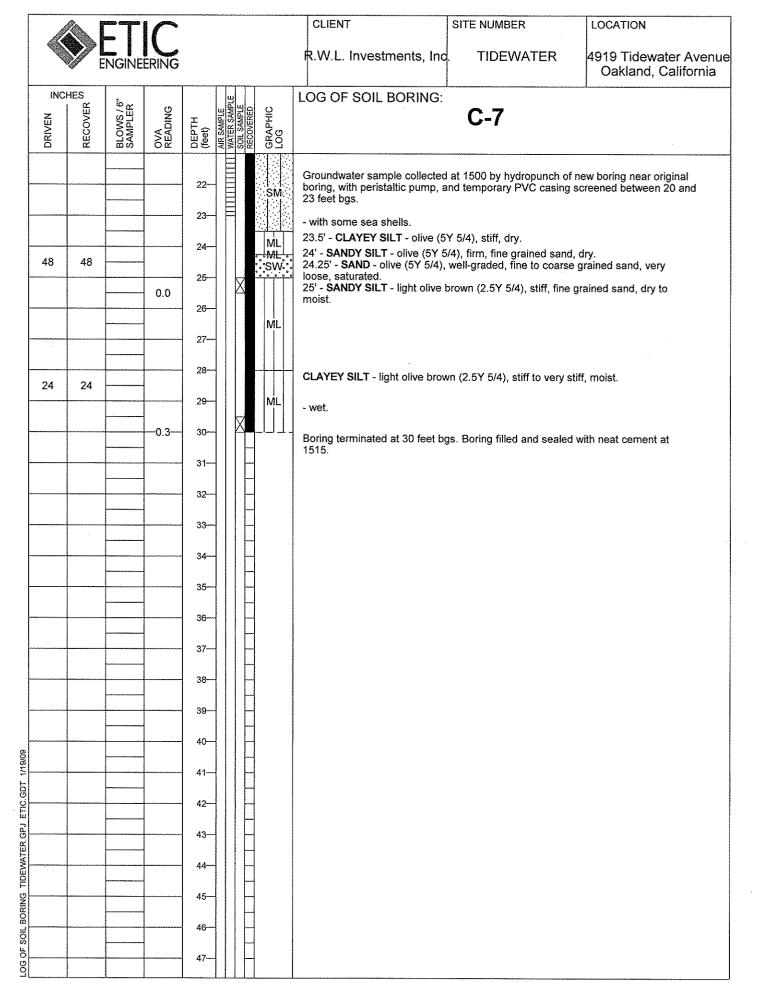
	la l							CLIENT			SITE N	UMBER	LC	DCATION	
		NGINE	FRING					R.W.L. Investm	ents	, Inc.	T	IDEWATEI	1	119 Tidewa Oakland, C	
LOG		DIL BOI			(C-	3	DRILLING AND SAMPLING METI	HODS	; Geo	probe 54°	to 2 feet bgs wi 10 utilizing direc I-tube soil sampl	th hand auge t-push techno	r. Drilled and sa plogy and driving	mpled with
COO	RDINA	TEQ.						WATER LEVI	ĒL S	z 7.	7				······································
		N TOP	OF C	ASING	3:			TIME	7	10	00			START	FINISH TIME
······································	······	ELOW :			•••••			DATE		9/24	1/08		····	0925	1055
		COMP/ IUMBE						REFERENC	E	G	s			DATE 9/24/08	DATE 9/24/08
	HES			3910	l u	4		SURFACE CONDITIONS				<u>l</u> _			1
ORIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING	H.	AMPLE	SAMPLE	GRAPHIC LOG		-			Asphalt			
DRI	REC	BLO	S E A	DEPTH (feet)	AIRS	SOIL	80	DESCRIPTION BY:	*************		N	I. Diem			
				0			IAC/AB	Asphalt to 3 inches	bgs.						
				1	$\ $			Hand cleared to 2 fe	et bg	s with	hand a	uger, no reco	very.		
24	24		0.0	2		X		SANDY SILT WITH 0.25-inch in diamete		K SIL	T- dark	reddish brow	n (5YR 3/4)), dry, little gra	avel
				3			ML	- color change to bia	ack (5	YR 2	5/1)				
48	48			4	1		SP :	SAND - gray to blac	k, coa	arse gi	rained, l	-			
			0.0	- 5		X		SAND - gray (10YR	4/1),	iiie to	coarse	gramed, loos	se, well-gra	aea, moist.	
			0.0	6			******* *********	Groundwater sampl casing screened be	e coll weer	ected o 6 and	at 1000 I 8 feet	by peristaltion bgs.	pump and	I temporary P	vc
				7				CLAYEY SILT - grav	, (10)	/D 4/1	\ soff r	moist little se	nd		
48	48		***************************************	9			ML								
				40				CLAY - very dark gr	ayish	browr	1 (10YR	3/2), low plas	sticity, mois	st, plant matei	ial.
			0.0	10		X									
				11				CLAV year dark an	m 0//	10VD	7(1)			6	
48	48			12			CL	CLAY - very dark gr	ay :{(IUTK	<i>эг</i> г), М€	ouum piastiči	ıy, moist, s	ea snelis,	
10	"			13				SAND - gray (10YR	4/1),	fine gr	ained, r	oorly graded	, loose, we	t.	
				14			SP			- '					
				15											
			0.0			X	CL	CLAY - gray (10YR	4/1), i	low pla	asticity,	wet, some sa	ind.		
48	48			16-			SP	SAND - dark gray (1	0YR	4/1), fi	ne grair	ned, poorly gr	aded, loose	e, moist.	
	***************************************		***************************************	17				CLAY - black (10YR	2/1),	low p	lasticity	, moist, few s	ea shells.		
				18-				CLAY - grayish gree	n (Gl	EY1 4	1/2), me	dium plasticit	y, slightly r	noist.	
				19-											
48			-0.0-	20		X -	/////// -	Boring terminated a 1015.	t 20 fe	eet bg:	s. Borin	g filled and se	ealed with r	neat cement a	t
		 		21-			1								

						*********	***************************************	CL	JENT	***************************************	SITE N	IUMBER	LO	CATION	
		NGINE	ERING					R.V	V.L. Investment	s, Inc	. Т	IDEWATER	3	19 Tidewa Dakland, C	
LOG	OF SC				() -	4		RILLING AND AMPLING METHOD	< Ged	probe 54	I to 2 feet bgs with 10 utilizing direct- I-tube soil samplir	n hand auger	. Drilled and sar	mpled with
COO	RDINA	TEQ.						V	VATER LEVEL	⊈ 10	0.8				***************************************
	ATION		OF CA	ASING	3 :				TIME	12	17		***************************************	START TIME	FINISH TIME
	NG BE	***************************************							DATE	9/2	4/08			1140	1300
	LING C NSE N								REFERENCE		SS			DATE 9/24/08	DATE 9/24/08
	HES			910					ACE CONDITIONS					0.2 00	1 0.2 ,, 00
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING	DEPTH (feet)	SAMPLE FR SAMP	SAMPLE	GRAPHIC LOG		WHWMM			Asphalt			·····
DRI	RE	SAN	NE.	DEF (fee	AIR S	SOIL SA	G8/2	DESC	RIPTION BY:		M	I. Garcia			-
				0			AC/AB	Aspl	halt to 4 inches bgs.						
				1				Han	d cleared to 2 feet b	gs with	n hand a	luger, no recov	ery.		
24	24			2		X		CLA	Y - dark greenish gr	ay (GL	EY1 10	GY 4/1), firm, l	ow plastici	ty, slightly mo	oist.
Z 41	24		0.0	3			CL								
				4			FILLX SW		VEL - multicolor, su e broken concrete, o		lar grav	el 0.25 to 0.5 in	nches in di	ameter, with	
48	48			5			sv.	4' - \$ med	SAND - dark greenis ium grained sand, w	h gray	(GLEY me little	1 10Y 4/1), very subangular gra	y loose, we wel 0.25 in	ell-graded fine oches in diam	e to eter,
			0.0			X		dry. 4.5'	- CLAY - greenish b	ack (G	GLEY1 1	0Y 2.5/1), very	soft, low p	olasticity, moi	st.
				6											
~~~···				7											
48	48			8											
				9											
			***************************************	10-		X									
			0.0	∑ 11—				441	11.5' - little organic	materi	ial wat	to moiat			
				12				11 ~	11.5 - Illie organic	mater	iai, weti	to moist.			
48	4.5						CL								
	42-			13				- we	ι.						
				14				Grou	undwater sample co ng screened betwee	lected	at 1217	by peristaltic pet bos.	oump and t	temporary PV	vc
48			0.0	15-		X			-						
				16				SAN	DY CLAY - greenish	black	(GLEY	1 10Y 2.5/1), so	oft, low pla	sticity, moist.	
48		***************************************		17											
	30-			18											
************			***************************************	19											
						X									
			-0.0-	20				Borii 1230	ng terminated at 20 ).	feet bo	js. Borin	ng filled and sea	aled with n	eat cement a	t
				21		1	-								

idewater Avenuand, California led and sampled with ad driving 1.25-inch  FART FINISH E TIME 410 1830 TE DATE 25/08 9/25/08
FART FINISH E TIME 410 1830 E DATE
E TIME 410 1830 E DATE
E TIME 410 1830 E DATE
E DATE
l
ar to
gments.
orary PVC
ement at
amoset at
gn

	<u></u>							CLIENT		SITE	NUMBER	LC	CATION	
		- NGINE	ERING					R.W.L. Investment	s, Inc	. т	IDEWATER		19 Tidewa Oakland, C	
LOG		DIL BOI			(	<b>C-</b>	6	DRILLING AND SAMPLING METHOD	S Ge	oprobe 66	d to 2 feet bgs with ha 600 utilizing direct-put al-tube soil sampling s	and auge sh techno	r. Drilled and sai	mpled with
COOI	RDINA	TES.						WATER LEVEL	ӯ 3	8.8		~~~		
ELEV	'ATIOI	N TOP			∋:			TIME	12	259			START TIME	FINISH TIME
		LOW	·····					DATE	9/2	4/08			1140	1320
		COMPA IUMBE						REFERENCE	G	SS		*	9/24/08	9/24/08
INC	HES L K	zo K	(0		u	ے سا		SURFACE CONDITIONS					·	-L
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING	DEPTH (feet)	SAMPLE	SOIL SAMPL	GRAPHIC LOG	DECORPTION DV	····		Asphalt	***************************************	*****	
DR	묎	S B	8분		AIR	SSF	80	DESCRIPTION BY:		N	1. Garcia	······································		······································
***************************************				0			AC/AB	Asphalt to 3 inches bgs						
				1			-	Hand cleared to 2 feet I	gs wit	h hand a	auger, no recovery	y.		
24	24		0.0	2		X	ML	SANDY SILT - black, fir 0.5 inches in diameter,	e grair firm, di	ned sand ry, slight	d, with some suba t petroleum hydroi	ingular ( carbon (	gravels 0.25 t odor.	0
								SAND - very dark greer	ish gra	y (GLE	Y1 10Y 3/1), well-	graded,	fine to coarse	e
48	48							grained sand, loose, mo	oist, sii	gnt petro	oleum hydrocarbo	n odor.		
			13.2	5-	ÌĒ	X	::::::::::::::::::::::::::::::::::::::	Groundwater sample co	llected en 4 ar	at 1259 d 7 feet	9 by peristaltic pur t bgs.	mp and	temporary P\	/C
				6				6' - 7' - wet.						
		·······		7-										
				8		*Australia ***		CLAY - black, very soft	low pl	asticity.	with little roots fro	m 8 to	9 feet bas, me	oist.
48	48			9		***************************************		· · · ·	·	•			3 /	
				10										
			0.0			X	CL							
				-  . 11 		***************************************								
48				- 12		-								
40				13				SANDY CLAY - black, s	oft. lov	v plastic	itv. fine grained sa	and. mo	ist to wet.	
	36	<b></b>		- 14		***************************************		moderate petroleum hy	docarb	on odor	•		•,	
		<u></u>		- 15										
			1.5	15***		X		- moist, slight petroleun	ı hvdro	carbon	odor.			
48				16-				, 5	,					
	36			- 17	$\  \ $	***************************************								
	"			- 18-				~ wet.						
				- 19		***************************************	SM	SILTY SAND - very dar	k green	ish gray	/ (GLEy1 10Y 3/1)	), fine gi	rained sand,	
			-0.0-	20-		X		loose, wet.  Boring terminated at 20	feet b	gs. Borii	ng filled and seale	d with n	eat cement a	ıt
				21-			-	1300.						

	/s I			······································		······································		CLIENT	SITE	NUMBER	LC	CATION	·
		NGINE	ERING					R.W.L. Investments,	Ind.	TIDEWATER		19 Tidewa Oakland, C	
LOG		DIL BOI				C-	7	DRILLING AND SAMPLING METHODS	Geoprobe 6	ed to 2 feet bgs with 600 utilizing direct-ral-tube soil sampling	hand auge oush techno	r. Drilled and sar	npled with
COO	RDINA	TFS.						WATER LEVEL 🗴	5.2	<b>y</b> 20	**************************		
		N TOP	OF CA	ASING	∋:			TIME	1438	1500		START TIME	FINISH TIME
	·····	LOW						DATE 9	9/24/08	9/24/08		1410	1540
		COMPA UMBE						REFERENCE	GS		***************************************	9/24/08	DATE 9/24/08
INC	HES	٠, وڙ	45		i.	y		SURFACE CONDITIONS					
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING	DEPTH (feet)	SAMPLE	SAMPI	GRAPHIC LOG			Asphait			
R	#	SAIC	SA	<del> </del>	AIR	Z S E	RQ	DESCRIPTION BY:	ļ	И. Garcia			
***************************************	***************************************			0				Asphalt to 2 inches bgs.					
				1			1	Hand cleared to 2 feet bgs	with hand	auger, no recove	ery.		
24	24		0.0	2		X	L _{IM} L	CLAYEY SILT - dark green petroleum hydrocarbon odd	nish gray (C	GLEY1 10GY 3/1	), firm, dr	y, slight	
				3				SAND - dark greenish gray	(GLEY1 1	0Y 4/1), well-gra	ded, fine	to coarse	
				4				grained sand, with subangu petroleum hydrocarbon odd	ular gravels or.	s 0.25 inches in o	diameter,	loose, moist,	
48	48			- _∇ 5				Groundwater sample collec	rtad at 1/13	8 hy porietaltic n	umn and	temperany P\	ic.
			3.7	6			;;;\$(v;;;)	casing screened between 5	5 and 7 fee	et bgs.	ump and	temporary in	
				7									
48	48			- 8				CLAY - very dark greenish moist, moderate petroleum	gray (GLE	Y1 10Y 3/1), ver	y soft, lov	v plasticity, ve	ry
				9-					,				
	1	<u> </u>		10-		X							
	ļ		0.7	11-		<u> </u>							
whatehwh whatehwh w www				12				*					
48			***************************************					- slight petroleum hydrocar	bon odor.				
	36			13				SANDY CLAY - very dark g fine grained sand, moist, sl	greenish gr light petrol	ay (GLEY1 10Y : eum hydrocarboi	3/1), low p n odor.	olasticity, very	•
********************************				14			//CL//						
			0.0	15		X							
			0.0	16									
48				17				17' - 20' - dry to moist, no c	ndor to slia	ht netroleum hyd	Irocarbon	odor	
	36			18				Lo dry to moist, flo t	out to any	ne pouroioum nyu		ouoi.	
				19-									
			_			X							
48	48		-0.6-	₹ 20-				SILTY SAND - very dark grands and services of the services of	reenish gra	y (GLEY1 5GY 3	3/1), fine g	grained sand,	
	-	<u> </u>		21-	┨ ┨ ┇		C A CAR	,					



		200 capus		~**************************************					CLIENT	*****	SITE	NUMBER		LOCATION	
								k.	W.L. Investments	s, Inc		TIDEWATE		919 Tidewa	
LOG	OF SC	NGINE			(	<b>C-</b>	8		DRILLING AND SAMPLING METHOD	S Geo	probe 5		ct-push tech	Oakland, C uger, Drilled and s nology and driving	ampled with
COO	RDINA	TES.						T	WATER LEVEL	⊈ 18	5.5				***************************************
1	ATION		OF CA	ASING	<b>)</b> :				TIME	14	50			START TIME	FINISH
	NG BE								DATE	9/2	5/08			1300	1515
i .	LING ( NSE N							F	REFERENCE	G	iS		***************************************	DATE 9/25/08	DATE 9/25/08
	HES	T		0010	ш	<u>.</u>		SUR	FACE CONDITIONS						
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING	DEPTH (feet)	SAMPLE	SAMPLE	GRAPHIC		WWW.			Asphalt			
- RO	R.	SAI	Ş.₩.		AIR	SOU	83	DES	CRIPTION BY:			N. Diem		·	***************************************
n		<b></b>		0			IAC/ABI	Ası	phalt to 3 inches bgs.						
				1		-		Ha	nd cleared to 2.5 feet	bgs w	ith han	d auger, no re	ecovery.		
				2-			<u> </u>								
18	18—		-0.0-	3		X	ML	dia	T - black (10YR 2/1), meter, soft, dry, stron	g petr	oleum	hydrocarbon o	odor.		
				4			//CL// SM //CL//	hyc	.TY CLAY - very dark frocarbon odor. .TY SAND - dark gree	- • •		· ·	•	•	n
48	48			- 5		-7	ML	stro SA	ong petroleum hydrod NDY CLAY - greenish	arbon gray	odor.		-		
			0.0	6		Å		CL	roleum hydrocarbon ( <b>AY</b> - greenish black (f Irocarbon odor.	odor. GLEY1	2.5/1)	, low plasticity	y, soft, moi	st, petroleum	
			Verena de la constanta de la c					SA	NDY CLAYEY SILT - irocarbon odor.	very d	ark gra	y (GLEY1 3/1	), soft, mo	ist, petroleum	
				7				CL. hyd	AY - black (GLEY1 2. irocarbon odor.	5/1), s	tiff, lov	w plasticity, m	oist, faint p	petroleum	
48	48			8				- 00	olor change to dark gr	eenisl	ı gray (	GLEY1 3/1).			
				9											
				10		X									
			0.0	11											
				12					olor change to dark gr olor change to very da	-				al.	
48	48			13											
				14-				wet	NDY CLAY - very dar t.	k gree	nisn gr	ay (GLEY13/	≆), sott, lov	w plasticity, very	1
			0.0	15—		X	ML	SA	NDY SILT - very dark	areen	ish ara	v (GLEY1 3/1	) soft moi	ist to wet	
48	48			16					NDY CLAY - very dark						
				17				Gro	oundwater sample col	lected	at 145	0 by peristalti	c pump an	d temporary PV	′C
				18					sing screened betwee oist.	n 10 8	nu ZV I	eet ugs.			
}			***************************************	19											
48			-0.0-	20-		X		Bo.	ring terminated at 20	Foot ha	ie Bori	na filled and a	عانب احمامه	nost somest -	4
				21				150		ເວດເ ນ(	ja, DUN	ng meu and s	ocaleu WI(N	пса: сепеп: а	ι
<u>}</u>	<u> </u>	<u> </u>		41	Ш	$\prod$									

A.							CLIENT SITE NUMBER LOCATION
		NGINE					R.W.L. Investments, Inc. TIDEWATER 4919 Tidewater Aven Oakland, California
LOG (	OF SC	IL BOI	RING:		C-	9	DRILLING AND SAMPLING METHODS Geoprobe 54100 utilizing direct-push technology and driving 1.25-inch diameter dual-tube soil sampling system.
COOF	RDINA	TES:					WATER LEVEL
				ASING:			TIME 0800 START FINISH
		LOW :					DATE 9/25/08 0730 0855
		UMBE					REFERENCE   GS   9/24/08   9/24/0
INCI EN	声 RECOVER ^ぬ	BLOWS / 6" SAMPLER	OVA READING	H and	R SAMPLE	GRAPHIC LOG	SURFACE CONDITIONS  Asphalt
DRIVEN	REC	BLO	OVA	DEPTH (feet)	WATER S	GRA LOG	DESCRIPTION BY: N. Diem
				0-		AC/AB	Asphalt to 2 inches bgs.
				1		-	Hand cleared to 2 feet bgs with hand auger. Attempted to sample but no recovery. Hand cleared to 4 feet bgs.
48	48		0.0	3		ML SM CL	SANDY SILT - very dark grayish brown (10YR 3/2), little subangular gravels 0.25 inches in diameter, soft, moist, strong petroleum hydrocarbon odor. 4.5' - SILTY SAND - dark gray (10YR 4/1), well-graded, with little subangular gravels 0.25 inches in diameter, loose, moist, strong petroleum hydrocarbon odor. 5' - SANDY CLAY - very dark gray (GLEY1 3/1), fine grained sand, firm, visible product present.  GRAVEL WITH FINE GRAINED SAND - subangular to subrounded 0.25" to
48	48		0.0	9		ML SM.	0.75" in diameter, poorly sorted, visible product present. 7' - SANDY SILT - dark gray (10YR 4/1), half organic material, soft, moist, strong petroleum hydrocarbon odor, visible product in soil and groundwater samples.  SILTY SAND - dark greenish gray (GLEY1 4/1), round to subangular gravels from 0.25 to 0.5 inches in diameter, loose, wet, strong petroleum hydrocarbon odor.  8.5' - CLAY - very dark greenish gray (GLEY1 3/1), soft, low plasticity, moist, little fine grained sand, strong petroleum hydrocarbon odor.  Groundwater sample collected at 0800 by peristaltic pump and temporary PVC casing screened between 6 and 8 feet bgs.
48	48			12			- no sand content.  SANDY SILTY CLAY - very dark grayish brown (10YR 3/2), firm, low plasticity,
				13-			wet, slight petroleum hydrocarbon odor.
			0.0	15	X	CL	- dense, moist.
48	48			16—	Village of the Control of the Contro		SILTY CLAY - dark gray (10YR 4/1), stiff, low plasticity, wet to moist, slight petroleum hydrocarbon odor.
				18			
	**********************			19-	X	ML	SANDY SILT- dark gray (10TR 4/1), medium stiff, moist.
			0.0—	20-		<del>╕</del> ┈╵┈┘╺╨╶ ┥	Boring terminated at 20 feet bgs. Boring filled and sealed with neat cement at 0830.

A	<u> </u>					***************************************	***************************************	CLIENT		SITE	NUMBER	LC	CATION	
		NGINE	ERING					R.W.L. Investmer	ts, Inc		TIDEWATER		19 Tidewa Oakland, C	
LOG		DIL BOI			C	;-1	0	DRILLING AND SAMPLING METHO	DS Ge	оргоbe 8	ed to 2 feet bgs with 410 utilizing direct-p ral-tube soil sampling	hand auger oush techno	r. Drilled and sa	mpled with
COOF	RDINA	ATFS:						WATER LEVEL	ӯ 3	3.7			<b>T</b>	***************************************
		N TOP	OF C	ASING	∋:			TIME	15	515			START TIME	FINISH TIME
		ELOW						DATE	9/2	4/08			1450	1605
		COMPA IUMBE						REFERENCE	(	es			9/24/08	DATE 9/24/08
INCI		/6"	o		MD: FI	3 2 2	U	SURFACE CONDITIONS		***************************************	Asphalt			<u>. I</u>
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING	DEPTH (feet)	R SAMPL	SOIL SAMP	GRAPHIC LOG	DESCRIPTION BY:	***************************************		•	<del></del>	······································	**************************************
	<u> </u>	l m o	OR	- 0-	43	\$ 05 G	O.J.	Asphalt to 2 inches bg			N. Diem		***************************************	
				1-				, apriante 2 meneo 59		المستعادا				
				2				Hand cleared to 2 feet	_		- ·	ŕ		
18	18		0.0	3		X	ML	SANDY SILT - dark bro dry.				vel 0.25-i	nch in diame	ier,
				Ā				- color change to black SAND - very dark gray	(10YR	3/1), lo	ose, fine to coars	se grained	l, well graded	,
48	48			4-		***************************************		little gravel 0.25-inch in	i diame	ter, mo	ist.			
			0.0	5-		X								
				6-			. SW:	Groundwater sample of casing screened between	ollected en 6 ar	i at 151 nd 8 fee	5 by peristaltic p et bgs.	ump and	temporary P\	/C
				7										
48	48			8-		-		- color change to dark	gray (10	)YR 4/	I), some gravel w	ith sea sl	hells.	
				9-				SILTY CLAY - very dar	k gray (	(10YR :	3/1), soft, low pla	sticity, mo	oist.	
	·*************************************		0.1	10	1	X	CL							
			-	11										
48	48			- 12-	-			CLAYEY SILT - very d	ark gray	(10YF	3/1), hard, mois	t.		
				13										
,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,				14	$\left\  \cdot \right\ $		6.41							
			-0.0-	15-	-	X	ML							
				16-	$\left  \cdot \right $									
48	48			- 17-	-			SILTY SAND - very da	k arav	(10YR :	3/1), fine grained	, poorly-a	raded, verv	
				18-	-			dense, moist.	,		-71a giwaiwa	,		
				- 19-			SP	The second of th						
			0.0-	20		X		Daving to the Control of the Control	) #r - ( )	5	lana 2011 o oli oi ili	d= at 141		
				21			***************************************	Boring terminated at 2 1530.	reet b	gs. Bor	ing tilled and sea	lied with n	eat cement a	it.
				21	11		1							

B										CLIENT		SITE	NUMBER	LC	CATION	
		NGINE	ERING						F	R.W.L. Investment	s, Inc	 	ΓΙDEWATE		19 Tidewa Oakland, C	
LOG		DIL BOI			(	}-	1′	1		DRILLING AND SAMPLING METHOD	S Geo	probe 5	d to 4 feet bgs w 410 utilizing dire al-tube soil samp	vith hand auge ct-push techno	r. Drilled and sa	mpled with
COO	RDINA	TFS.								WATER LEVEL	፟	7				
		N TOP	OF CA	ASING	3:					TIME	13	55			START_ TIME	FINISH TIME
		LOW								DATE	9/2	4/08			1230	1500
		COMPA UMBE								REFERENCE	G	S			DATE 9/24/08	DATE 9/24/08
	HES				Π	¥			SL	JRFACE CONDITIONS	I		Ll		<u> </u>	
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING	DEPTH (feet)	SAMPLE	SAMPLI	OVERED	GRAPHIC LOG					Asphait			••••
DR	RE	SAI	\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \		AIR	SOIL	REC	<u> </u>	DE	ESCRIPTION BY:			N. Diem			
				0			<b>T</b>	CIAB	Α	sphalt to 2 inches bgs.						
				1						land cleared to 2 feet becovery.	gs with	n hand	auger. Attemp	oted to samp	ole at 2 feet b	ut no
18	0			2						Sand and gravel fill to 4	feet bo	gs, no r	ecovery.			
				3												•
				4	$\left\{ \ \right\}$			7777	   c	CLAY - very dark grayis	h brow	n (10Y	R 3/2), low pla	asticity, soft,	slightly moist	t.
48	48			5				CL		ttle sand.		,	77	, ,	<b>-</b>	•
			0.0	6		$\perp$										
				<u> </u>					8	SAND - very dark gray (	10YR ;	3/1), pc	orly-graded, f	ine grained,	loose, moist.	
	***************************************							SP	C	Froundwater sample co asing screened betwee	llected in 6 an	at 135 d 8 fee	5 by peristaltion t bgs.	c pump and	temporary P\	/C
48	48			8-			7	77777	c	CLAY - very dark gray (	10YR 3	3/1). me	edium plasticit	v stiff mois	t little sand	
				9						,,, (		,		.,,,	.,	
***************************************			0.0	10		X		CL								
				11-	-											
				12	-		2		s	SILTY SAND - very dark	gray (	10YR 3	3/1), poorly-so	rted, fine gr	ained, loose,	wet.
48	48			13				SP.					, , , ,			
	<u></u>			14						SANDY CLAY - very dar helis.	k gray	(10YR	3/1), soft, low	plasticity, n	noist, few sea	l
			***************************************	15				///// /CL//								
			0.0			X										
48	48			16			1	<i></i> SP	S	SAND - very dark gray (	10YR 3	3/1), po	orly-graded, f	ine grained,	loose, wet.	
			***************************************	17					s	ANDY CLAY - very dar	k gray	(10YR	3/1), soft, low	plasticity, n	noist.	
				18-			//	/////	S	SILTY SAND - very dark	gray (	10YR 3	3/1), poorly-gra	aded, fine gr	ained, mediu	m
			***************************************	19				SP	d	ense, moist.						
			0.0	20-	$\Big] \Big[$	X			B	Soring terminated at 20	feet hr	ıs, Bori	ng filled and s	ealed with r	eat cement a	ıt
***************************************				21					1	430.		, 5, 5011			out comont a	•
	I	Ī	1	I -	1.1	-1-1	1 1		i							

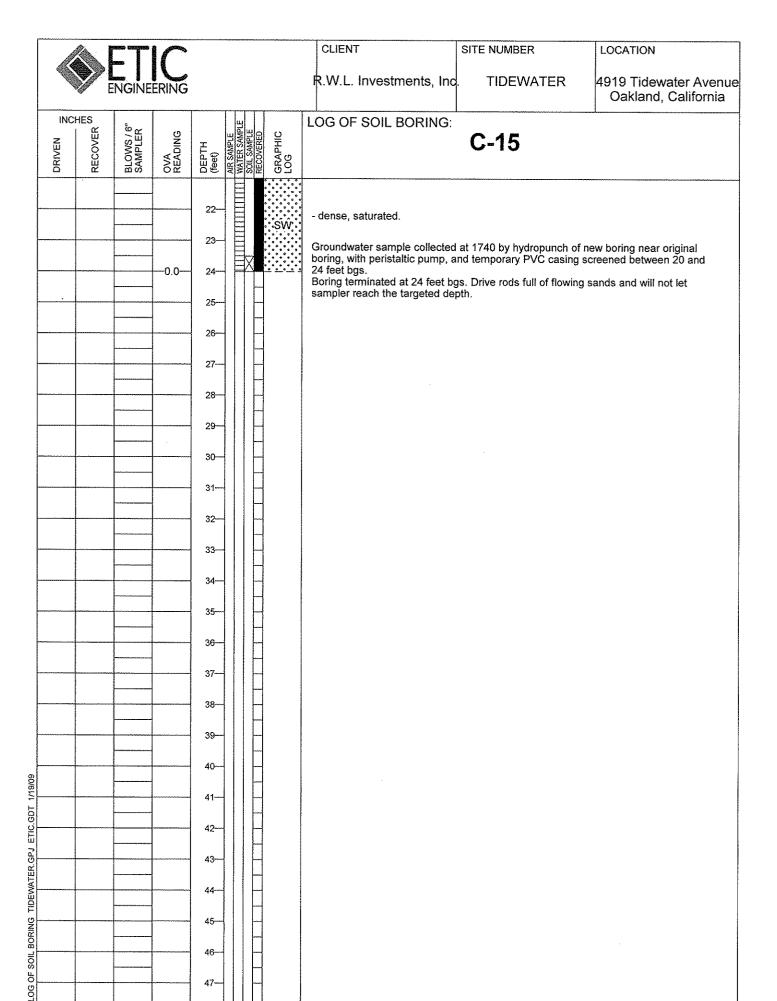
						***************************************		CLIENT		SITE	NUMBER	LC	CATION	
		NGINE						R.W.L. Investmen	ts, Ind	 	TIDEWATER		19 Tidewa Oakland, C	
LOG	OF SC				(	<b>`</b> =	12	DRILLING AND SAMPLING METHO	OS Ge	oprobe s	ed to 2 feet bgs with ha 6410 utilizing direct-pus aal-tube soil sampling s	and auge sh techno	r. Drilled and sa	mpled with
COO	RDINA	TEQ.						WATER LEVEL	<u>⊽</u> 1	0.7				
	ATIO!		OF CA	ASINO	<b>3</b> :			TIME	1:	540			START	FINISH TIME
CASI	NG BE	LOW	SURF	ACE:				DATE	9/2	5/08			1500	1620
	LING ( NSE N							REFERENCE		 3S		······································	DATE 9/25/08	DATE 9/25/08
	HES	I		1910				SURFACE CONDITIONS						
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING	DEPTH (feet)	AMPLE	SAMPLE	RECOVERED GRAPHIC LOG				Asphalt			
DR	REC	BLC	NE.	DEF (fee)	AIRS	SOIL	GR GR	DESCRIPTION BY:			M. Garcia		-	
				- 0			IAC/AB	Asphalt to 3 inches bg	<b>3</b> .					
				1	-		_	Hand cleared to 2 feet	bgs wit	h hand	auger, no recovery	<i>I</i> .		
			······································	2	1		_							
18	18-		-0.0	- 3	_	X		SANDY CLAY - dark gi grained sand, with ang	eenish ular gra	gray (0 wels 0.	SLEY1 10Y), soft, le 25 inches in diame	ow plas ter, slig	ticity, moist, f ht petroleum	ine
······································				4	4		CL	hydrocarbon odor.						
48	48			5										
	***************************************		0.0			X		CLAY - black (10YR 2/ hydrocarbon odor.	1), very	soft, k	ow plasticity, moist,	slight p	oetroleum	
				6-										
				- 7				- mostly root and stem	maferi	al le				
48	48	<b>_</b>		- 8				- color change to greer			Y1 10Y).			
····································				9				- hydrogen sulfide odol			·			
	<u> </u>		-0.0-	10-	$\left\  \cdot \right\ $	X								
				∇ 11-	4									
				- 12					. ,		N = 141 4010	6.1		
48	48			13				SANDY CLAY - dark gr fine grained sand, mois	eenisn it.	gray (C	SLEY1 10Y), very s	ott, low	plasticity, vei	ry
				13			//CL//							
				- 14										
			0.0	15		P		CLAYEY SAND - dark dense, moist to wet.	greenis	h gray	(GLEY1 10Y), very	fine gra	ained sand,	
48	48			16				- saturated.						
	"			- 17				Groundwater sample c casing screened between	ollected en 16 a	i at 154 and 18	0 by peristaltic pun feet bgs.	np and	temporary P\	/C
				18				- moist to wet.						
				19-										
			0.0-	- 20										
48	48		]			***************************************		20' - 21' - saturated.						
				21-	11		アフンドス	Ĭ						

CLIENT SITE NUMBER LOCATION R.W.L. Investments, Ind. **TIDEWATER** 4919 Tidewater Avenue Oakland, California INCHES LOG OF SOIL BORING: BLOWS / 6" SAMPLER OVA READING RECOVER GRAPHIC LOG C-12 DEPTH (feet) - moist to wet, small shell fragments. 22 22' - 22.5' - sand content reduces to some sand. CLAY - very dark greenish gray (GLEY1 5G), low plasticity, with some fine 23grained sand, hard, moist. 24 CLAYEY SANDY SILT - light olive brown (2.5Y 5/6) mottled with light olive 48 48 brown (2.5Y 5/4), very stiff, very fine grained sand, with little angular and subangular gravels less that 0.25 inches in diameter, moist. 25 25' - SANDY SILT - light olive brown (2.5Y 5/6) mottled with light olive brown 0.0 (2.5Y 5/4), very stiff, moist. 26 ML 27 28-CLAY - light yellowish brown (2.5Y 6/4), very stiff, low plasticity, with little fine 24 24 grained sand, slightly moist to moist. 29-- stiff. 0.0-30-Boring terminated at 30 feet bgs. 31-32-33-34 35-36 37-38-39 40-41-ETIC, GDT 42-BORING TIDEWATER.GPJ 43-44 45 46 SOIL A S 47

	 la I							CLIENT SITE NUMBER LOCATION	
		NGINE	EDINIC					R.W.L. Investments, Inc. TIDEWATER 4919 Tidewater Av Oakland, Californ	
LOG	OF SC				C	<b>,</b> '	13	DRILLING AND SAMPLING METHODS SAMPLING METHODS Geoprobe 5410 utilizing direct-push technology and driving 1.25-in diameter dual-tube soil sampling system.	with
COO	RDINA	TEQ.						WATER LEVEL   Ø 6	
	ATION		OF CA	ASING	3:			TIME 1120 START FIN	NISH
CASI	NG BE	LOW	SURF	ACE:					240
	LING ( NSE N							REFERENCE GS DATE DATE DATE 9/25/08 9/2	E 5/08
	HES			970	l u	П		SURFACE CONDITIONS	
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING	E (	AIR SAMPLE WATER SAMP	SAMPLE	GRAPHIC LOG	Asphalt	
8	REC	SAM	NEA REA	DEPTH (feet)	WA'TE	SOIL	GRA LOG	DESCRIPTION BY: N. Diem	
				0	1		IAC/AB	Asphalt to 3 inches bgs.	
				1		-		Hand cleared to 2.5 feet bgs with hand auger, no recovery.	
				2			-		
18	18		-0.0-	3		X	SM:	SILTY SAND - brown (7.5YR 4/4), fine to coarse grained, loose, dry, some angular gravel less than 0.25 inches in diameter.	
*******				4			//ci//	SANDY CLAY - very dark greenish gray (GLEY1 3/1), stiff, low plasticity, moist,	
48							-	very fine grained sand.	
	36			5		X		SILTY CLAY - very dark greenish gray (GLEY1 3/1), stiff, low plasticity, moist.	
			1	₫ 6-			CL	Groundwater sample collected at 1120 by peristaltic pump and temporary PVC casing screened between 4 and 8 feet bgs.	
***************************************				7	╽╞			CLAY - greenish black (GLEY1 2.5/1), firm, low plasticity, moist.	
40	40			8	IF			CLAY - very dark greenish gray (GLEY1 3/1), stiff, low plasticty, moist, organic	
48	48			9		X		material from 8 to 10 feet bgs.	
				10					
			0.0	11					
48	48			12			CL	SILTY CLAY -greenish black (GLEY1 2.5/1), soft, non-plastic, wet.	
				13				CLAY - greenish black (GLEY1 2.5/1), soft, low plasticity, moist.	
·				14	$\left\{ \left[ \right] \right\}$				
				15				- wet.  SILTY CLAY - greenish black (GLEY1 2.5/1), stiff, low plasticity, moist, little fine	
			0.0	16			//CL//	grained sand, shell fragments.	
48	48					***************************************		CLAY - very dark greenisg gray (GLEY1 2.5/1), firm, low plasticity, moist.	
				17		***************************************		SANDY SILTY CLAY - very dark greenish gray (GLEY1 2.5/1), soft, moist, some fine grained sand, shell fragments.	
				18			//CL//		
·····			······································	19					
			0.0-	20		X		Boring terminated at 20 feet bgs. Boring filled and sealed with neat cement at	
***************************************				21			_	1230.	
	1	1	ŧ	I	1 1	1 1	1	The state of the s	

								CLIENT SITE NUMBER LOCATION
		NGINE	FRING					R.W.L. Investments, Inc. TIDEWATER 4919 Tidewater Avenu Oakland, California
LOG	OF SC				C	<b>)-</b> 1	14	DRILLING AND SAMPLING METHODS Hand cleared to 2.5 feet bgs with hand auger. Drilled and sampled with Geoprobe 5410 utilizing direct-push technology and driving 1.25-inch diameter dual-tube soil sampling system.
COOL	RDINA	TES:						WATER LEVEL   7.8
	ATION		OF CA	ASING	<b>3</b> :			TIME 1035 START FINISH TIME TIME
	NG BE							DATE 9/25/08 1000 1120
	LING ( NSE N							REFERENCE GS DATE DATE 9/25/08 9/25/08
	RECOVER S	BLOWS / 6" SAMPLER	SING	Ŧ	WPLE	MPLE	HIC	SURFACE CONDITIONS  Asphalt
DRIVEN	RECC	BLOV	OVA READING	DEPTH (feet)	AIR SAI	SOIL SA	GRAPHIC LOG	DESCRIPTION BY: N. Diem
				0-			AC/AB	Asphalt to 2 inches bgs.
				1				Hand cleared to 2.5 feet bgs with hand auger, no recovery.
18	-18		-0.0-	3-		X	.GW	GRAVEL WITH SILT AND SAND - dark brown (2YR 3/3), angular to subangular gravels 0.25 to 0.50-inch in diameter, loose, dry.
				4		_	∴SM	CLAYEY SILTY SAND - very dark gray (10YR 3/1), very fine grained sand,
48	48			5				dense, moist to wet. 4' - SILTY CLAY - dark greenish gray (GLEY1 4), stiff, low plasticity, stiff, wet to moist.
			0.0			X	CL	
				6				Groundwater sample collected at 1035 by peristaltic pump and temporary PVC casing screened between 4 and 8 feet bgs.
				7-				CLAY - reddish black (2.5YR 2.5/1), stiff, low plasticity, moist.
48	48			8-				- color change to greenish black (GLEY1 2.5), low plasticity, soft, wet.
			0.0	10		X		
				11				- low plasticity, firm, moist.
48	48			12-				- color change to very dark grayish brown (10YR 3/2).
	1.7			13-		1		
				14				
			0.0—	15		X		15' to 15.5' - organic material.
				16				
48	48		<u> </u>	17				
				18				
				19				SANDY CLAY - dark gray (10YR 3/1), stiff, low plasticity, moist.
						X		
			0.0-	20-				Boring terminated at 20 feet bgs. Boring filled and sealed with neat cement at 1100.
	<u> </u>			21—	Ш			

	ea P									CLIENT		SITE	NUMBER	1	LOCATION	
									F	R.W.L. Investment	s, Inc		TIDEWATE		919 Tidewa	
LOG		NGINE			C	:-1	5			DRILLING AND SAMPLING METHOD	s Geo	oprobe (	5410 utilizina dire	ct-push tech	Oakland, C ger. Drilled and sar nology and driving e soil sampling sys	npled with
COO	RDINA	TEQ.								WATER LEVEL	ӯ 3	.8	<b>▼</b> 20.0			***************************************
i		N TOP	OF CA	ASINC	3:					TIME	16	39	1740		START TIME	FINISH TIME
CASI	NG BE	LOW :	SURF	ACE:						DATE	9/2	5/08	9/25/08		1635	1750
1		OMPA UMBE								REFERENCE		 SS	GS		DATE 9/25/08	DATE 9/25/08
ļ	HES	I		3970	E		-		sı	JRFACE CONDITIONS					3,20,00	0,20,00
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING	DEPTH (feet)	AMPLE ER SAMP	SAMPLE	APHIC	Fog				****	Soil	****		
DRI	REC	SAN	88	(fee	AIRS	SOIL SA RECOVE	GR/	ŠŠ	DE	SCRIPTION BY:	······		M. Garcia	****		***************************************
48				0			AC	/ABI	1 '	sphalt to 3 inches bgs.						
	36			1				1T	S	land cleared to 2 feet b IANDY SILT - dark yello rith angular to subangu	- wish b	rown (	10YR 4/6), sti	ff, very fine	grained sand,	
				2	-	X			ľ	nin angular to subangu	ar gra	veis ire	วทา บ.25 เอ บ.5	inches in o	diameter, dry.	
			0.0	3—	-											
	<u> </u>								-	firm, moist, strong petr	oleum	hydro	carbon odor.			
48	48		-0.0	5		X	A	/L	-	organic material.						
				6				***************************************	0	Groundwater sample co asing screened betwee	lected n 4 an	at 164 d 8 fee	I5 by peristalti et bgs.	c pump an	d temporary PV	C
48	48			8		**************************************			C	<b>:LAY</b> - very dark greeni noist.	sh gra	y (GLE	Y1 10Y), soft	to very sof	t, low plasticity,	
				9												
			0.0	11		X										
48	48			12-					S	ANDY CLAY - very dar noist to wet.	k gree	nish gı	ay (GLEY1 10	Y), very so	oft, low plasticity	<b>/</b> ,
				13				1								
			0.0	15		X										
48	48		V.V	16					d	LAYEY SAND - very da ense, moist.	ırk gre	enish (	gray (GLEY1 1	I0Y), very f	fine grained sar	ıd,
				17												
48				19	***************************************		// s	// M	C	:LAYEY SILTY SAND - and, dense.	dark g	reenisl	n gray (GLEY1	l 10Y), ver	y fine grained	
48	48		-0.0-	¥ 20 21−			:.! :::s	W.	s	AND - very dark greeni rained sand, with small	sh gra shell t	y (GLE ragme	Y1 10Y), well- nts, medium o	-graded, fir lense, moi:	ne to medium st.	



, do						***************************************			CLIENT	•••	SITE	NUMBER	LO	DCATION	***************************************
		NGNE	FRING					-	R.W.L. Investments	s, Inc	. 7	FIDEWATE	1	19 Tidewa Oakland, C	
LOG	OF SO	IL BOI	RING:		C	;-1	6	THE PERSONNEL PROPERTY OF THE PERSON NAMED IN	DRILLING AND SAMPLING METHOD	S Geo	probe 6	d to 2 feet bgs v 600 utilizing dire al-tube soil sam	vith hand auge ct-push techno	r. Drilled and sai plogy and driving	mpled with
COOF	RDINA	TES.							WATER LEVEL	<u>⊽</u> 6	.5				
	ATION		OF CA	ASING	3:				TIME	09	10			START TIME	FINISH TIME
	NG BE								DATE	9/2	5/08			0855	1020
i	LING C NSE N							-	REFERENCE	G	SS			DATE 9/25/08	DATE 9/25/08
	HES							su	RFACE CONDITIONS						1
DRIVEN	RECOVER	BLOWS / 6" SAMPLER	OVA READING	H ()	AMPLE R SAMP	SAMPLE WERED	GRAPHIC LOG					Asphait			
DRI	REG	BLO	Ş₩.	DEPTH (feet)	AIR S	SOIL SAI	088 000	DE	SCRIPTION BY:		•	N. Diem			
				0			IAC/AB	A	sphalt to 3 inches bgs.						
***************************************				1 2				H re	and cleared to 2 feet becovery.	gs with	n hand	auger; sampk	ed with slide	hammer, no	
18	18		-0.0-	3		X		Si	ILTY CLAY - very dark ravels 0.25 inches in di	green amete	ish brov r, mois	wn (2.5Y 3/2), t, slight petrol	stiff, with lit eum hydroc	tle angular arbon odor.	
48				4 5				G	to 6' - no recovery; so roundwater sample col asing screened betwee	lected	at 091	0 by peristalti	c pump and	temporary P\	/C
	24		0.0	<u>Ā</u>		X			lood chips, very little to						
48				7 8 9				8'	to 10' - no recovery.						
	24			10				W	lood chips, wet.						
				11				S	ANDY SILTY CLAY - da	ark gre	enish g	gray (GLEY1 4	4/1), stiff, lov	w plasticity, w	et.
48	48		0.0	12 13 14		X	CL	- *	slightly more sand, soft	, wet.					
				15		$\triangleright$									
48	48		-0.0-	16			ML	S	ANDY SILT - very dark	green	ish gray	y (GLEY1 3/1)	), stiff, moist		
				17				C	LAY - very dark greenis	sh gray	y (GLE`	Y1 3/1), stiff, l	ow plasticity	, moist.	
				18				S	ANDY SILT - very dark	green	ish gray	y (GLEY1 3/1)	, stiff, moist	•	
			-0.0-	19— 20—		X	ML								
48			<b>V.</b> V	21—				Bo	oring terminated at 20 t	eet bo	IS.				

## Appendix D

**Laboratory Analytical Reports and Chain-of-Custody Documentation** 



Date: 10/03/2008

Maura Dougherty ETIC Engineering, Inc 2285 Morello Avenue Pleasant Hill, CA 94523

Subject: 1 Soil Sample
Project Name: Tidewater
Project Number: TMTIDE4, 2

Dear Ms. Dougherty,

Chemical analysis of the samples referenced above has been completed. Summaries of the data are contained on the following pages. Sample(s) were received under documented chain-of-custody. US EPA protocols for sample storage and preservation were followed.

Kiff Analytical is certified by the State of California (# 2236). If you have any questions regarding procedures or results, please call me at 530-297-4800.

Sincerely,



Date: 10/03/2008

Subject :

1 Soil Sample Tidewater

Project Name : Project Number :

TMTIDE4, 2

## Case Narrative

Matrix Spike/Matrix Spike Duplicate results associated with sample DRUM 1 for the analytes 1,1-Dichloroethane, Benzene, and Chlorobenzene were outside of control limits. This may indicate a bias for the sample that was spiked. Since the LCS recoveries were within control limits, no data are flagged.

Matrix Spike/Matrix Spike Duplicate results associated with sample DRUM 1 for the analyte Toluene were affected by the analyte concentrations already present in the un-spiked sample.



Project Name: Tidewater Project Number: TMTIDE4, 2

Date: 10/03/2008

Report Number: 65042

Sample: DRUM 1

Matrix : Soil

Lab Number : 65042-01

Sample Date :09/25/2008		Method		•	
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling tha	<b>24</b> n typical Diese	1.0 el Fuel.)	mg/Kg	M EPA 8015	09/30/2008
TPH as Motor Oil	58	10	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr) 1-Chlorooctadecane (Diesel Surrogate)	81.9 78.0		% Recovery % Recovery	M EPA 8015 M EPA 8015	09/30/2008 10/01/2008



Date: 10/03/2008

Sample: DRUM 1

Project Name: Tidewater

Project Number: TMTIDE4, 2

Lab Number : 65042-01

Date Analyzed: 09/30/08

Matrix : Soil

Sample Date :09/25/2008

Analysis Method: EPA 8260B

Parameter	Measure Value	ed 1 MRL	Units	Parameter	Measure Value	d 1 MRL	Units
TPH as Gasoline	< 1.0	1.0	mg/Kg	Bromoform	< 0.0050	0.0050	mg/Kg
				1,1,2,2-Tetrachloroethane	< 0.0050	0.0050	mg/Kg
Dichlorodifluoromethane	< 0.0050	0.0050	mg/Kg	1,2,3-Trichloropropane	< 0.0050	0.0050	mg/Kg
Chloromethane	< 0.0050	0.0050	mg/Kg	n-Propylbenzene	< 0.0050	0.0050	mg/Kg
Vinyl Chloride	< 0.0050	0.0050	mg/Kg	Bromobenzene	< 0.0050	0.0050	mg/Kg
Bromomethane	< 0.020	0.020	mg/Kg	1,3,5-Trimethylbenzene	< 0.0050	0.0050	mg/Kg
Chloroethane	< 0.0050	0.0050	mg/Kg	2+4-Chlorotoluene	< 0.0050	0.0050	mg/Kg
Trichlorofluoromethane	< 0.0050	0.0050	mg/Kg	tert-Butylbenzene `	< 0.0050	0.0050	mg/Kg
1,1-Dichloroethene	< 0.0050	0.0050	mg/Kg	1,2,4-Trimethylbenzene	< 0.0050	0.0050	mg/Kg
Methylene Chloride	< 0.0050	0.0050	mg/Kg	sec-Butylbenzene	< 0.0050	0.0050	mg/Kg
trans-1,2-Dichloroethene	< 0.0050	0.0050	mg/Kg	p-isopropyltoluene	< 0.0050	0.0050	mg/Kg
1,1-Dichloroethane	< 0.0050	0.0050	mg/Kg	1,3-Dichlorobenzene	< 0.0050	0.0050	mg/Kg
2,2-Dichloropropane	< 0.0050	0.0050	mg/Kg	1,4-Dichlorobenzene	< 0.0050	0.0050	mg/Kg
cis-1,2-Dichloroethene	< 0.0050	0.0050	mg/Kg	n-Butylbenzene	< 0.0050	0.0050	mg/Kg
Chloroform	< 0.0050	0.0050	mg/Kg	1,2-Dichlorobenzene	< 0.0050	0.0050	mg/Kg
Bromochloromethane	< 0.0050	0.0050	mg/Kg	1,2-Dibromo-3-chloropropane	< 0.0050	0.0050	mg/Kg
1,1,1-Trichloroethane	< 0.0050	0.0050	mg/Kg	1,2,4-Trichlorobenzene	< 0.0050	0.0050	mg/Kg
1,1-Dichloropropene	< 0.0050	0.0050	mg/Kg	Hexachlorobutadiene	< 0.0050	0.0050	mg/Kg
1,2-Dichloroethane	< 0.0050	0.0050	mg/Kg	Naphthalene	< 0.0050	0.0050	mg/Kg
Carbon Tetrachloride	< 0.0050	0.0050	mg/Kg	1,2,3-Trichlorobenzene	< 0.0050	0.0050	mg/Kg
Benzene	< 0.0050	0.0050	mg/Kg				
Trichloroethene	< 0.0050	0.0050	mg/Kg	1,2-Dichloroethane-d4 (Surr)	106		% Recove
1,2-Dichloropropane	< 0.0050	0.0050	mg/Kg	4-Bromofluorobenzene (Surr)	110		% Recove
Bromodichloromethane	< 0.0050	0.0050	mg/Kg	Toluene - d8 (Surr)	91.5		% Recover
Dibromomethane	< 0.0050	0.0050	mg/Kg				
cis-1,3-Dichloropropene	< 0.0050	0.0050	mg/Kg				
Toluene	< 0.0050	0.0050	mg/Kg				
trans-1,3-Dichloropropene	< 0.0050	0.0050	mg/Kg				
1,1,2-Trichloroethane	< 0.0050	0.0050	mg/Kg				
1,3-Dichloropropane	< 0.0050	0.0050	mg/Kg	÷			
Tetrachloroethene	< 0.0050	0.0050	mg/Kg				
Dibromochloromethane	< 0.0050	0.0050	mg/Kg				
1,2-Dibromoethane	< 0.0050	0.0050	mg/Kg				
Chlorobenzene	< 0.0050	0.0050	mg/Kg				
1,1,1,2-Tetrachloroethane	< 0.0050	0.0050	mg/Kg				
Ethylbenzene	< 0.0050	0.0050	mg/Kg				
Total Xylenes	< 0.0050	0.0050	mg/Kg				
Styrene	< 0.0050	0.0050	mg/Kg				
Isopropyl benzene	< 0.0050	0.0050	mg/Kg				
MRI = Method reporting limit			- <b>-</b>				

¹⁾ MRL = Method reporting limit

²⁾ MRL raised due to interference



Date: 10/03/2008

Project Name : **Tidewater**Project Number : **TMTIDE4, 2** 

Sample: DRUM 1

Matrix : Soil

Units

Lab Number : 65042-01

Sample Date :09/25/2008

Method Measured Reporting Value Limit

Analysis Method

Date Analyzed

Lead

Parameter

**6.5** 0.50

mg/Kg EPA 6010B

10/02/2008

Date: 10/03/2008

QC Report : Method Blank Data

Project Name : Tidewater

Project Number: TMTIDE4, 2

Lead         < 0.50         0.50           TPH as Diesel (Silica Gel)         < 1.0         1.0           TPH as Motor Oil         < 10         10           1-Chlorooctadecane (Diesel Surrogate)         94.5	mg/Kg mg/Kg mg/Kg	EPA 6010B M EPA 8015	10/02/2008	Bromomethane
TPH as Motor Oil < 10 10	mg/Kg	M EPA 8015		
TPH as Motor Oil < 10 10	mg/Kg	M EPA 8015		Carbon Tetrachloride
			09/30/2008	Chlorobenzene
1. Chingagotadagana (Diagal Surragata) 94 5		M EPA 8015	09/30/2008	Chloroethane
1*CHOOCIAGECARE (Dieser Surrogate) 34.5	%	M EPA 8015	09/30/2008	Chloroform
1-Chlorooctadecane (Silica Gel Surr) 94.4	%	M EPA 8015	09/30/2008	Chloromethane
·				Dibromochloromethan
TPH as Gasoline < 1.0 1.0	mg/Kg	EPA 8260B	09/30/2008	Dibromomethane
1.1.1.2-Tetrachloroethane < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	Dichlorodifluorometha
1,1,1-Trichloroethane < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	Ethylbenzene
1,1,2,2-Tetrachloroethane < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	Hexachlorobutadiene
1,1,2-Trichloroethane < 0,0050 0,0050	mg/Kg	EPA 8260B	09/30/2008	Isopropyl benzene
1,1-Dichloroethane < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	Methylene Chloride
1.1-Dichloroethene < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	Naphthalene
1,1-Dichloropropene < 0,0050 0,0050	mg/Kg	EPA 8260B	09/30/2008	Styrene
1,2,3-Trichlorobenzene < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	Tetrachloroethene
1,2,3-Trichloropropane < 0,0050 0,0050	mg/Kg	EPA 8260B	09/30/2008	Toluene
1,2,4-Trichlorobenzene < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	Total Xylenes
1,2,4-Trimethylbenzene < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	Trichloroethene
1,2-Dibromo-3-chloropropane < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	Trichlorofluoromethan
1,2-Dibromoethane < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	Vinyl Chloride
1,2-Dichlorobenzene < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	cis-1,2-Dichloroethene
1,2-Dichloroethane < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	cis-1,3-Dichloroproper
1,2-Dichloropropane < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	n-Butylbenzene
1,3,5-Trimethylbenzene < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	n-Propylbenzene
1,3-Dichlorobenzene < 0,0050 0,0050	mg/Kg	EPA 8260B	09/30/2008	p-Isopropyltoluene
1,3-Dichloropropane < 0,0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	sec-Butylbenzene
1,4-Dichlorobenzene < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	tert-Butylbenzene
2+4-Chlorotoluene < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	trans-1,2-Dichloroethe
2,2-Dichloropropane < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	trans-1,3-Dichloroprop
Benzene < 0,0050 0,0050	mg/Kg	EPA 8260B	09/30/2008	1,2-Dichloroethane-d4
Bromobenzene < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	4-Bromofluorobenzene
Bromochloromethane < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	Toluene - d8 (Surr)
Bromodichloromethane < 0.0050 0,0050	mg/Kg	EPA 8260B	09/30/2008	
Bromoform < 0.0050 0.0050	mg/Kg	EPA 8260B	09/30/2008	

	<b></b>	Method		A E	Pm
Parameter	Measured Value	Reportin Limit	g <u>Units</u>	Analysis Method	Date <u>Analyzed</u>
Bromomethane	< 0.020	0.020	mg/Kg	EPA 8260B	09/30/2008
Carbon Tetrachloride	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Chlorobenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Chloroethane	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Chloroform	< 0.0050	0,0050	mg/Kg	EPA 8260B	09/30/2008
Chloromethane	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Dibromochloromethane	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Dibromomethane	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Dichlorodifluoromethane	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Hexachlorobutadiene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Isopropyl benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Methylene Chloride	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Naphthalene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Styrene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Tetrachloroethene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Trichloroethene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Trichlorofluoromethane	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Vinyl Chloride	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
cis-1,2-Dichloroethene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
cis-1,3-Dichloropropene	< 0.0050	0,0050	mg/Kg	EPA 8260B	09/30/2008
n-Butylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
n-Propylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
p-Isopropyltoluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
sec-Butylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
tert-Butylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
trans-1,2-Dichloroethene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
trans-1,3-Dichloropropene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	103		%	EPA 8260B	09/30/2008
4-Bromofluorobenzene (Surr)	109		%	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	92.3		%	EPA 8260B	09/30/2008

Date: 10/03/2008

Project Name : **Tidewater**Project Number : **TMTIDE4, 2** 

QC Report : Matrix Spike/ Matrix Spike Duplicate

Parameter	Spiked Sample	Sample Value	Spike Level	Spike Dup. Level	Spiked Sample Value	Duplicate Spiked Sample Value	Units	Analysis Method	Date Analyzed	Percent	Duplicat Spiked Sample Percent Recov.	Relative		Relative Percent Diff, Limit
1,1-Dichloroethane	65050-21	<0.0050	0.0394	0.0395	0.0266	0.0278	mg/Kg	EPA 8260B	9/30/08	67.6	70.2	3.73	70-130	25
1,2-Dichloroethane	65050-21	<0.0050	0.0389	0.0391	0.0290	0.0294	mg/Kg	EPA 8260B	9/30/08	74.5	75.2	0.982	70-130	25
Benzene	65050-21	0.014	0.0398	0.0400	0.0445	0.0413	mg/Kg	EPA 8260B	9/30/08	77.1	68.7	11.5	70-130	25
Chlorobenzene	65050-21	<0.0050	0.0399	0.0400	0.0233	0.0256	mg/Kg	EPA 8260B	9/30/08	58.5	64.1	9.04	70-130	25
Toluene	65050-21	0.14	0.0392	0.0394	0.190	0.171	mg/Kg	EPA 8260B	9/30/08	136	85.8	45.5	70-130	25
Lead	65042-01	6.5	50.0	50.0	55.4	55.4	mg/Kg	EPA 6010B	10/2/08	98.0	98.0	0.00	75-125	20
TPH-D (Si Gel)	65002-05	<1.0	20.0	20.0	17.8	17.5	mg/Kg	M EPA 8015	9/30/08	88.8	87.6	1.31	60-140	25
TPH as Diesel	65002-05	<1.0	20.0	20.0	18.7	18.5	mg/Kg	M EPA 8015	9/30/08	93.6	92.7	0.928	60-140	25

Date: 10/03/2008

QC Report : Laboratory Control Sample (LCS)

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Parameter	Spike Level	Units	Analysis Method	Date Analyzed	LCS Percent Recov.	LCS Percent Recov. Limit
Lead	50.0	mg/Kg	EPA 6010B	10/2/08	103	85-115
TPH-D (Si Gel)	20.0	ma/Ka	M EPA 8015	9/30/08	82.0	70-130
TPH as Diesel	20.0	mg/Kg	M EPA 8015		82.0	70-130
1,1-Dichloroethane	0.0390	mg/Kg	EPA 8260B	9/30/08	85.3	70-130
1,2-Dichloroethane	0.0386	mg/Kg	EPA 8260B	9/30/08	91.3	70-130
Benzene	0.0394	mg/Kg	EPA 8260B	9/30/08	88.4	70-130
Chlorobenzene	0.0395	mg/Kg	EPA 8260B	9/30/08	96.9	70-130
Toluene	0.0388	mg/Kg	EPA 8260B	9/30/08	89.0	70-130

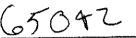


Distribution: White - Lab; Copy - Originator

Rev: 051805

2795 2nd Street Suite 300 Davis, CA 95616

Lab: 530.297.4800 Fax: 530.297.4802 SRG#/Lab No



Page 1 of

/ strainy credit zee			гах. Э														_																	$\neg$
Project Contact (Hardcopy or	PDF To	o):		Cali	iforr	ia E	DF	Repor	t?		[]	Yes	{	N	lo					Ch	air	-of	-Cı	ısto	dy	Rec	ord	and	i An	alys	is R	eque	st	ĺ
Maura Dougherty				S ===	noli:	34 C	Omr	any L	on C	ode	<del></del>						╁							Ana	llysis	Red	ques	t					TAT	
Company / Address:	m# LISH	CA 04E1	23	Odli	ıŅill	ig u	ULL	reality L	vy C	Jub	•						$\vdash$	T	a T	T		$\neg$	T	T	ĺ	T	ÌТ			Ţ		Ì		
2285 Morello Ave., Pleasa	Fax#		23	Glo	hal	ın·	TOR	0990	กกละ	5							1	(FPA 8015M)	2														⊥ 12 hr	
Phone #: 925-602-4710, ext. 41		r. 302-4720	)	0,0	DQ1	٠٠.	100	0000		•								8 4	Š					6										<i>≩</i>
Project #:	P.O. i			EDI	F De	elive	rable	e To (	Ema	l Ad	dres	ss):	************				1	E C	į.					200					ļ		l			ō
TMTIDE4, 2								eng.co	om, e	ticlat	orepo	orts@	etice)	ng.c	om			5	<u> </u>		ŝ		I	A 8.							l		24 hr	Use
Project Name:				Sar	nple	r Si	Mat	ur <i>e</i> r.							•			Spania	Ę	1	8015M)		1	<u>a</u>										ap
Tidewater					/V,	hing		//-					··			·	4	j	g 35	- 1	(EPA 8		اء	Volatile Organics Full List (EPA 8260B)	1								لسا 48hr	or Lab Use Only
Project Address:		Samp	ling	L.,	, (	onta	ine	<u> </u>		Pres	erva	itive	-	<u> </u>	∕latr	ix	┨╭	.   }	8 8	908	╝┃	Q	5										7011	Ľ.
4919 Tidewater Ave.	1	l					}									Į	88	1 1	8 12	8	ਰੋ∣	ST.	¥	8		1								
Oakland, CA 94601		Ì		4			1								ı		88	1 2	i sei	EP/	oto	띯	<u>"</u>	rgar									72 hr	
		1		VOA	,,,								ı,		l		(EPA 8260B)	Toll or Diorol with cilics not	5	TPH Gas (EPA 82608)	as Motor Oil	W.E.T. Lead (STLC)	Total Lead (EPA 6010)	Ö		ļ		1						
				Ē	ě.	Poly	388	Tedlar	_	HNO3	None			water	<u>.</u>	ال	BTEX	(   <u>(</u>	38	֓֞֞֟֓֓֓֓֓֓֓֓֓֓֓֓֓֓֓֓֡֟֝	ТРНа	пi Г	ta,	lati	1						Ì		XI 1 wk	
Sample Designation		Date	Time	40	8	G.	₫	<u>1</u>	오	土	Ň			\$ 6	<u>ارٌ</u>	₹	1	1	- 14	<u></u>	针	3	۴	رځ			┥-		┨—		+	+	TWK	<u>, .</u>
DRUM 1		9.25.08	1790		X		ĺ				X				V		1/	N)	XJ,	XI.	X		ΧI	X										O\
V/Com 2		, -, 5	1144	<b>-</b>	<b>/^</b>			- -	十		-		┪	Ť	1	$\dashv$	┪	Ť	Ť	Ť							Т							
				ļ	<u> </u>				<b>_</b>	<u> </u>			_	_	+		+	- -	+	-	$\dashv$				-	┵	-	-	+	╂─┼		-	<del> </del>	
													- 1														$\perp$			<u> </u>	$\bot$			
				Г	$\vdash$				1	Γ			T		T		Т	T	$\Box$										l					
				-	├				-	╂			╌┼	$\dashv$	-	╅	╁		╅	+		—		-		_		+	1	1		1		
	- 1														$\bot$		丄		_											1				<b> </b>
				T	1				Г																		Ì					Ì		
				╂	┼—		-		╊	┼	$\vdash$	-	$\dashv$	十	一十	+	1	_		-						_	7		1		$\Box$	T		
_				<u> </u>					_	<u> </u>			_				_	1	_							+				╀╾┪	-+	+	<del>                                     </del>	
													-				1																	
				+	╁╌	-		_ -	+	<del>  -</del>	П		十	十	_	_	1	1	7									7	Т					
				_	<u> </u>	ļ			┦—	↓_		$\vdash$	-	├-			-									+		+	+	1-1	_			
	i		į.																														<u> </u>	
Relinquished by.			Date			Tim	е	Recei	/ed b	у.									F	Rem	arks	:	_				_	_			4.	,	En 4	•
			ala.	/_		121	ر.									_			١	n	1.0	14	1		P-0	'تــــــــــــــــــــــــــــــــــــ	₹		<u>. Ç</u>	<u> 70</u>	_/ע/	4 LANC	نهر اله رحة	24.3
10001/1/2.			9/24	28	5	` ت]	, ,												_	H	GИ			<del></del>		7	` <u>~</u>	,	(-) -?	/ ) A	44			
Relinquished by:			Date			Tim	е	Recei	ved b	y:									-					(	90	<del>f) (</del>	-00	7	45	<i>₩</i>	14.4			
			<del> </del>			╄													I,	D.11.4														
<del></del>																<b>,</b>			- 1	Bill to	U:													
Relinquished by:			Date		0	Tim	10	Recei	ved b	y La	bora	югу:		K	-/	A	>							F	or L	ab Us	se O	nly:	Şan	iple R	eceip		<del>,</del>	
			012	6	S C	13	70				_			A	`	11	4	ا. د	<i>,</i> [	Te	mp '	,C	i	Initia	i		Dat			ime	L	m. ID #		it Present
			Date											///	ra	Y.	je		Ī	7	.4	- <del></del>	J	<u>3C</u>		01	760	18	1	740	15	51	(es	) No
i			<u> </u>					<u> </u>															سسخ											



Date: 09/30/2008

Maura Dougherty ETIC Engineering, Inc 2285 Morello Avenue Pleasant Hill, CA 94523

Subject: 5 Water Samples
Project Name: Tidewater
Project Number: TMTIDE4, 2

Dear Ms. Dougherty,

Chemical analysis of the samples referenced above has been completed. Summaries of the data are contained on the following pages. Sample(s) were received under documented chain-of-custody. US EPA protocols for sample storage and preservation were followed.

Kiff Analytical is certified by the State of California (# 2236). If you have any questions regarding procedures or results, please call me at 530-297-4800.

Sincerely,



Project Name: Tidewater

Project Number: TMTIDE4, 2

Matrix: Water

Lab Number : 64975-01

Report Number: 64975 Date: 09/30/2008

Sample Date :09/24/2008

Sample: C-1W,20

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	110		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	104		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel)	< 50	50	ug/L	M EPA 8015	09/27/2008
Octacosane (Silica Gel Surr)	105		% Recovery	M EPA 8015	09/27/2008



Date: 09/30/2008

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Sample: C-3W,8

Matrix: Water

Lab Number : 64975-02

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	108		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	105		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Discrete peaks in Diesel range, atypi	<b>78</b> ical for Diesel	50 Fuel.)	ug/L	M EPA 8015	09/27/2008
Octacosane (Silica Gel Surr)	96.8		% Recovery	M EPA 8015	09/27/2008



Project Name : Tidewater
Project Number : TMTIDE4, 2

Date: 09/30/2008

Report Number: 64975

Sample: C-4W,16 Matrix: Water Lab Number: 64975-03

Sample Date :09/24/2008		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	107		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	106		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel)	< 50	50	ug/L	M EPA 8015	09/27/2008
Octacosane (Silica Gel Surr)	84.0		% Recovery	M EPA 8015	09/27/2008



Project Name: Tidewater

Project Number: TMTIDE4, 2

Sample: C-6W,7

Matrix: Water

Lab Number: 64975-04

Report Number: 64975 Date: 09/30/2008

Sample Date :09/24/2008		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	111		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	105		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel)	26000	50	ug/L	M EPA 8015	09/27/2008
Octacosane (Silica Gel Surr)	77.8		% Recovery	M EPA 8015	09/27/2008



Project Name: Tidewater

Project Number: TMTIDE4, 2

Matrix: Water

Lab Number : 64975-05

Report Number: 64975

Date: 09/30/2008

Sample Date :09/24/2008

Sample: C-2W,12

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	108		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	105		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel)	< 50	50	ug/L	M EPA 8015	09/29/2008
Octacosane (Silica Gel Surr)	108		% Recovery	M EPA 8015	09/29/2008

Date: 09/30/2008

QC Report : Method Blank Data

Project Name : Tidewater

Project Number: TMTIDE4, 2

Parameter	Measured Value	Method Reportin Limit	ig Units	Analysis Method	Date Analyzed
TPH as Diesel (Silica Gel)	< 50	50	ug/L	M EPA 8015	09/25/2008
Octacosane (Silica Gel Surr)	104		%	M EPA 8015	09/25/2008
TPH as Diesel (Silica Gel)	< 50	50	ug/L	M EPA 8015	09/29/2008
Octacosane (Silica Gel Surr)	102		%	M EPA 8015	09/29/2008
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/26/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/26/2008
Toluene	< 0.50	0,50	ug/L	EPA 8260B	09/26/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/26/2008
1,2-Dichloroethane-d4 (Surr)	98.1		%	EPA 8260B	09/26/2008
Toluene - d8 (Surr)	96.8		%	EPA 8260B	09/26/2008

		Method	<b>i</b>		
	Measured	Reporti	ing	Analysis	Date
Parameter	Value	Limit	Units	Method	Analyzed

Date: 09/30/2008

QC Report : Matrix Spike/ Matrix Spike Duplicate

Project Name : **Tidewater**Project Number : **TMTIDE4, 2** 

Parameter	Spiked Sample	Sample Value	Spike Level	Spike Dup. Level	Spiked Sample Value	Duplicate Spiked Sample Value	e Units	Analysis Method	Date Analyzed	Percent	Duplicat Spiked Sample Percent Recov.	Relative	Spiked Sample Percent Recov. Limit	Relative Percent Diff. Limit
Benzene	64942-09	1.1	39.5	39.5	38.2	38.3	ug/L	EPA 8260B	9/26/08	94.0	94.2	0.125	70-130	25
Toluene	64942-09	1.3	38.9	38.9	37.7	37.5	ug/L	EPA 8260B	9/26/08	93.6	92.9	0.709	70-130	25
TPH-D (Si Gel)	BLANK	<50	1000	1000	898	884	ug/L	M EPA 8015	9/25/08	89.8	88.4	1.52	70-130	25
TPH-D (Si Gel)	BLANK	<50	1000	1000	1010	855	ug/L	M EPA 8015	9/29/08	101	85.5	16.8	70-130	25

Date: 09/30/2008

QC Report : Laboratory Control Sample (LCS)

Project Name : Tidewater

Project Number: TMTIDE4, 2

Parameter	Spike Level	Units	Analysis Method	Date Analyzed	LCS Percent Recov.	LCS Percent Recov. Limit
Benzene	40.1	ug/L	EPA 8260B	9/26/08	94.6	70-130
Toluene	39.5	ug/L	EPA 8260B	9/26/08	93.8	70-130



2795 2nd Street Suite 300 Davis, CA 95616

Lab: 530.297.4800

SRG#/Lab No. 64975

7 ti idiy Etcui Lec		Fax: :	530.2	297.0	1802																													, ,
Project Contact (Hardcopy or	PDF To):	·	Ca/	liforn	ia ΕΓ	DF Rep	port	)		☑ Ye	JS		No	<u>-</u>	T				hain	 1-∩f	-Cu	ietc	vdv	Re		-da	hod	Δn	- olv	eie '	Dec.	ule:	et	
Maura Dougherty		According to the Arment of the				<del></del>										4			110111	<del></del>											·~~	·		
Company / Address:			Sar	mplin	ng Co	ompan	y Lo	g Co	de:						•				<del></del>		/	Апа	ilysis	۶R€	eque.	∌st	,						TAT	1
2285 Morello Ave., Pleasan		-523	<del> </del>	<del>. ,</del>				<del></del>								4	⊋ ′	1																1
Phone #:	Fax #:	700	Glo	ı isdc	D: T	r06099	900	085							-	$I^{-1}$	8015M)	1											i				12 hr	
	925-602-47:	20	+=-	1E D.	- 11. 45.	- LI_ Y	- /E				<del></del>					1. 1	(EPA8	'								1			i				_ ]	≥
Project #: TMTIDE4, 2	P.O. #:		3			able To eticeno	•			•	•	tioon	~ ~		1	1					1													δ
Project Name:	<u> </u>					periceng		A, Euc	Habis	100:12	(G)e1	Jeny	1.CO	<u>m</u>			cleanup	'								-					1	2	24 hr	or Lab Use Only
Tidewater			Çai												1	1	1 8	/			I					1			į	1			$\neg$ $\mid$	ا ۾ ا
Project Address:	Sai	mpling	+	والتحارث	ontail		$\widetilde{\neg}$	D,	2000	rvativ		_	NA.	atrix		1 1	ge				I						1			- 1			1864	
4919 Tidewater Ave.	Jai	Thing	+	$\overline{\Box}$	Untai	1161	一		ESC:	Vauv	Ť ,	+	IVIO	TI IX		=	1 3	boss	- Landerson						]	1	-			1		1	48hr	ا تد ا
Oakland, CA 94601	ł		1								'		1		1	8260B)	TPH as Diesel with silica	***	-	ı						ı		1	, [	1		,	$\sqcap$	
wastening as it a raw.	ļ	Ì	[₹]								'		1		1	A 8.	( Se											,	,	-			72 hr	
			Σ	00							1 '		1			(EPA	ag										1	, ]	.		***************************************	- [		i
	}		E	Sleeve	ا ج	Ulass Tedlar		고 양	No Series		1	age	·	Air	1	BTEX	1 se				Į							.				1	Ŋr	
Sample Designation	Date		8	<u> </u>	9 6			_			<u> </u>	اِ≲ا	တိ '	\ <u>₹</u>		画	<u> </u>	!						_						_		1	₹Ţ _k	
G/W,20	9/24/3	59 1000	5				14. L	X	$ \rangle$	(]	′	X	,			X	X							-									-	0
C-3W, 8		1005	5				T	X				X			T	Z	X	, 1	П			T			$\top$	$\top$	$\exists$		i	$\Box$	$\top$	T		02
G4W, 16	15	1235	-			11	П	X		1	T	X			1	Ż	Z	,	I	$\top$	1	+	$\top$	1	$\top$	1	$\exists$		1	十	1	+	$\exists$	0}
C6W, 7	17	1300		H		11	T		7	オー		X			1	分	X		П	1:	<u>u</u>	14	iced	1	,	een	一			丁	10	十		04
C-2W,12	<b></b>	1/00	-1	<del>1 1</del>	+	++	一	寸	+	+		以	1	<del>  </del>	一	分	Š	#	一十	+	十	干	7	+	什	cen	4	bin	761	mpl	+	+		05
	Y	#10-	半	$\vdash$	+	+++		4	-	-	+'	$\mathbf{P}$	<u>                                     </u>	+	1		_	1	<del></del>	+	+	+	+	+	+	+	$\dashv$	$\rightarrow$	+	$\dashv$	+	+	<del></del>	03
			/								上'		'				'							$\perp$	$\perp$	$\perp$						$\perp$		
			1				ı <b>I</b>				1						1 '															T		
*****	<del></del>	+	1	H	-	+++	一十	-	+	+-	+	++		+	$\dashv$	ightharpoonup		-	$\vdash$	+	+	+	+	+	$\dashv$	+	$\dashv$	$\dashv$	+	+	+	+		
<del></del>			1	$\Box$	_	$\perp \perp$			_	4_	<u></u>   '	$oldsymbol{\perp}$	<u></u> '	$\bot$				$\bot$	4	$\perp$	_	$\bot$	$\bot$	4	$\perp$	$\perp$	_					4		
								1					1				1										-	.					ŀ	
						11		1	T	1		П			1				П	1	1	$\top$		1	$\top$	十		1	$\blacksquare$	1	1	十	$\Box$	
Relinquished by.		Date /	<b></b> _	17	Time	Rec	eived	by:			ســـــــــــــــــــــــــــــــــــــ			نــــــــــــــــــــــــــــــــــــــ			<del></del>	Rem	narks:															
1/1/1/2		9/24	4/5	<													1	i				Λ			^					L	1			
10001		"	11-0	<b>'</b>			-										!	1	Ples	(je	+	(X	Cu	9	• f	CI	U.C	. 7	る	M	aur:	5		
Relinquished by:		Date	**********	7	Time	Rece	eived	i by:		***************************************							7	,	Plea	-	•	4	21)	1.5	4	47:	27	٦						
		+		+	•	+-	~~~~									_		L				· ·	**/ (	ب سست		/	<u>ب</u> مــــــــــــــــــــــــــــــــــــ						······	
		1	<del></del>				<del> </del>											Bill to	<b>D</b> :															
Relinquished by:		Date		ĺ	Time	1	eived	by La	abora	atory:	,	1 7	<u></u>									Fo	r Lab	Us د	e O	nly:	Sa	ampl	ie Re	eir:	ıt			
<		0924	108	1	1348	سرا '	TU	7	2		45	-157	1	ielyt	Į,	a	1	Te	emp °C	;	Init	tials			Date	e		Tim	e	Ther	m. ID	# C	Coolant P	Present
				ľ	, -	Y	10	L.		-		/4	W.	ely	764	4	Ţ		1.4		T	JÉ	3	7	797	240	PT	160	P	II	2-(	7	Yes	No

Distribution: White - Lab; Copy - Originator

Rev: 051805



Date: 10/03/2008

Maura Dougherty ETIC Engineering, Inc 2285 Morello Avenue Pleasant Hill, CA 94523

Subject: 10 Water Samples
Project Name: Tidewater
Project Number: TMTIDE4,2

Dear Ms. Dougherty,

Chemical analysis of the samples referenced above has been completed. Summaries of the data are contained on the following pages. Sample(s) were received under documented chain-of-custody. US EPA protocols for sample storage and preservation were followed.

Kiff Analytical is certified by the State of California (# 2236). If you have any questions regarding procedures or results, please call me at 530-297-4800.

Sincerely,



Date: 10/03/2008

Subject :

10 Water Samples

Project Name : Project Number : Tidewater TMTIDE4,2

## Case Narrative

For sample C-14W,8, repeat analysis by test method Modified EPA 8015 yielded inconsistent results. The concentrations appear to vary between the bottles. The highest valid results are reported.



Date: 10/03/2008

Project Name : **Tidewater**Project Number : **TMTIDE4,2** 

Sample: C-10W,8

Matrix: Water

Lab Number : 65012-01

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	97.6		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	100		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling tha	<b>11000</b> n typical Diese	50 el Fuel.)	ug/L	M EPA 8015	09/30/2008
Octacosane (Silica Gel Surr)	82.8		% Recovery	M EPA 8015	09/30/2008



Project Name : Tidewater

Project Number: TMTIDE4,2

Report Number: 65012

Date: 10/03/2008

Sample: C-1W,12

Matrix : Water

Lab Number : 65012-02

Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
< 0.50	0.50	ug/L	EPA 8260B	10/01/2008
< 0.50	0.50	ug/L	EPA 8260B	10/01/2008
< 0.50	0.50	ug/L	EPA 8260B	10/01/2008
< 0.50	0.50	ug/L	EPA 8260B	10/01/2008
97.9		% Recovery	EPA 8260B	10/01/2008
91.5		% Recovery	EPA 8260B	10/01/2008
< 50	50	ug/L	M EPA 8015	09/30/2008
103		% Recovery	M EPA 8015	09/30/2008
	Value  < 0.50 < 0.50 < 0.50 < 0.50 97.9 91.5 < 50	Measured Value         Reporting Limit           < 0.50         0.50           < 0.50         0.50           < 0.50         0.50           < 0.50         0.50           97.9         91.5           < 50         50	Measured Value         Reporting Limit         Units           < 0.50         0.50         ug/L           < 0.50         0.50         ug/L           < 0.50         0.50         ug/L           < 0.50         0.50         ug/L           97.9         % Recovery           91.5         % Recovery           < 50         50         ug/L	Measured Value         Reporting Limit         Units         Analysis Method           < 0.50         0.50         ug/L         EPA 8260B           97.9         % Recovery Recovery EPA 8260B           91.5         % Recovery EPA 8260B           < 50         50         ug/L         M EPA 8015



Project Name: Tidewater Project Number: TMTIDE4,2 Date: 10/03/2008

Report Number: 65012

Sample: C-7W,7

Matrix: Water

Lab Number : 65012-03

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	97.8		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	100		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel)	18000	50	ug/L	M EPA 8015	09/30/2008
Octacosane (Silica Gel Surr)	89.2		% Recovery	M EPA 8015	09/30/2008



Project Name : Tidewater

Project Number: TMTIDE4,2

Report Number: 65012

Date: 10/03/2008

Sample: C-7,W,23

Matrix: Water

Lab Number: 65012-04

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	97.1		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	100		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel) (Note: MRL increased due to interfere	< 80 ence from Gasoline	80 -range hydrod	ug/L carbons.)	M EPA 8015	09/30/2008
Octacosane (Silica Gel Surr)	84.5		% Recovery	M EPA 8015	09/30/2008



Project Name: **Tidewater**Project Number: **TMTIDE4,2** 

Report Number: 65012

Date: 10/03/2008

Sample: C-11W,8

Matrix: Water

Lab Number : 65012-05

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	97.4		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	100		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>76</b> n typical Diese	50 el Fuel.)	ug/L	M EPA 8015	09/30/2008
Octacosane (Silica Gel Surr)	95.9		% Recovery	M EPA 8015	09/30/2008



Date: 10/03/2008

Project Name : **Tidewater**Project Number : **TMTIDE4,2** 

Sample: C-14W,8

Matrix: Water

Lab Number : 65012-06

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	99.7		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	98.7		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>190</b> n typical Diese	50 l Fuel.)	ug/L	M EPA 8015	10/02/2008
Octacosane (Silica Gel Surr)	91.5		% Recovery	M EPA 8015	10/02/2008



Date: 10/03/2008

Project Name : **Tidewater**Project Number : **TMTIDE4,2** 

Sample: C-16W.8

Matrix: Water

Lab Number : 65012-07

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	100		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	98.9		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling tha	<b>3800</b> n typical Diese	50 el Fuel.)	ug/L	M EPA 8015	09/30/2008
Octacosane (Silica Gel Surr)	83.9		% Recovery	M EPA 8015	09/30/2008



Date: 10/03/2008

Project Name : **Tidewater**Project Number : **TMTIDE4,2** 

Sample: C-12W,20

Matrix: Water

Lab Number : 65012-08

Sample Date :09/25/2008		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	99.3		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	99.1		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>86</b> n typical Diese	50 el Fuel.)	ug/L	M EPA 8015	09/30/2008
Octacosane (Silica Gel Surr)	100		% Recovery	M EPA 8015	09/30/2008



Date: 10/03/2008

Project Name : **Tidewater**Project Number : **TMTIDE4,2** 

Sample: C-13W,8

Matrix: Water

Lab Number : 65012-09

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/29/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/29/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/29/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	100		% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	97.4		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>120</b> n typical Diese	50 el Fuel.)	ug/L	M EPA 8015	09/30/2008
Octacosane (Silica Gel Surr)	93.0		% Recovery	M EPA 8015	09/30/2008



Project Name: Tidewater

Project Number: TMTIDE4,2

Sample: C-8W,20

Matrix: Water

Lab Number : 65012-10

Report Number: 65012

Date: 10/03/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	101		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	98.8		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel)	640	50	ug/L	M EPA 8015	09/30/2008
Octacosane (Silica Gel Surr)	96.3		% Recovery	M EPA 8015	09/30/2008

Date: 10/03/2008

QC Report : Method Blank Data

Project Name: Tidewater

Project Number: TMTIDE4,2

	Measured	Method Reportin	a	Analysis	Date	
Parameter	Value	Limit	Units	Method	Analyzed	
TPH as Diesel (Silica Gel)	< 50	50	ug/L	M EPA 8015	09/29/2008	
Octacosane (Silica Gel Surr)	102		%	M EPA 8015	09/29/2008	
TPH as Diesel (Silica Gel)	< 50	50	ug/L	M EPA 8015	10/02/2008	
Octacosane (Silica Gel Surr)	105		%	M EPA 8015	10/02/2008	
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/29/2008	
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/29/2008	
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/29/2008	
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/29/2008	
1,2-Dichloroethane-d4 (Surr)	103		%	EPA 8260B	09/29/2008	
Toluene - d8 (Surr)	99.8		%	EPA 8260B	09/29/2008	
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008	
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008	
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008	
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008	
1,2-Dichloroethane-d4 (Surr)	95.4		%	EPA 8260B	09/30/2008	
Toluene - d8 (Surr)	91.6		%	EPA 8260B	09/30/2008	
Benzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008	
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008	
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008	
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/30/2008	
1,2-Dichloroethane-d4 (Surr)	101		%	EPA 8260B	09/30/2008	
Toluene - d8 (Surr)	99.2		%	EPA 8260B	09/30/2008	

Parameter	Measured Value	Method Reporting Limit	) Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0,50	ug/L	EPA 8260B	09/29/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	09/29/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	09/29/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	98,5		%	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	99.9		%	EPA 8260B	09/29/2008

Date: 10/03/2008

QC Report : Matrix Spike/ Matrix Spike Duplicate

Project Name : **Tidewater**Project Number : **TMTIDE4,2** 

Parameter	Spiked Sample	Sample Value	Spike Level	Spike Dup. Level	Spiked Sample Value	Duplicate Spiked Sample Value	e Units	Analysis Method	Date Analyzed	Spiked Sample Percent I Recov.	Duplicat Spiked Sample Percent Recov.	Relative	Spiked Sample Percent Recov. Limit	Relative Percent Diff. Limit
TPH-D (Si Gel)	BLANK	<50	1000	1000	1010	855	ug/L	M EPA 8015	9/29/08	101	85.5	16.8	70-130	25
Benzene	65012-09		39.6	39.8	39.2	39.3	ug/L	EPA 8260B	9/29/08	99.2	98.7	0.471	70-130	25
Toluene	65012-09		39.0	39.2	37.2	37.4	ug/L	EPA 8260B	9/29/08	95.5	95.5	0.0418	70-130	25
Benzene	65008-02	<0.50	40.1	40.1	41.0	40.5	ug/L	EPA 8260B	9/30/08	102	101	1.39	70-130	25
Toluene	65008-02	<0.50	39.5	39.5	41.2	40.4	ug/L	EPA 8260B	9/30/08	104	102	1.99	70-130	25
Benzene	65008-08	<0.50	40.1	40.1	38.4	37.5	ug/L	EPA 8260B	9/30/08	95.8	93.5	2.44	70-130	25
Toluene	65008-08	<0.50	39.5	39.5	38.0	37.1	ug/L	EPA 8260B	9/30/08	96.0	93.8	2.28	70-130	25
Benzene	65010-10	1.2	40.1	40.1	40.9	40.1	ug/L	EPA 8260B	9/29/08	99.1	97.0	2.15	70-130	25
Toluene	65010-10	<0.50	39.5	39.5	38.5	37.7	ug/L	EPA 8260B	9/29/08	97.3	95.3	2.08	70-130	25
TPH-D (Si Gel)	BLANK	<50	1000	1000	1050	1050	ug/L	M EPA 8015	10/2/08	105	105	0.381	70-130	25

Date: 10/03/2008

QC Report : Laboratory Control Sample (LCS)

Project Name : **Tidewater**Project Number : **TMTIDE4,2** 

Parameter	Spike Level	Units	Analysis Method	Date Analyzed	LCS Percent Recov.	LCS Percent Recov. Limit		
Benzene	40.1	ug/L	EPA 8260B	9/29/08	103	70-130		
Toluene	39.5	ug/L	EPA 8260B	9/29/08	104	70-130		
Benzene	40.1	ug/L	EPA 8260B	9/30/08	102	70-130		
Toluene	39.5	ug/L	EPA 8260B	9/30/08	103	70-130		
Benzene	40.2	ug/L	EPA 8260B	9/30/08	98.4	70-130		
Toluene	40.2	ug/L	EPA 8260B	9/30/08	98.2	70-130		
Benzene	40.0	ug/L	EPA 8260B	9/29/08	98.9	70-130		
Toluene	39.4	ug/L	EPA 8260B	9/29/08	96.8	70-130		



2795 2nd Street Suite 300 Davis, CA 95616

Lab: 530.297.4800 Fax: 530.297.4802 SRG#/Lab No.

65012

Page 1

of 1

Project Contact (Hardcopy or PDF To): California EDF Report?  Maura Dougherty					☑ Yes		No			Chain-c	f-Custod	y Reco	rd and	Analy	sis Requ	est		
Company / Address:			Sampling Company Log Code:							Analysis Request						TAT		
2285 Morello Ave., Pleasan	t Hill CA 94	523	'		, ,								TT	1 1				
Phone #:	Fax #:		Globa	IID: TO	60990008	5			1	15. 15. 15.								
	925-602-47	20				•				(EPA 8015M)							12 hr	
Project #:	P.O. #:		EDF I	Deliverat	le To (Ema	iil Address):		***************************************		EP/								ō
TMTIDE4, 2						eticlabreports@	eticenç	.com									24 hr	Se
Project Name:			Samp	ler sign	ugrd://					cteanup								D G
Tidewater				W	/t/m·					gel c								For Lab Use Only
Project Address:	San	rpling		Contain	er/	Preservative		Matrix		silica							48hr	For
4919 Tidewater Ave.									( <del>8</del> )	H.								
Oakland, CA 94601		1							(EPA 8260B)	Diesel with							72 hr	
			Q						PΑ	)jes							1211	
			1=   \$	ss	<u>ā</u>	ဂြိ ခု	į	_	×	8							102	
Sample Designation	Date	Time	40 ml VOA	Poly Glass	Tedlar HCI	HNO ₃	Water	Soii F Soii	втех	TP.							X 1 wk	
C-10W,8	9/24/59		5		$\setminus$		X		X	X								01
C-1W.12	( - 1, -	1648	2		ΙX		X		X	$\overrightarrow{\chi}$								92
(-7W, 7	15	1442	5		X	ł	X		X	X								03
(7,W, 23		1500	5		X		$\sqrt{\chi}$		X	X								94
CIW, 8	Ý	1375	万		$\lambda$		X		X	X								þ\$
C-14W, 8	9/25/0	8 1039	5		X		X		x	X								96
C-16W, B	9 Asto	80916	7		X		X		&	X								07
(-12 W, 20	9.250	\$1510	5		X		7.		አ	X								A
C-13W, 8		(130	5		K		X.		γ.	4								09
C-84,20	V	1450	5		X		Х		У.	K								0
Relinquished by:		Date		Time	Received b	y:					Remarks: /	7/2500	C.		r		<i>γ</i>	,
Path De			1				_			1	lease laura,	TAX	(0)	g of	ه ل م مارات	7	ري ا	
Relinquished by: Date			Time	Received b	y:					10,	laura,	(925)	600	1-47	20.			
				<del></del> -				_			Bill to:					-		
Relinquished by:		Date		Time	Received b	y Laboratory:		س سا	. 7		O:11 W.	For l	Lab Use	Only: 9	Sample R	eceint		
		092	508		1	1/1		Nic	z Ytia	1	Temp °C	Initials	<del></del>	ate	Time	Therm, ID #	Coolani	Present
	-	1012	,-0	11 /01	La	helwite		- Anai	AHO	a l	3-2	LOR			2014		(e)	

Distribution: White - Lab; Copy - Originator

Rev: 051805



Date: 10/03/2008

Maura Dougherty ETIC Engineering, Inc 2285 Morello Avenue Pleasant Hill, CA 94523

Subject: 3 Water Samples
Project Name: Tidewater
Project Number: TMTIDE4, 2

Dear Ms. Dougherty,

Chemical analysis of the samples referenced above has been completed. Summaries of the data are contained on the following pages. Sample(s) were received under documented chain-of-custody. US EPA protocols for sample storage and preservation were followed.

Kiff Analytical is certified by the State of California (# 2236). If you have any questions regarding procedures or results, please call me at 530-297-4800.

Sincerely,



Date: 10/03/2008

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Sample: C-5W,20

Matrix : Water

Lab Number : 65040-01

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	10/01/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	10/01/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	10/01/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	10/01/2008
1,2-Dichloroethane-d4 (Surr)	98.1		% Recovery	EPA 8260B	10/01/2008
Toluene - d8 (Surr)	100		% Recovery	EPA 8260B	10/01/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling tha	<b>74</b> n typical Diese	50 el Fuel.)	ug/L	M EPA 8015	10/02/2008
Octacosane (Silica Gel Surr)	108		% Recovery	M EPA 8015	10/02/2008



Date: 10/03/2008

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Sample: C15W,8

Matrix: Water

Lab Number : 65040-02

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
1,2-Dichloroethane-d4 (Surr)	100		% Recovery	EPA 8260B	10/02/2008
Toluene - d8 (Surr)	99.9		% Recovery	EPA 8260B	10/02/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling tha	<b>9300</b> in typical Diese	50 el Fuel.)	ug/L	M EPA 8015	10/01/2008
Octacosane (Silica Gel Surr)	87.5		% Recovery	M EPA 8015	10/01/2008



Project Name: Tidewater Project Number: TMTIDE4, 2

Date: 10/03/2008

Report Number: 65040

Sample: C15W,24 Matrix: Water Lab Number : 65040-03

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
1,2-Dichloroethane-d4 (Surr)	100		% Recovery	EPA 8260B	10/02/2008
Toluene - d8 (Surr)	100		% Recovery	EPA 8260B	10/02/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>130</b> an typical Dies	50 el Fuel.)	ug/L	M EPA 8015	10/01/2008
Octacosane (Silica Gel Surr)	103		% Recovery	M EPA 8015	10/01/2008

Date: 10/03/2008

QC Report : Method Blank Data

Project Name: Tidewater

Project Number: TMTIDE4, 2

Parameter	Measured Value	Method Reporting Limit	} Units	Analysis Method	Date Analyzed
TPH as Diesel (Silica Gel)	< 50	50	ug/L	M EPA 8015	10/01/2008
Octacosane (Silica Gel Surr)	105		%	M EPA 8015	10/01/2008
Benzene	< 0.50	0,50	ug/L	EPA 8260B	10/02/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
1,2-Dichloroethane-d4 (Surr)	98.1		%	EPA 8260B	10/02/2008
Toluene - d8 (Surr)	100		%	EPA 8260B	10/02/2008
Benzene	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	10/02/2008
1,2-Dichloroethane-d4 (Surr)	98.6		%	EPA 8260B	10/02/2008
Toluene - d8 (Surr)	100		%	EPA 8260B	10/02/2008
Benzene	< 0.50	0.50	ug/L	EPA 8260B	10/01/2008
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	10/01/2008
Toluene	< 0.50	0.50	ug/L	EPA 8260B	10/01/2008
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	10/01/2008
1,2-Dichloroethane-d4 (Surr)	97.8		%	EPA 8260B	10/01/2008
Toluene - d8 (Surr)	100		%	EPA 8260B	10/01/2008

Parameter	Measured Value	Method Reporting Limit	g Units	Analysis Method	Date Analyzed

Date: 10/03/2008

QC Report : Matrix Spike/ Matrix Spike Duplicate

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Parameter	Spiked Sample	Sample Value	Spike Level	Spike Dup. Level	Spiked Sample Value	Duplicate Spiked Sample Value	e Units	Analysis Method	Date Analyzed	Percent	Percent	Relative	Spiked Sample Percent Recov. Limit	Relative Percent Diff. Limit
TPH-D (Si Gel)	BLANK	<50	1000	1000	1070	1130	ug/L	M EPA 8015	10/1/08	107	113	5.34	70-130	25
Benzene	65084-04	<0.50	40.1	40.1	42.2	40.7	ug/L	EPA 8260B	10/2/08	105	101	3.67	70-130	25
Toluene	65084-04	<0.50	39.5	39.5	40.4	38.8	ug/L	EPA 8260B	10/2/08	102	98.2	4.11	70-130	25
Benzene	65082-02	<0.50	40.1	40.1	41.4	40.8	ug/L	EPA 8260B	10/2/08	103	102	1.31	70-130	25
Toluene	65082-02	<0.50	39.5	39.5	39.6	39.1	ug/L	EPA 8260B	10/2/08	100	99.0	1.15	70-130	25
Benzene	65060-11	<0.50	40.1	40.1	40.5	39.0	ug/L	EPA 8260B	10/1/08	101	97.3	3.63	70-130	25
Toluene	65060-11	< 0.50	39.5	39.5	38.6	37.4	ug/L	EPA 8260B	10/1/08	97.7	94.6	3.28	70-130	25

Date: 10/03/2008

QC Report : Laboratory Control Sample (LCS)

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Parameter	Spike Level	Units	Analysis Method	Date Analyzed	LCS Percent Recov.	LCS Percent Recov. Limit
Benzene	39.8	ug/L	EPA 8260B	10/2/08	105	70-130
Toluene	39.8	ug/L	EPA 8260B	10/2/08	103	70-130
Benzene	40.0	ug/L	EPA 8260B	10/2/08	104	70-130
Toluene	40.0	ug/L	EPA 8260B	10/2/08	104	70-130
Benzene	40.1	ug/L	EPA 8260B	10/1/08	104	70-130
Toluene	40.1	ug/L	EPA 8260B	10/1/08	101	70-130



Rev: 051805

2795 2nd Street Suite 300

Davis, CA 95616 Lab: 530.297.4800 Fax: 530.297.4802

SRG # / Lab No



Page 1 of [

Project Contact (Hardcopy or Maura Dougherty	PDF To):			Cal	iforn	ia EI	)FR	eport	?		<b>☑</b> Y	es		] No	)				Ch	ain-c	of-C	uste	ody	Re	corc	a	nd A	nal	ysis	Re	que	st	
Company / Address:				Sar	nnlin	a Cc	าทากล	n l va	og Co	rde.							<b> </b>			···		Δη	alvei	e Da	que	et						TAT	
2285 Morello Ave., Pleasa	ALLEIL CA (	14522		-	,,,	g 00	,,,,,,,	., iy	Jg O	<b>.</b>							<del> </del>			<del></del>	1	7111	aiyəi	3 1 (	1	31	Т	т-	т-	Т		1/7/	
Phone #:	Fax#:	77020		Clo	hall	n. 7	`^~^	0000	085						·····			28															
925-602-4710, ext. 41	925-602-4	720		Giu	Dicti	U. 1	UUU	3306	000									(EPA 8015M)														12 hr	
Project #:	P.O. #;			ED	F De	liver	able	To (E	mail	Ado	ress	i):		<del></del>				ΕPA						1									Ę
TMTIDE4, 2									m, etic				eticen	g.cc	m									l				ı				24 hr	e Se
TMTIDE4, 2 Project Name:	·				mpler signature/						38nL								ı		ı					يّ							
Tidewater						1/2	74											충					- 1		ł								la la
Project Address:	S	ampling				ontai			Pr	ese	rvati	ve	T	M	atrix			ði g						I								48hr	For Lab Use Only
4919 Tidewater Ave.									П	Т	T		1		Π			Silis										1					ъ.
Oakland, CA 94601 Sample Designation	Dat	a T	ime	40 ml VOA	Sleeve	Poly	Glass		HCI	E .	vone		Vater	ioi	Air		BTEX (EPA 8260B)	TPH as Diesel with silica gel cleanup	***************************************													72 hr	
C-5W,20	9.25			4	0)				X			+	X	1	Ť		X	X						_	<b></b>	Ì	1	1	1			1 4417	07
C-5W,20 C-15W,8 C-15W,24	(	16	345	5					X				X	1			X	X															20
C-15W,24	V	17	140	5	-				X				V				X	N									-						6.3
																											- Andrew Mercelonia						
																										al constant							
													L																				
Relinguished by:  Min I III.		Date	e 3/24/-	ঠ		rime 120	]	ceive	d by:				<del></del>		······································	<del></del> >			Remai	rks:		<del></del>											
Relinquished by:		Date	е			Time	Re	ceive	d by:			···········							Bill to:														
Relinquished by:		Date				lime	Re	ceive	d by L	abo	rator	γ:				<u></u>	<u> </u>	1				F	or La	b Us	e Or	ılv:	San	nple	Rece	eipt			
		- 0	926	308	3	151		يرد			- -				_1	rish	nh.	/c(	Tem	p °C	l li	nitials			Date	<u> </u>		Time		erm.	D#	Coolant	Present
							1									,		- '	2	.4		J)(		٥	126	0	8 7	740	,	/Z(		Yes	/ No
Distribution: White - Lab; Copy - Origi	nator					_																											



Date: 10/02/2008

Maura Dougherty ETIC Engineering, Inc 2285 Morello Avenue Pleasant Hill, CA 94523

Subject: 22 Soil Samples
Project Name: Tidewater
Project Number: TMTIDE4, 2

Dear Ms. Dougherty,

Chemical analysis of the samples referenced above has been completed. Summaries of the data are contained on the following pages. Sample(s) were received under documented chain-of-custody. US EPA protocols for sample storage and preservation were followed.

Kiff Analytical is certified by the State of California (# 2236). If you have any questions regarding procedures or results, please call me at 530-297-4800.

Sincerely,



Project Name: Tidewater Project Number: TMTIDE4, 2 Report Number: 64976

Date: 10/02/2008

Sample: C-1,2

Matrix : Soil

Lab Number : 64976-01

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	96.4		% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	95.1		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel)	710	5.0	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	93.9		% Recovery	M EPA 8015	10/01/2008



Date: 10/02/2008

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Sample: C-1,5

Matrix : Soil

Lab Number : 64976-02

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	104		% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	101		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling the	<b>1.5</b> an typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	09/30/2008
1-Chlorooctadecane (Silica Gel Surr)	97.6		% Recovery	M EPA 8015	09/30/2008



Date: 10/02/2008

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Sample : C-1,10

Matrix : Soil

Lab Number : 64976-03

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	98.6		% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	99.2		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>5.8</b> n typical Diese	1.0 l Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	88.0		% Recovery	M EPA 8015	10/01/2008



Project Name: Tidewater

Project Number: TMTIDE4, 2

Sample : C-1,15

Matrix: Soil

Lab Number: 64976-04

Report Number: 64976 Date: 10/02/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	97.4		% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	94.9		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>5.2</b> n typical Diese	1.0 l Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	94.9		% Recovery	M EPA 8015	10/01/2008



Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Report Number: 64976

Date: 10/02/2008

Sample: C-1,20

Matrix : Soil

Lab Number : 64976-05

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	99.1	,	% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	94.7		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	09/30/2008
1-Chlorooctadecane (Silica Gel Surr)	105		% Recovery	M EPA 8015	09/30/2008



Date: 10/02/2008

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Sample: C-1,25

Matrix : Soil

Lab Number : 64976-07

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	101		% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	98.0		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>1.9</b> n typical Diese	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	101		% Recovery	M EPA 8015	10/01/2008



Date: 10/02/2008

Project Name : **Tidewater**Project Number : **TMTIDE4, 2** 

Sample: C-1,30

Matrix : Soil

Lab Number : 64976-08

Sample Date :09/24/2008		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	100		% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	98.0		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	107		% Recovery	M EPA 8015	10/01/2008



Project Name: Tidewater Project Number: TMTIDE4, 2 Report Number: 64976

Date: 10/02/2008

Sample: C-2,2

Matrix: Soil

Lab Number : 64976-09

Sample Date :09/24/2008		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	0.0082	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	0.021	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	104		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	101		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>51</b> 1 typical Diese	5.0 el Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	87.0		% Recovery	M EPA 8015	10/01/2008



Date: 10/02/2008

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Sample: C-2,5

Matrix : Soil

Lab Number : 64976-10

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr) Toluene - d8 (Surr)	99.9 97.9		% Recovery % Recovery	EPA 8260B EPA 8260B	09/29/2008 09/29/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling than	<b>1.4</b> n typical Diese	1.0 I Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	98.1		% Recovery	M EPA 8015	10/01/2008



Project Name: Tidewater

Project Number: TMTIDE4, 2

Report Number: 64976

Date: 10/02/2008

Sample: C-2,10

Matrix : Soil

Lab Number : 64976-11

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	102		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	97.3		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling th	<b>5.1</b> an typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	72.3		% Recovery	M EPA 8015	10/01/2008



Date: 10/02/2008

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Sample: C-2,15

Matrix : Soil

Lab Number : 64976-12

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	102		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	97.2		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>4.1</b> in typical Diese	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	95.6		% Recovery	M EPA 8015	10/01/2008



Project Name: Tidewater

Project Number: TMTIDE4, 2

Sample : C-2,20

Matrix: Soil

Lab Number: 64976-13

Report Number: 64976 Date: 10/02/2008

Sample Date :09/24/2008		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	101		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	98.0		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	09/30/2008
1-Chlorooctadecane (Silica Gel Surr)	96.4		% Recovery	M EPA 8015	09/30/2008



Project Name: Tidewater

Project Number: TMTIDE4, 2

Sample: C-3,2

Matrix : Soil

Lab Number: 64976-14

Report Number: 64976 Date: 10/02/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	101		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	98.0		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel)	170	5.0	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	88.7		% Recovery	M EPA 8015	10/01/2008



Project Name : **Tidewater**Project Number : **TMTIDE4, 2** 

Report Number: 64976

Date: 10/02/2008

Sample: C-3,5

Matrix : Soil

Lab Number : 64976-15

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	101		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	98.0		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	09/30/2008
1-Chlorooctadecane (Silica Gel Surr)	93.4		% Recovery	M EPA 8015	09/30/2008



Date: 10/02/2008

Project Name: Tidewater Project Number: TMTIDE4, 2

Sample: C-3,10

Matrix : Soil

Lab Number : 64976-16

Sample Date :09/24/2008		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	102		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	97.3		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>4.1</b> n typical Diese	1.0 I Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	71.1		% Recovery	M EPA 8015	10/01/2008



Project Name: Tidewater Project Number: TMTIDE4, 2 Date: 10/02/2008

Report Number: 64976

Sample: C-3,15

Matrix : Soil

Lab Number : 64976-17

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	99.5		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	96.8		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>2.6</b> n typical Diese	1.0 I Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	91.6		% Recovery	M EPA 8015	10/01/2008



Project Number: Tidewater

Project Number: TMTIDE4, 2

Matrix : Soil

Lab Number : 64976-18

Report Number: 64976 Date: 10/02/2008

Sample Date :09/24/2008

Sample: C-3,20

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	102	•	% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	97.2		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	09/30/2008
1-Chlorooctadecane (Silica Gel Surr)	99.3		% Recovery	M EPA 8015	09/30/2008



Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Sample: C-4,2 Matrix: Soil

Lab Number: 64976-19

Report Number: 64976 Date: 10/02/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	98.6		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	97.4		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>1.6</b> n typical Diese	1.0 I Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	101		% Recovery	M EPA 8015	10/01/2008



Project Name : Tidewater

Project Number: TMTIDE4, 2

Sample: C-4,5 Matrix: Soil Lab Number: 64976-20

Report Number: 64976

Date: 10/02/2008

Sample Date .09/24/2000	N.A. a.	Method		A 1 1-	Data
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	101		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	98.1		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	102		% Recovery	M EPA 8015	10/01/2008



Date: 10/02/2008

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Sample: C-4,10

Matrix : Soil

Lab Number : 64976-21

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	105		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	99.3		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>5.5</b> an typical Diese	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	75.9		% Recovery	M EPA 8015	10/01/2008



Date: 10/02/2008

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Sample: C-4,15

Matrix : Soil

Lab Number : 64976-22

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
· · · · · · · · · · · · · · · · · · ·	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene Ethylbenzene	< 0.0050 < 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	106		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	99.4		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel)	5.0	1.0	mg/Kg	M EPA 8015	09/30/2008
(Note: Hydrocarbons are higher-boiling th	an typical Dies	el Fuel.)			•
1-Chlorooctadecane (Silica Gel Surr)	91.9		% Recovery	M EPA 8015	09/30/2008



Project Name : Tidewater

Project Number: TMTIDE4, 2

Report Number: 64976

Date: 10/02/2008

Sample: C-4,20

Matrix: Soil

Lab Number : 64976-23

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	105		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	99.7		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling the	<b>7.2</b> nan typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	09/29/2008
1-Chlorooctadecane (Silica Gel Surr)	116		% Recovery	M EPA 8015	09/29/2008

Date: 10/02/2008

QC Report : Method Blank Data

Project Name: Tidewater

Project Number: TMTIDE4, 2

Parameter	Measured Value	Method Reporting Limit	g Units	Analysis Method	Date Analyzed
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	09/30/2008
1-Chlorooctadecane (Silica Gel Surr)	95.8		%	M EPA 8015	09/30/2008
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	09/29/2008
1-Chlorooctadecane (Silica Gel Surr)	85.1		%	M EPA 8015	09/29/2008
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	106		%	M EPA 8015	10/01/2008
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/26/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/26/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/26/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/26/2008
1,2-Dichloroethane-d4 (Surr)	98.1		%	EPA 8260B	09/26/2008
Toluene - d8 (Surr)	94.1		%	EPA 8260B	09/26/2008
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	100		%	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	98.1		%	EPA 8260B	09/29/2008

Parameter	Measured Value	Method Reportii Limit		Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	102		%	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	100		%	EPA 8260B	09/29/2008

Date: 10/02/2008

QC Report : Matrix Spike/ Matrix Spike Duplicate

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Parameter	Spiked Sample	Sample Value	Spike Level	Spike Dup. Level	Spiked Sample Value	Duplicate Spiked Sample Value	Units	Analysis Method	Date Analyzed	Spiked Sample Percent Recov.	Duplicat Spiked Sample Percent Recov.	Relative	Spiked Sample Percent Recov. Limit	Relative Percent Diff. Limit
TPH-D (Si Gel)	65013-01	74	20.0	20.0	87.0	75.1	mg/Kg	M EPA 8015	9/29/08	93.0	80.3	14.7	60-140	25
Benzene Toluene	65005-03 65005-03	<0.0050 <0.0050	0.0397 0.0391	0.0400 0.0394	0.0335 0.0320	0.0338 0.0323	mg/Kg mg/Kg		9/26/08 9/26/08	84.3 81.7	84.5 82.1	0.167 0.523		25 25
Benzene Toluene	64976-06 64976-06		0.0398 0.0392	0.0398 0.0392	0.0340 0.0349	0.0340 0.0346	mg/Kg mg/Kg		9/29/08 9/29/08	85.5 88.9	85.5 88.2	0.0530 0.704	70-130 70-130	25 25
Benzene Toluene	65002-30 65002-30		0.0392 0.0386	0.0390 0.0384	0.0381 0.0378	0.0379 0.0374	mg/Kg mg/Kg		9/29/08 9/29/08	97.2 97.9	97.3 97.4	0.161 0.486	70-130 70-130	25 25
TPH-D (Si Gel)	64976-06	<1.0	20.0	20.0	17.0	17.3	mg/Kg	M EPA 8015	9/30/08	85.2	86.5	1.53	60-140	25
TPH-D (Si Gel)	65050-21	150	20.0	20.0	153	148	mg/Kg	M EPA 8015	10/1/08	88.4	85.6	3.26	60-140	25

Date: 10/02/2008

QC Report : Laboratory Control Sample (LCS)

Project Name : Tidewater

Project Number: TMTIDE4, 2

Parameter	Spike Level	Units	Analysis Method	Date Analyzed	LCS Percent Recov.	LCS Percent Recov. Limit
TPH-D (Si Gel)	20.0	mg/Kg	M EPA 8015	9/30/08	88.8	70-130
TPH-D (Si Gel)	20.0	mg/Kg	M EPA 8015	9/29/08	85.8	70-130
TPH-D (Si Gel)	20.0	mg/Kg	M EPA 8015	10/1/08	81.0	70-130
Benzene Toluene	0.0394 0.0388	mg/Kg mg/Kg	EPA 8260B EPA 8260B	9/26/08 9/26/08	93.2 92.7	70-130 70-130
Benzene Toluene	0.0400 0.0395	mg/Kg mg/Kg	EPA 8260B EPA 8260B	9/29/08 9/29/08	90.4 90.9	70-130 70-130
Benzene Toluene	0.0400 0.0394	mg/Kg mg/Kg	EPA 8260B EPA 8260B	9/29/08 9/29/08	98.2 99.3	70-130 70-130



2795 2nd Street Suite 300 Davis, CA 95616

Lab: 530.297.4800

SRG#/Lab No. 64476

/ if lefty creek and		rax. :	J.J.U.Z.													1000								
Project Contact (Hardcopy or	PDF To):		Calif	California EDF Report? Yes No										Chain-of-Custody Record and Analysis Request										
Maura Dougherty			<u> </u>	61				- 3					<u> </u>									···	TAT	
Company / Address:			Sam	pling	Com	pany i	Log Co	oae:					<b> </b>	-	<del></del>		Ant	uysis	Requ	iesi	<del></del>		+	
2285 Morello Ave., Pleasa		523	<u> </u>				.000=							8		j								
Phone #:	Fax #:	20	Glob	al ID	: TO <del>(</del>	5099(	0085							(EPA 8015M)									12 hr	
925-602-4710, ext. 41	925-602-47	20	ENE	Dali	vorah	lo To	/Email	Address	٠١-				1	A										Ö
Project #:	P.O. #:							iclabrepor		icena	i.com												24 hr	Se (
TMTIDE4, 2 Project Name:	<u> </u>				Signa		,				,		1	deanub		į								⁻or Lab Use Only
Tidewater				IJ		•								gel		l								_i
Project Address:	Sai	mpling	1/2		ntaine	er	P	reservat	ive	T	Matrix	X	1	55 I									48hr	For
4919 Tidewater Ave.		I	1	Ť		П						$\top$	<u>@</u>	iš.										
Oakland, CA 94601			1										3260	菱										
and the same of th			8										Ϋ́	ese									72 hr	
			mí VOA	9	s	ايتا		8 8		7			BTEX (EPA 8260B)	as Diesel with silica	HOLD			1					N	
	1			Slee	Glass	Tedlar	ਹੁ	HNO ₃		Water	Soil		Ê	TPH (	H								X 1 wk	
Sample Designation	Date /	Time	4	SIC	10	-	17			>		-	╏			-			_	1			1	01
G1,2	9/24/0	9 10 1	<b>f</b>	X	<u> </u>		1	- X			$\Delta$	_	$\triangle$			_								—
C-1, 5		0955	1	X				X			X		X	X										02
C-1, 10		/003		X				X			X		X	X									<u> </u>	03
C-1, 15		1007		X				X			X		X	X										O4
C-1,20	-17	1012	Ì	X				X			X		X	X										05
C-1, 22		1016		X				X			X	46	X	X	$\cdot \mid X \mid$								_	06
C-1, 25		1018	Ţ	X	-			X			X	नाया	$\times$	X										04
C-1, 30		1025		X				X			X		X	X										08
6-2, 2		1041		<del>\</del>	1		$\top$	X	1		X		$\overline{\mathbf{x}}$	X										09
C-2, 5	1	1100	-	X	1			X		丅	X		区	X										6
Relinquished by:///	<u> </u>	Date		T	ime	Rece	ived by	':							Remarks	:		^		^	<i>n</i>	11		
Millh		9/2	4/-8													llea	ĵe i	fax.	(4)	g of '	C,0.C,	to Ma	ura,	
Relinguished by:		Date		7	lime	Rece	ived by	<i>r</i> :			,,			-		(9	25) (	500	-472	20				
		_				<u> </u>									Bill to:									
	w	Date			Time	Becc	ived h	/ Laborato	itv.						OH 10.		£	orla	h Usa	Only:	Sample F	Receipt		
Relinquished by:			وسان		_	1	. + GU 103	77	. j.		J. FF				Temp °	- T	Initia			Date	Time	Therm, ID	# Coolai	nt Present
		di	400		1348	15	Ilu	K/		F	iff A	nd	, dic	ia	1.4	<del>`</del>	75			2408		IR-1		)/ No
1		1		l i		1 "		-					•	٠,	1 1 1 1			<u>ا ب</u>	<u> </u>	<u>,, , , , , , , , , , , , , , , , , , ,</u>	110		المستحدثينيي	<u></u>

Distribution: White - Lab; Copy - Originator

Rev: 051805



2795 2nd Street Suite 300 Davis, CA 95616

Lab: 530.297.4800

SRG#/Lab No. 64976

Allaly Cical LLC		F		30.25																					
Project Contact (Hardcopy or	PDF To):			California EDF Report?							Chain-of-Custody Record and Analysis Request									1					
Maura Dougherty																		Analys						TAT	7
Company / Address:			_	Sam	pling	Com	oany L	og Co	ae:				⊢		T	Т Т	П	Allalys		1					1 1
2285 Morello Ave., Pleasar		9452	3	<u> </u>			0000	2005						(¥)											
Phone #:	Fax #: 925-602-	4770		GIOD	al IU	100	0990	บบชอ						8							1			12 h	
925-602-4710, ext. 41	P.O.#:	-4120		EDE	Deli	/erahl	e To (	Fmail	Address):				-	(EPA 8015M)											5 l
Project#: TMTIDE4, 2	P.O. #.			MDo	uaher	tv@eti	ceng.c	om, etic	clabreports@	getice	ng.	com	- 1											24 h	r gg
Project Name:	<u> </u>					Sibba	we:						7	ea											د د -or Lab Use Only
Tidewater				Mil Man							1	교											1 2		
Project Address:		Samp	lina			ntaine		P	reservative	T	Ī	Matrix		68										48h	r E
4919 Tidewater Ave.	<u> </u>	1	9	П	T						T		é	DIEA (EFA OXOUD) TPH as Diesel with silica gel cleanup											
Oakland, CA 94601		1								ı			(guara	wit oze										72 !	ır
				δl	ĺ								Š	Diese										1'	" 1
		1		40 ml VOA	ē.	တ	<b>8</b>		ا ه اي	ľ	ā		>	as D										l 🔀	1 1
	1 _	.	<b></b>	L L	Sieeve	Glass	g	HCI	None None	i d	Ü	Soil Air	į	TPH as										X 1 w	k
Sample Designation		ate	Time			- 10	-	+++			+	Ŭ)	-1;	オヤ	才	1-1-			TT						U
C-2,10	9/2	4/56	1105		X			_	X		4	4	(	74	<del>}</del>	╀┼┼	-		┢╾╁	╼┼╾╁		╁┼		┨─	12
C-2, 15		/	1120		X				X		_ _	$X \mid \downarrow$	_/2	$\Delta \Delta$	<u> </u>				<b>├</b> ─├		-				
(-2.20	,		1130		X				X			$X \perp$	_//	$X \mid X$	1	<u> </u>						1-1			13
C-2,20 C-3,2 C-3,5		1	0940		X				X			$X \perp$		$\langle \rangle$	1			·				11			14
1. 1.25		/	/sev		X				X			ΧÌ	,	$\langle \rangle$											15
	<del></del>				⇉			1			7	$\nabla$	1	र्या	7										16
C-3,10		7	1005	1_	4			1	-13-	-	-+	<u> </u>		$\exists :$	廾		+	_	+			+		1	1.4.
C-3, 15			1020		X				X		_	X	_/	¥	4		-		-			++	$\dashv$	-	17
C-3,20			1040		X							$X \sqcup$		$\langle \downarrow \rangle$	$oldsymbol{igspace}$		_			$\dashv$	_		_		
C-4,2			1145	1	X				X		_	$X_{\perp}$		$\Delta \lambda$	1				1		_ _			_	19
C-4,5	,	$\overline{\Psi}$	1202		X				X			X	/	$\langle   \rangle$	1										20
Relinquished by:			Date		ì	ime	Recei	ved by:						•	R	emarks:									
1/4/12			9/24	1/58			-																		
Relinquished by:			Date			îme	Recei	ved by	1 1		<del></del>				1										
Treation of by.							<del>                                     </del>						<del></del> -			11 40:					······································		· · · · · · · · · · · · · · · · · · ·		
						r,	0		l abarates:					·	╀	il to:	······································	Eor	l ah l	se Only:	Sa	mple R	eceipt		
Relinquished by:			Date		Í	Time	Į.	·-	Laboratory:		-1	H			1				T	Date		Time	Therm. II	)# Co	lant Present
<b></b>			042	408		13 48	1	Tan	K-			ff Analy	L	1	<u> </u>	Temp °C		Initials	-	Date		HIE	\$ 4 PC		s / No
			00	• •		/*	Y	,,,,,	Promote Services		1	unay	MC.	e(	1		1							re	3 1 HO

Distribution: White - Lab; Copy - Originator

Rev: 051805



2795 2nd Street Suite 300 Davis, CA 95616

Lab: 530.297.4800 Fax: 530.297.4802 SRG # / Lab No.

64976

age **3** of 3

Analytical LLC		Fax: (	530.2																,						-				$\dashv$
Project Contact (Hardcopy or I	PDF To):		Cali	iforni	ia ED	FRe	port?		✓ Yes	;		No				C	nain	-of-(	Cus	tody	/ Re	cord	and	l Ana	ılys	is R	eque	st	
Maura Dougherty			<del> </del>			<del> </del>		C a -3														eques						TAT	-
Company / Address:			San	nplin	ig Col	mpan	y Log	Code	<b>3.</b>					-	1		r	1	1	iaiya	1	Janes			T		-		
2285 Morello Ave., Pleasar		1523	<u> </u>							`				-	8										- [	-			
Phone #:	Fax #:		Glo	bal I	D: T	0609	90008	35						1	(EPA 8015M)						1							12 hr	احا
	925-602-47	20							1-1					-	¥			- 1		Į	1 1								5
Project #:	P.O.#:		EDI	F De	livera	ibie I	0 (EM	all A	ddress):	Oosti	0000	com		1									İ					24 hr	or Lab Use Only
TMTIDE4, 2	<u>                                     </u>		MD	ough	erty@	eticen	g.com,	eucia	breports	ருகா	Ceng	1.5011		-	gel cleanup				i		li		İ						ž
Project Name:			Sar	nple	rsig	iarun	7							1	8				İ	ļ		1			1				ab
Tidewater			<u>.l</u>				2-							-													Andrew Company	48hr	5
Project Address:	Sa	mpling		<u> </u>	ontair	ner		Pre	servativ	e	<u> </u>	Mat	rix	┨╴	8														L L
4919 Tidewater Ave.					1								1	88	€												}		
Oakland, CA 94601	l													82	\$ 35													72 hr	
			Ş										l	EP.	E E									1 1					
			12	8	, g	<u>a</u> 5		اڻ	ا يو ا		ē			×	as a					1								⊠ 1 wk	
n ( P) ( ation	l note	Time	0	Sleeve	Poly	Tedlar	١	S E	None		Water	Soil	Ŗ.	BTEX (EPA 8260B)	TPH as Diesel with silica				l									1 wĸ	
Sample Designation	Date			1. 1		4-	=	╁	忧	1		X	1	寸	朾	1													21
C-4,10	9/24	1209	6	X		_	╀		ĮXJ.	+	-	<b>1</b>		$+\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!\!$	*	_			+	╁	-		$\dashv$	+		$\dashv$	1	<u> </u>	22
C-4, 15		1230	<u> </u>	X		_			X	1		X	_	ĮX	1.	<u> </u>			-	╂				+	-			<del>                                     </del>	1
C-4, 20	10	1244	/	X					X			X			$\langle X \rangle$													<b> </b>	23
			+			1		1																					
		_		-		-	╫	+		1-	l	$\Box$		╅	╁┈	1		1											
			4-	-			┼╌╂╴	+-	+	-	-	$\vdash$	$\dashv$		-	+-			-	_	+	╫╌╂			一			<b> </b>	
											_	1		4-		╀-	-			-	┿	╂╼╌╂	_	-		_		<del> </del>	<del> </del>
									1 1																			ļ	ــــــ
			1	1																									<u> </u>
			┪	╁		-	+ +	_	1	┪	1			$\top$	1	1													
			-	╂	╁┼		╫		+	┨-	┢			+	╁╴	+	$\Box$	<del>-  </del> -	+	_	$\dagger$								
				<u> </u>	7:		ceived	by			<u> </u>				1	Per	narks:	<u> </u>				II						1	
Relinquished by:		Date			Time	I'KE	:ceive0	uy.								1.18	. 1001 100												
11/1-17/2		9/2	74/s	<b>)</b>					····			***************************************			-														
Relinquished by:		Date			Time	Re	ceived	by:								-													
Remiquished by.																<u> </u>	·····		,,,										
									And. · · ·				····			Bill	to:				,		_ l. ··		Ja F	0001			
Relinquished by:		Date			Time	ì	eceived	by L	aboratory	<b>∮</b> : 	6	<b>~</b> if	7	,		<u> </u>		., Т	1-2		Lab			Samı	ne r		m, ID i	Coolai	ni Preseni
		042	408		134	8/	TIM	16	; 	***************************************	_		4	نامرا	1		emp °	C	ini	tials	╂	Da	ile	- -"	118	11181	11, 14, 7		/ No
1		10.0			1	- 1	4 10	-1/4	-			L	zua	1 "	~	. 1		- 1			- 1			I		l		1,03	,

Distribution: White - Lab; Copy - Originator

Rev: 051805



Report Number: 65013

Date: 10/06/2008

Maura Dougherty ETIC Engineering, Inc 2285 Morello Avenue Pleasant Hill, CA 94523

Subject: 55 Soil Samples Project Name: Tidewater Project Number: TMTIDE4, 2

Dear Ms. Dougherty,

Chemical analysis of the samples referenced above has been completed. Summaries of the data are contained on the following pages. Sample(s) were received under documented chain-of-custody. US EPA protocols for sample storage and preservation were followed.

Kiff Analytical is certified by the State of California (# 2236). If you have any questions regarding procedures or results, please call me at 530-297-4800.

Sincerely,



Report Number: 65013

Date: 10/06/2008

Subject:

55 Soil Samples

Project Name : Project Number :

Tidewater TMTIDE4, 2

## **Case Narrative**

Surrogate Recovery for sample C-8,10 and C-5,10 for test method Mod. EPA 8015 was outside of control limits. This may indicate a bias in the analysis due to the sample's matrix or an interference from compounds present in the sample.

Matrix Spike/Matrix Spike Duplicate results associated with sample C-5,10 for the analyte TPH as Diesel (Silica Gel) were outside of control limits. This may indicate a bias for the sample that was spiked. Since the LCS recoveries were within control limits, no data are flagged.



Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Sample: C-6,2 Matrix: Soil

atrix : Soil Lab Number : 65013-01

Report Number: 65013

Date: 10/06/2008

Sample Date :09/24/2008	Measured	Method Reporting		Analysis	Date .
Parameter	Value	Limit	Units	Method	Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	109		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	104		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling the	<b>74</b> nan typical Dies	2.0 el Fuel.)	mg/Kg	M EPA 8015	09/29/2008
1-Chlorooctadecane (Silica Gel Surr)	73.1		% Recovery	M EPA 8015	09/29/2008



Project Number: TMTIDE4, 2

Sample: C-6,5

Matrix: Soil

Lab Number : 65013-02

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene Toluene Ethylbenzene Total Xylenes	< 0.0050 < 0.0050 < 0.0050 < 0.0050	0.0050 0.0050 0.0050 0.0050	mg/Kg mg/Kg mg/Kg mg/Kg	EPA 8260B EPA 8260B EPA 8260B EPA 8260B	09/28/2008 09/28/2008 09/28/2008 09/28/2008
1,2-Dichloroethane-d4 (Surr) Toluene - d8 (Surr)	102 102		% Recovery % Recovery	EPA 8260B EPA 8260B	09/28/2008 09/28/2008
TPH as Diesel (Silica Gel)	2600	5.0	mg/Kg	M EPA 8015	09/30/2008
1-Chlorooctadecane (Silica Gel Surr)	116		% Recovery	M EPA 8015	09/30/2008



Project Number: TMTIDE4, 2

Sample: C-6,10

Matrix : Soil

Lab Number: 65013-03

Report Number: 65013

Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	107		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	104		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling the	8.8	1.0 el Fuel )	mg/Kg	M EPA 8015	10/02/2008
(Note: Hydrocarbons are riighter-boiling the	an typical bics	or r doi.			
1-Chlorooctadecane (Silica Gel Surr)	86.6		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample : C-6,15

Matrix : Soil

Lab Number: 65013-04

Report Number: 65013 Date: 10/06/2008

Sample Date :09/24/2008		Method		Analysis	Date
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	109		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	105		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel)	5.3	1.0	mg/Kg	M EPA 8015	09/30/2008
(Note: Hydrocarbons are higher-boiling that	an typical Diese	ei ruei.)			
1-Chlorooctadecane (Silica Gel Surr)	100		% Recovery	M EPA 8015	09/30/2008



Project Number: TMTIDE4, 2

Sample: C-6,20

Matrix: Soil

Lab Number: 65013-05

Report Number: 65013 Date: 10/06/2008

Sample Date :09/24/2008	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Parameter	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Benzene Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	107		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	105		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel)	7.4	1.0	mg/Kg	M EPA 8015	09/29/2008
(Note: Hydrocarbons are higher-boiling that	an typical Dies	el Fuel.)			
1-Chlorooctadecane (Silica Gel Surr)	104		% Recovery	M EPA 8015	09/29/2008



Project Name:

**Tidewater** 

Project Number: TMTIDE4, 2

Sample: C-7,2.5

Matrix : Soil

Lab Number: 65013-06

Report Number: 65013 Date: 10/06/2008

Sample Date :09/24/2008		Method			D. L.
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
• • • • • • • • • • • • • • • • • • • •	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	99.3		% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	102		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel)	520	1.0	mg/Kg	M EPA 8015	09/29/2008
1-Chlorooctadecane (Silica Gel Surr)	109		% Recovery	M EPA 8015	09/29/2008



Project Number: TMTIDE4, 2

Sample: C-7,5

Matrix : Soil

Lab Number: 65013-07

Report Number: 65013 Date: 10/06/2008

Sample Date :09/24/2000	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Parameter  Benzene  Toluene Ethylbenzene  Total Xylenes	< 0.0050 0.0061 < 0.0050 0.0070	0.0050 0.0050 0.0050 0.0050	mg/Kg mg/Kg mg/Kg mg/Kg	EPA 8260B EPA 8260B EPA 8260B EPA 8260B	09/29/2008 09/29/2008 09/29/2008 09/29/2008
1,2-Dichloroethane-d4 (Surr) Toluene - d8 (Surr)	103 103		% Recovery % Recovery	EPA 8260B EPA 8260B	09/29/2008 09/29/2008
TPH as Diesel (Silica Gel)	3500	10	mg/Kg	M EPA 8015	09/30/2008
1-Chlorooctadecane (Silica Gel Surr)	Diluted Out		% Recovery	M EPA 8015	09/30/2008



Project Name: 1

Tidewater

Project Number: TMTIDE4, 2

Sample : C-7,10

Matrix : Soil

Lab Number : 65013-08

Report Number: 65013

Date: 10/06/2008

Sample Date: 09/24/2008 Method Analysis Method Date Measured Reporting Analyzed Units Value Limit Parameter 09/27/2008 EPA 8260B mg/Kg 0.0050 < 0.0050 Benzene 09/27/2008 mg/Kg EPA 8260B 0.0050 < 0.0050 Toluene 09/27/2008 EPA 8260B mg/Kg 0.0050 < 0.0050 Ethylbenzene 09/27/2008 EPA 8260B < 0.0050 0.0050 mg/Kg **Total Xylenes** 09/27/2008 % Recovery EPA 8260B 109 1,2-Dichloroethane-d4 (Surr) 09/27/2008 **EPA 8260B** % Recovery 104 Toluene - d8 (Surr) 09/30/2008 M EPA 8015 mg/Kg 1.0 8.2 TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling than typical Diesel Fuel.) % Recovery M EPA 8015 09/30/2008 1-Chlorooctadecane (Silica Gel Surr) 97.3



Project Number: TMTIDE4, 2

Sample: C-7,15

Matrix : Soil

Lab Number: 65013-09

Report Number: 65013 Date: 10/06/2008

Sample Date .09/24/2000	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Parameter  Benzene  Toluene  Ethylbenzene  Total Xylenes	< 0.0050 < 0.0050 < 0.0050 < 0.0050	0.0050 0.0050 0.0050 0.0050	mg/Kg mg/Kg mg/Kg mg/Kg	EPA 8260B EPA 8260B EPA 8260B EPA 8260B	09/27/2008 09/27/2008 09/27/2008 09/27/2008
1,2-Dichloroethane-d4 (Surr) Toluene - d8 (Surr)	108 105		% Recovery % Recovery	EPA 8260B EPA 8260B	09/27/2008 09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling th	<b>8.9</b> an typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	09/29/2008
1-Chlorooctadecane (Silica Gel Surr)	104		% Recovery	M EPA 8015	09/29/2008



Project Name:

**Tidewater** 

Project Number: TMTIDE4, 2

Sample: C-7,19.5

Matrix: Soil

Lab Number: 65013-10

Report Number: 65013 Date: 10/06/2008

Sample Date: 09/24/2008 Method Analysis Method Reporting Limit Date Measured Units Analyzed Value Parameter 09/27/2008 0.0050 mg/Kg EPA 8260B < 0.0050 Benzene EPA 8260B 09/27/2008 mg/Kg 0.0050 < 0.0050 **Toluene** 09/27/2008 EPA 8260B < 0.0050 0.0050 mg/Kg Ethylbenzene EPA 8260B 09/27/2008 mg/Kg < 0.0050 0.0050 **Total Xylenes** 09/27/2008 % Recovery EPA 8260B 107 1,2-Dichloroethane-d4 (Surr) 09/27/2008 % Recovery EPA 8260B 105 Toluene - d8 (Surr) 09/30/2008 1.0 mg/Kg M EPA 8015 10 TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling than typical Diesel Fuel.) 09/30/2008 % Recovery M EPA 8015 92.2 1-Chlorooctadecane (Silica Gel Surr)



Project Number: TMTIDE4, 2

Sample: C-7,25

Matrix : Soil

Lab Number : 65013-11

Report Number: 65013 Date: 10/06/2008

Parameter Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	109		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	104		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	09/29/2008
1-Chlorooctadecane (Silica Gel Surr)	105		% Recovery	M EPA 8015	09/29/2008



Project Number: TMTIDE4, 2

Sample: C-7,30

Matrix : Soil

Lab Number : 65013-12

Report Number: 65013 Date: 10/06/2008

Parameter Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	106		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	100		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel)	4.7	1.0	mg/Kg	M EPA 8015	09/29/2008
1-Chlorooctadecane (Silica Gel Surr)	111		% Recovery	M EPA 8015	09/29/2008



Project Name:

**Tidewater** 

Project Number: TMTIDE4, 2

Sample: C-10,2

Matrix: Soil

Lab Number: 65013-13

Report Number: 65013 Date: 10/06/2008

Sample Date :09/24/2008 Method Analysis Method Date Measured Reporting Analyzed Units Limit Value Parameter 09/27/2008 mg/Kg EPA 8260B 0.0050 < 0.0050 Benzene 09/27/2008 < 0.0050 mg/Kg **EPA 8260B** 0.0050 **Toluene** 09/27/2008 **EPA 8260B** mg/Kg < 0.0050 0.0050 Ethylbenzene 09/27/2008 mg/Kg EPA 8260B 0.0050 < 0.0050 **Total Xylenes** 09/27/2008 EPA 8260B % Recovery 108 1,2-Dichloroethane-d4 (Surr) 09/27/2008 % Recovery EPA 8260B 104 Toluene - d8 (Surr) 09/29/2008 160 1.0 mg/Kg M EPA 8015 TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling than typical Diesel Fuel.) 09/29/2008 M EPA 8015 % Recovery 99.0 1-Chlorooctadecane (Silica Gel Surr)



1-Chlorooctadecane (Silica Gel Surr)

Project Name:

**Tidewater** 

Project Number: TMTIDE4, 2

Sample: C-10,5

Matrix: Soil

Lab Number: 65013-14

% Recovery M EPA 8015

09/29/2008

Report Number: 65013 Date: 10/06/2008

Sample Date :09/24/2008 Method Date Analyzed Analysis Method Measured Reporting Units Limit Value Parameter 09/27/2008 mg/Kg **EPA 8260B** 0.0050 < 0.0050 Benzene EPA 8260B 09/27/2008 mg/Kg < 0.0050 0.0050 Toluene mg/Kg EPA 8260B 09/27/2008 0.0050 < 0.0050 Ethylbenzene 09/27/2008 0.0050 mg/Kg EPA 8260B < 0.0050 **Total Xylenes** % Recovery EPA 8260B 09/27/2008 107 1,2-Dichloroethane-d4 (Surr) 09/27/2008 % Recovery EPA 8260B 105 Toluene - d8 (Surr) 09/29/2008 M EPA 8015 23 1.0 mg/Kg TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling than typical Diesel Fuel.)

104



Project Number: TMTIDE4, 2

Sample: C-10,10

Matrix: Soil

Lab Number: 65013-15

Report Number: 65013 Date: 10/06/2008

Sample Date :09/24/2008	Measured	Method Reporting		Analysis	Date
Parameter	Value	Limit	Units	Method	Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	103		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	100		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>9.1</b> an typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	09/29/2008
1-Chlorooctadecane (Silica Gel Surr)	90.5		% Recovery	M EPA 8015	09/29/2008



Project Number: TMTIDE4, 2

Sample: C-10,20

Matrix: Soil

Lab Number : 65013-16

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	99.1		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	98.6		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling the	7.0	1.0 el Fuel \	mg/Kg	M EPA 8015	09/29/2008
(Note: Hydrocarbons are riigher-boiling the	an typical Dics	Ci i doi.)			
1-Chlorooctadecane (Silica Gel Surr)	109		% Recovery	M EPA 8015	09/29/2008



Project Number: TMTIDE4, 2

Sample: C-11,5

Matrix : Soil

Lab Number : 65013-17

Report Number: 65013 Date: 10/06/2008

Parameter Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	101		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	100		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling the	320	5.0 al Fuel )	mg/Kg	M EPA 8015	09/30/2008
(Note: Hydrocarbons are nigher-boning the	an typical bies	err doi.)			
1-Chlorooctadecane (Silica Gel Surr)	73.7		% Recovery	M EPA 8015	09/30/2008



Project Number: TMTIDE4, 2

Sample: C-11,10

Matrix : Soil

Lab Number : 65013-18

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene Toluene	< 0.0050 < 0.0050	0.0050 0.0050	mg/Kg mg/Kg	EPA 8260B EPA 8260B EPA 8260B	09/27/2008 09/27/2008 09/27/2008
Ethylbenzene Total Xylenes	< 0.0050 < 0.0050	0.0050 0.0050	mg/Kg mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr) Toluene - d8 (Surr)	102 100		% Recovery % Recovery	EPA 8260B EPA 8260B	09/27/2008 09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling tha	9.0 In typical Diese	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	102		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-11,20

Matrix : Soil

5 8 - 41- - - - I

Lab Number : 65013-19

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	102		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	99.0		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	3.7	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
` ·		,	N D	M EDA 004E	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	96.4		% Recovery	M EPA 8015	10/02/2000



Project Number: TMTIDE4, 2

Sample: C-9,5

Matrix: Soil

Lab Number: 65013-20

Report Number: 65013 Date: 10/06/2008

Sample Date :09/25/2008		Method		Analysis	Date
Parameter	Measured Value	Reporting Limit	Units	Method	Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/28/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/28/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/28/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/28/2008
1,2-Dichloroethane-d4 (Surr)	99.8		% Recovery	EPA 8260B	09/28/2008
Toluene - d8 (Surr)	101		% Recovery	EPA 8260B	09/28/2008
TPH as Diesel (Silica Gel)	2400	10	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	Diluted Out		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Report Number: 65013

Date: 10/06/2008

Sample : C-9,10

Matrix : Soil

Lab Number: 65013-21

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene Toluene Ethylbenzene	< 0.0050 < 0.0050 < 0.0050	0.0050 0.0050 0.0050	mg/Kg mg/Kg mg/Kg	EPA 8260B EPA 8260B EPA 8260B EPA 8260B	09/27/2008 09/27/2008 09/27/2008 09/27/2008
Total Xylenes  1,2-Dichloroethane-d4 (Surr)  Toluene - d8 (Surr)	< <b>0.0050</b> 111 106	0.0050	mg/Kg % Recovery % Recovery	EPA 8260B EPA 8260B	09/27/2008 09/27/2008
TPH as Diesel (Silica Gel)	310	5.0	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	103		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-9,15

Matrix : Soil

Lab Number: 65013-22

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	104		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	100		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>5.4</b> an typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	113		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample : C-9,20

Matrix : Soil

Lab Number : 65013-23

Report Number: 65013

Date: 10/06/2008

Sample Date :09/25/2008		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	104		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	98.9		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel)	9.0	1.0	mg/Kg	M EPA 8015	10/02/2008
(Note: Hydrocarbons are higher-boiling the	ari typicai Diesi	er r der./			
1-Chlorooctadecane (Silica Gel Surr)	108		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-14,2.5

Matrix : Soil

Lab Number : 65013-24

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene Toluene Ethylbenzene	< 0.0050 < 0.0050 < 0.0050 < 0.0050	0.0050 0.0050 0.0050 0.0050	mg/Kg mg/Kg mg/Kg mg/Kg	EPA 8260B EPA 8260B EPA 8260B EPA 8260B	09/27/2008 09/27/2008 09/27/2008 09/27/2008
Total Xylenes  1,2-Dichloroethane-d4 (Surr)  Toluene - d8 (Surr)	99.6 98.9	0.000	% Recovery % Recovery	EPA 8260B EPA 8260B	09/27/2008 09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling tha	<b>300</b> in typical Dies	10 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	Diluted Out		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-14,5

Matrix : Soil

Lab Number : 65013-25

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	104		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	99.9		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel)	6.2	1.0	mg/Kg	M EPA 8015	10/02/2008
(Note: Hydrocarbons are higher-boiling that	an typical Dies	el Fuel.)			
1-Chlorooctadecane (Silica Gel Surr)	109		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-14,10

Matrix : Soil

Lab Number : 65013-26

Report Number: 65013

Date: 10/06/2008

Sample Date :09/25/2008		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	103		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	99.7		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling th	9.0	1.0	mg/Kg	M EPA 8015	10/01/2008
(Note: mydrocarbons are nigher-boning tr	iair typicai Dies	ici i doi.j			
1-Chlorooctadecane (Silica Gel Surr)	96.6		% Recovery	M EPA 8015	10/01/2008



Project Number: TMTIDE4, 2

Sample: C-14,15

Matrix : Soil

Lab Number : 65013-27

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	99.5		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	93.2		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>10</b> an typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	110		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-14,20

Matrix : Soil

Lab Number: 65013-28

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1.2-Dichloroethane-d4 (Surr)	100		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	93.6		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>7.2</b> in typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	116		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-16,2.5

Matrix : Soil

Lab Number: 65013-29

Report Number: 65013 Date: 10/06/2008

Sample Date :09/25/2008		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	95.6		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	92.3		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling tha	<b>200</b> in typical Diese	10 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	Diluted Out		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-16,6

Matrix : Soil

Lab Number : 65013-30

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	94.0		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	98.8		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling tha	<b>3100</b> n typical Dies	20 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	Diluted Out		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-16,12

Matrix : Soil

Lab Number : 65013-31

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1.2-Dichloroethane-d4 (Surr)	99.2		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	92.3		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>54</b> an typical Dies	5.0 el Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	70.7		% Recovery	M EPA 8015	10/01/2008



Project Number: TMTIDE4, 2

Sample: C-16,16

Matrix : Soil

Lab Number: 65013-32

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1.2-Dichloroethane-d4 (Surr)	96.1		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	92.6		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>11</b> n typical Diese	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	102		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-16,20

Matrix : Soil

Lab Number : 65013-33

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed	
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008	
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008	
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008	
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008	
1,2-Dichloroethane-d4 (Surr)	95.0		% Recovery	EPA 8260B	09/27/2008	
Toluene - d8 (Surr)	93.2		% Recovery	EPA 8260B	09/27/2008	
TPH as Diesel (Silica Gel)	7.0	1.0	mg/Kg	M EPA 8015	10/02/2008	
(Note: Hydrocarbons are higher-boiling than typical Diesel Fuel.)						
1-Chlorooctadecane (Silica Gel Surr)	111		% Recovery	M EPA 8015	10/02/2008	



Project Number: TMTIDE4, 2

Sample: C-13,2.5

Matrix : Soil

Lab Number: 65013-34

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	98.3		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	92.8		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling th	<b>370</b> an typical Dies	20 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	Diluted Out		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-13,5

Matrix : Soil

Lab Number : 65013-35

Report Number: 65013 Date: 10/06/2008

Parameter Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	108		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	105		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling th	<b>4.9</b> an typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	101		% Recovery	M EPA 8015	10/01/2008



Project Number: TMTIDE4, 2

Sample: C-13,10

Matrix : Soil

Lab Number : 65013-36

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	104		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	99.9		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling tha	<b>4.7</b> n typical Diese	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	102		% Recovery	M EPA 8015	10/01/2008



Project Number: TMTIDE4, 2

1-Chlorooctadecane (Silica Gel Surr)

Report Number: 65013

Date: 10/06/2008

Sample: C-13,15

Matrix : Soil

Lab Number : 65013-37

% Recovery M EPA 8015

10/01/2008

Sample Date :09/25/2008		Method						
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed			
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008			
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008			
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008			
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008			
1,2-Dichloroethane-d4 (Surr)	103		% Recovery	EPA 8260B	09/27/2008			
Toluene - d8 (Surr)	100		% Recovery	EPA 8260B	09/27/2008			
TPH as Diesel (Silica Gel)	5.7	1.0	mg/Kg	M EPA 8015	10/01/2008			
(Note: Hydrocarbons are higher-boiling than typical Diesel Fuel.)								

100



Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Date: 10/06/2008

Sample: C-13,20

Matrix : Soil

Lab Number : 65013-38

Report Number: 65013

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/28/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/28/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/28/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/28/2008
1,2-Dichloroethane-d4 (Surr)	101		% Recovery	EPA 8260B	09/28/2008
Toluene - d8 (Surr)	100		% Recovery	EPA 8260B	09/28/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling th	<b>4.0</b> an typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	104		% Recovery	M EPA 8015	10/02/2008



Date: 10/06/2008

Project Name : **Tidewater**Project Number : **TMTIDE4, 2** 

Sample: C-8,2.5

Matrix : Soil

Lab Number: 65013-39

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	0.014	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	0.015	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	0.066	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	106		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	105		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel)	160	10	mg/Kg	M EPA 8015	10/02/2008
(Note: Hydrocarbons are higher-boiling th	an typical Dies	erruer.)			
1-Chlorooctadecane (Silica Gel Surr)	Diluted Out		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-8,5

Sample Date :09/25/2008

Matrix : Soil

Lab Number : 65013-40

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	.mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	98.6		% Recovery	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	97.2		% Recovery	EPA 8260B	09/27/2008
TPH as Diesel (Silica Gel)	210	1.0	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	91.9		% Recovery	M EPA 8015	10/01/2008



Date: 10/06/2008

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Sample: C-8,10

Matrix : Soil

Lab Number : 65013-41

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	100		% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	91.9		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling tha	8.3 n typical Diese	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	30.5		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-8,15

Matrix : Soil

Lab Number : 65013-42

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	101		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	94.7		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel)	13	1.0	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	114		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-8,20

Matrix : Soil

Lab Number : 65013-43

Report Number: 65013 Date: 10/06/2008

Sample Date :09/25/2008	<b></b>	Method		Analysis	Date
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1.2-Dichloroethane-d4 (Surr)	104		% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	93.0		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling the	8.8 nan typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	106		% Recovery	M EPA 8015	10/01/2008



Project Number: TMTIDE4, 2

Report Number: 65013

Date: 10/06/2008

Sample : C-5,2.5

Matrix: Soil

Lab Number : 65013-44

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	101		% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	97.7		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling than	<b>220</b> n typical Diese	20 I Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	Diluted Out		% Recovery	M EPA 8015	10/01/2008



Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Report Number: 65013

Date: 10/06/2008

Sample: C-5,5

Matrix : Soil

Lab Number : 65013-45

Sample Date :09/25/2006		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	98.9		% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	93.1		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling tha	<b>190</b> n typical Diese	5.0 el Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	72.2		% Recovery	M EPA 8015	10/01/2008



Project Number: TMTIDE4, 2

Report Number: 65013

Date: 10/06/2008

Sample: C-5,10

Matrix : Soil

Lab Number: 65013-46

Sample Date .09/25/2006	Measured	Method Reporting		Analysis	Date	
Parameter	Value	Limit	Units	Method	Analyzed	
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008	
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008	
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008	
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008	
1,2-Dichloroethane-d4 (Surr)	102		% Recovery	EPA 8260B	09/29/2008	
Toluene - d8 (Surr)	93.5		% Recovery	EPA 8260B	09/29/2008	
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>9.3</b> n typical Diese	1.5 el Fuel.)	mg/Kg	M EPA 8015	10/03/2008	
1-Chlorooctadecane (Silica Gel Surr)	63.8		% Recovery	M EPA 8015	10/03/2008	



Date: 10/06/2008

Project Name : **Tidewater**Project Number : **TMTIDE4, 2** 

Sample : **C-5,15** 

Matrix : Soil

Lab Number : 65013-47

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	103		% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	93.9		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>4.3</b> an typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	87.8		% Recovery	M EPA 8015	10/01/2008



Project Number: TMTIDE4, 2

Sample : **C-5,20** 

Matrix : Soil

Method

Lab Number : 65013-48

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	98.3		% Recovery	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	94.0		% Recovery	EPA 8260B	09/29/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling th	<b>3.0</b> an typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	98.7		% Recovery	M EPA 8015	10/01/2008



Project Name :

Tidewater

Project Number: TMTIDE4, 2

Sample : C-12,2.5

Matrix : Soil

Lab Number : 65013-49

Report Number: 65013

Date: 10/06/2008

Sample Date :09/25/2008 Method Date Analysis Measured Reporting Limit Units Method Analyzed Value Parameter **EPA 8260B** 09/29/2008 < 0.0050 0.0050 mg/Kg Benzene 09/29/2008 < 0.0050 0.0050 mg/Kg EPA 8260B Toluene < 0.0050 0.0050 mg/Kg **EPA 8260B** 09/29/2008 Ethylbenzene 09/29/2008 0.0050 mg/Kg **EPA 8260B** 0.0058 Total Xylenes 09/29/2008 % Recovery **EPA 8260B** 105 1,2-Dichloroethane-d4 (Surr) EPA 8260B 09/29/2008 Toluene - d8 (Surr) 90.5 % Recovery 10/01/2008 1500 50 mg/Kg M EPA 8015 TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling than typical Diesel Fuel.) 10/01/2008 1-Chlorooctadecane (Silica Gel Surr) **Diluted Out** % Recovery M EPA 8015



Project Number: TMTIDE4, 2

Sample : **C-12,5** 

Matrix : Soil

Lab Number : 65013-50

Report Number: 65013 Date: 10/06/2008

Sample Date :09/25/2008		Method					
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed		
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008		
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008		
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008		
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008		
1,2-Dichloroethane-d4 (Surr)	105		% Recovery	EPA 8260B	09/30/2008		
Toluene - d8 (Surr)	93.4		% Recovery	EPA 8260B	09/30/2008		
TPH as Diesel (Silica Gel) 14 1.0 mg/Kg M EPA 8015 (Note: Hydrocarbons are higher-boiling than typical Diesel Fuel.)							
1-Chlorooctadecane (Silica Gel Surr)	107		% Recovery	M EPA 8015	10/01/2008		



Project Number: TMTIDE4, 2

Sample: C-12,10 Matrix : Soil

Lab Number : 65013-51

Report Number: 65013 Date: 10/06/2008

Sample Date :u9/25/2008		Method				
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed	
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008	
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008	
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008	
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008	
1,2-Dichloroethane-d4 (Surr)	107		% Recovery	EPA 8260B	09/30/2008	
Toluene - d8 (Surr)	92.9		% Recovery	EPA 8260B	09/30/2008	
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>5.7</b> an typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008	
1-Chlorooctadecane (Silica Gel Surr)	74.7		% Recovery	M EPA 8015	10/02/2008	



Project Number: TMTIDE4, 2

Sample: C-12,15

Matrix : Soil

Lab Number : 65013-52

Report Number: 65013 Date: 10/06/2008

Sample Date :09/25/2008		Method				
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed	
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008	
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008	
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008	
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008	
1,2-Dichloroethane-d4 (Surr)	99.1		% Recovery	EPA 8260B	09/30/2008	
Toluene - d8 (Surr)	93.4		% Recovery	EPA 8260B	09/30/2008	
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling than	<b>6.0</b> n typical Diese	1.0 I Fuel.)	mg/Kg	M EPA 8015	10/01/2008	
1-Chlorooctadecane (Silica Gel Surr)	89.8		% Recovery	M EPA 8015	10/01/2008	



Project Number: TMTIDE4, 2

Matrix : Soil Sample: C-12,20

Lab Number : 65013-53

Report Number: 65013 Date: 10/06/2008

Sample Date :09/25/2008	Measured	Method Reporting		Analysis	Date	
Parameter	Value	Limit	Units	Method	Analyzed	
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008	
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008	
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008	
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008	
1,2-Dichloroethane-d4 (Surr)	97.3		% Recovery	EPA 8260B	09/30/2008	
Toluene - d8 (Surr)	93.5		% Recovery	EPA 8260B	09/30/2008	
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	mg/Kg	M EPA 8015	10/01/2008			
1-Chlorooctadecane (Silica Gel Surr)	114		% Recovery	M EPA 8015	10/01/2008	



Project Name: Tidewater Project Number: TMTIDE4, 2

Sample : **C-12,25** 

Matrix : Soil

Lab Number: 65013-54

Report Number: 65013 Date: 10/06/2008

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	107		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	94.2		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	09/30/2008
1-Chlorooctadecane (Silica Gel Surr)	103		% Recovery	M EPA 8015	09/30/2008



Date: 10/06/2008

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Sample: C-12,30

Matrix : Soil

Lab Number : 65013-55

Sample Date :09/25/2008		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	102		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	94.6		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	09/30/2008
1-Chlorooctadecane (Silica Gel Surr)	99.7		% Recovery	M EPA 8015	09/30/2008

Date: 10/06/2008

QC Report : Method Blank Data

Project Name : Tidewater

Parameter	Measured Value	Method Reportin Limit	g Units	Analysis Method	Date Analyzed
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	09/29/2008
1-Chlorooctadecane (Silica Gel Surr)	85.1		%	M EPA 8015	09/29/2008
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	09/30/2008
1-Chlorooctadecane (Silica Gel Surr)	102		%	M EPA 8015	09/30/2008
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	09/30/2008
1-Chlorooctadecane (Silica Gel Surr)	94.4		%	M EPA 8015	09/30/2008
TPH as Diesel (Silica Gel)	< 1.0	1,0	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	93.0		%	M EPA 8015	10/02/2008
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0,0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	108		%	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	100		%	EPA 8260B	09/27/2008
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/27/2008
Total Xylenes	< 0.0050	0,0050	mg/Kg	EPA 8260B	09/27/2008
1,2-Dichloroethane-d4 (Surr)	102		%	EPA 8260B	09/27/2008
Toluene - d8 (Surr)	96.8		%	EPA 8260B	09/27/2008

Parameter	Measured Value	Method Reportii Limit	ng Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	106		%	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	99.9		%	EPA 8260B	09/29/2008
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/29/2008
1,2-Dichloroethane-d4 (Surr)	102		%	EPA 8260B	09/29/2008
Toluene - d8 (Surr)	100		%	EPA 8260B	09/29/2008

Date: 10/06/2008

QC Report : Matrix Spike/ Matrix Spike Duplicate

Project Name: **Tidewater**Project Number: **TMTIDE4, 2** 

Parameter	Spiked Sample	Sample Value	Spike Level	Spike Dup. Level	Spiked Sample Value	Duplicate Spiked Sample Value	e Units_	Analysis Method	Date Analyzed	Percent	Duplicat Spiked Sample Percent Recov.	Relative	Spiked Sample Percent Recov. Limit	Relative Percent Diff. Limit
TPH-D (Si Gel)	65013-01	74	20.0	20.0	87.0	75.1	mg/Kg	M EPA 8015	9/29/08	93.0	80.3	14.7	60-140	25
TPH-D (Si Gel)	65013-19	4.4	20.0	20.0	21.8	21.3	mg/Kg	M EPA 8015	9/30/08	89.1	87.1	2.29	60-140	25
TPH-D (Si Gel)	65002-05	<1.0	20.0	20.0	17.8	17.5	mg/Kg	M EPA 8015	9/30/08	88.8	87.6	1.31	60-140	25
TPH-D (Si Gel)	65030-08	9.6	20.0	20.0	23.2	31.5	mg/Kg	M EPA 8015	10/2/08	78.1	106	30.4	60-140	25
Benzene	65013-12	<0.0050	0.0400	0.0391	0.0343	0.0337	mg/Kg	EPA 8260B	9/27/08	85.8	86.2	0.471	70-130	25
Toluene	65013-12	<0.0050	0.0394	0.0385	0.0336	0.0332	mg/Kg	EPA 8260B	9/27/08	85.4	86.0	0.795	70-130	25
Benzene	65013-40	<0.0050	0.0394	0.0376	0.0332	0.0350	mg/Kg	EPA 8260B	9/27/08	84.3	93.1	9.88	70-130	25
Toluene	65013-40	<0.0050	0.0388	0.0370	0.0303	0.0329		EPA 8260B	9/27/08	77.9	88.8	13.0	70-130	25
Benzene	65013-44	<0.0050	0.0398	0.0400	0.0325	0.0336	ma/Ka	EPA 8260B	9/29/08	81.6	83.8	2.60	70-130	25
Toluene	65013-44	<0.0050	0.0392	0.0395	0.0315	0.0322		EPA 8260B	9/29/08	80.2	81.5	1.57	70-130	25
Benzene	65002-30	<0.0050	0.0392	0.0390	0.0381	0.0379	ma/Ka	EPA 8260B	9/29/08	97.2	97.3	0.161	70-130	25
Toluene	65002-30	<0.0050	0.0386	0.0384	0.0378	0.0374		EPA 8260B	9/29/08	97.9	97.4	0.486	70-130	25

Date: 10/06/2008

QC Report : Laboratory Control Sample (LCS)

Project Name : Tidewater

Parameter	Spike Level	Units	Analysis Method	Date Analyzed	LCS Percent Recov.	LCS Percent Recov. Limit
TPH-D (Si Gel)	20.0	mg/Kg	M EPA 8015	9/29/08	85.8	70-130
TPH-D (Si Gel)	20.0	mg/Kg	M EPA 8015	9/30/08	80.9	70-130
TPH-D (Si Gel)	20.0	mg/Kg	M EPA 8015	9/30/08	82.0	70-130
TPH-D (Si Gel)	20.0	mg/Kg	M EPA 8015	10/2/08	82.4	70-130
Benzene Toluene	0.0379 0.0373	mg/Kg mg/Kg	EPA 8260B EPA 8260B	9/27/08 9/27/08	92.2 92.5	70-130 70-130
Benzene Toluene	0.0373 0.0368	mg/Kg mg/Kg	EPA 8260B EPA 8260B	9/27/08 9/27/08	94.6 92.2	70-130 70-130
Benzene Toluene	0.0400 0.0395	mg/Kg mg/Kg	EPA 8260B EPA 8260B	9/29/08 9/29/08	85.2 87.4	70-130 70-130
Benzene Toluene	0.0400 0.0394	mg/Kg mg/Kg	EPA 8260B EPA 8260B	9/29/08 9/29/08	98.2 99.3	70-130 70-130



2795 2nd Street Suite 300 Davis, CA 95616

Lab: 530.297.4800 Fax: 530.297.4802

Page

								-									· · · · · · · · · · · · · · · · · · ·				_				
Project Contact (Hardcopy or	PDF To):			Calif	orni	a EC	F Re	oort?		☑ Ye	5		No				Chain-o	f-Custod	y Re	cord a	and	Analys	sis Requ	est	
Maura Dougherty	-			800	nlin	- C-	mpan	11 C	Cor	ło.								Analy	sis R	equest				TAT	T
Company / Address:	m+ U3F ^^	0451	າວ	Call	խուն	y CO	inpan	у∟О	, 000	ю.					-		1 1	, s.u.y	1 1	1			T	<b>1</b>	
2285 Morello Ave., Pleasa	nt HIII, CA	1 9404	دى	Glob	il ie	<u>ъ</u> т	0609	ฉกกา	ነደና							(SM)								12 hr	
Phone #: 925-602-4710, ext. 41	925-602	-4720	)	Gior	ous it	J. 1	0000	\$00t	,03							(EPA 8015M)								12 11	
Project #:	P.O. #:									(ddress		***********				(EP)									Ö
TMTIDE4, 2									ı, eticl	abreports	@eti	ceng	.com			출								24 hr	For Lab Use Only
Project Name:				Sam	pler	Pjø.	1a/lure							1		cleanup									ab
Tidewater					-	<i>/[:</i>		_				-	A A a Arriv			ge								48hr	orL
Project Address:	<u> </u>	Samp	oling		- Cc	ontai	ner/	-	- Pre	eservativ	e		Matrix		<u>~</u>	Signa								40111	ŭ.
4919 Tidewater Ave. Oakland, CA 94601		ļ			1										BTEX (EPA 8260B)	Diesel with silica									
				Š											PA	ese								72 hr	]
				≥	ķ		ੂ ਸ਼		یر ا	9 0		5			W W	as D								157	1
Sample Designation	l n	ate	Time	40 ml V	See	Poly	Tedlar		되볼	None		Water	Soil A		BTE	HE								IXI 1 wk	
C-6, Z		4/50		1	V					X			X		X	X									01
		1/57		1	$\supset$	$\top$			+		1			1	X										02
<u>C-6,5</u>	<del></del>		1200	-	$\Rightarrow$	+			-		╂╌		+	+	$\forall$	$\langle \cdot \rangle$								<del>                                     </del>	03
(-6,10			1206		$\Delta$	_				14	-		$\Delta$ _	-	$[\Delta]$	$\triangle$			+					-	1
(-6, 15		)	1211		X					X			$X_{\perp}$		X	Д								<b> </b>	94
C-6, 20		/	1220		$X^{\uparrow}$					X			X		X	X	_ ·								05
(7, 2,5			1430		X				-	X			$\times$		X	X									06
C-7, 5			1436		X	1				X			X		X	X		a constant							07
C-7, 10		7	1505	1	X	Ť				X			X		X	X									08
C-7, 15		/	1510		$\overrightarrow{\lambda}$	╅	┪			TXT					X	$\lambda$									09
C-7, 19.5		\1	1575		7	-	+		_		+				Z)	$\stackrel{\leftarrow}{\lambda}$			1						10
Relinquished by:		Υ	Date		4	Time	Red	eive	d by:				<u> </u>		/ 11		Remarks:			1_1_	<u>.</u>			/	<u> </u>
remiquisited by.			-		[	. 12310			,.					,			Place	, far	050	25 S	$\epsilon$ (	C.O.C	、かん	Juni	ra,
1 Jan 2	-			\	4		+			_	_	·					rien		10/2	1110					
Relinquished by:			Date		7	Time	Red	ceive	d by:						<del></del>		(	e fax 925) 6	,02-	-4 16					
							╬	-					<del></del>		•		Bill to:						·		
Dalinguiched hy	Date			Time	Rei	ceive	by L	aboratory	······································							For	lab L	Ise Only	<i>r</i> : S	Sample R	leceipt				
rum quonoc by.							1.	D		11			KIH		. 1		Temp °C	Initials	Ī	Date		Time	Therm. ID	Coola	nt Present
	· · · · · · · · · · · · · · · · · · ·		0929	フンし	2	(IU	1	$\mathcal{C}_{\mathcal{U}}$	M	Who	···	. 7	9-nal	YTIC	91		2,4	Love	10	9254	28	2010	IR-1	6	/ No



2795 2nd Street Suite 300 Davis CA 95616

Lab: 530,297,4800

092508

1709

SRG # / Lab No.

Temp °C

initials

Date

Time

Therm, ID#

Coolant Present Yes / No

530 297,4802 Project Contact (Hardcopy or PDF To): California EDF Report? √ Ypc ∏ No Chain-of-Custody Record and Analysis Request Maura Dougherty Company / Address: Sampling Company Log Code: Analysis Request TAT 2285 Morello Ave., Pleasant Hill, CA 94523 (EPA 8015M) Fay# Global ID: T0609900085 Phone #: 12 hr 925-602-4720 925-602-4710, ext. 41 Only PO#: FDF Deliverable To (Email Address):  $\prod$ Project#. Use 24 hr TMTIDE4, 2 MDougherty@eticeng.com, eticlabreports@eticeng.com IPH as Diesel with silica gel cleanup Sampler Signature: / Project Name: For Lab Tidewater Preservative Matrix 48hr Project Address: Containe Sampling 4919 Tidewater Ave. BTEX (EPA 8260B) Oakland, CA 94601 40 ml VOA Sleeve 72 hr Glass Tedlar Water HNO None X wk Pofy Soil 꾸 Sample Designation Date Time 1519 1522 13 1500 4 1575 1545 1255 18 C-11,10 19 20 9/25/00 Relinquished by: Date Time Received by: Remarks: Date Received by: Relinquished by: Bill to: Received by Laboratory; Relinquished by: For Lab Use Only: Sample Receipt

Distribution: White - Lab; Copy - Originator

Rev: 051805



ZINO STREET SUITE SUU Davis, CA 95616

Lab: 530.297.4800 Fax: 530.297.4802

	DOE T		, u.v. •	Cal	itorn	ia E	DE B	eport	?	Г	√] Yes					Ī		~				) _	۸ است		olo D	00:10	n.t	
Project Contact (Hardcopy or	ו זער	0):		Cai	HOH	ila L	Di I	-apoi t		Ľ	Yes		r	NO				Chain-c	M-CL	istody	Kec	ora a	ina A	maiys	315 T	eque	St	
Maura Dougherty				S 21	malir		anan:	any Lo	od Co	uie.						1				Analys	is Re	auest					TAT	$\neg \neg$
Company / Address:		ON 045	22	Jai	нрш	,g 0	ompe	211) L	<b>.</b>	,									T			ÌП			$\Box$	11		l
2285 Morello Ave., Pleasa	nt Hill,		23	Gio	hali	in. T	rner	9900	ากคร		_					1	. S			i							 12 hr	
Phone #: 925-602-4710, ext. 41		*. 602-472(	n	3.0	i Deli	٠.	·	75500	3000								80						1				ı	≥
Project #:	P.O.			ĒΒ	F De	eliver	able	To (E	Email	Addr	ess):					1	(EPA 8015M)											ō
TMTIDE4, 2											ports@	etice	eng.	com													24 hr	Se
Project Name:							natu					•				1	as Diesel with silica gel cleanup											For Lab Use Only
Tidewater					•	_	/7-	autit			سمس						ei c											֡֝֟֟֟֟ <u>֟</u>
Project Address:	T	Sam	oling		C	onta	iner	***************************************	P	rese	vative	,	1	Matri	X	1	83					}		1 1	.		48hr	S.
4919 Tidewater Ave.	İ		1	<b>1</b>		T		Т		Т			Т	T	1	ĝ	n Sil											
Oakland, CA 94601	1										1 1	- 1		ŀ	1	BTEX (EPA 8260B)	×										72 hr	
				ĮŞ.				1				1	-			PA	iese										72 111	
				mi VOA	è		8	E .		ء اع	,	1	<u>ا</u> ۾	. 1		×	as D										RZ)	
				40 ml V	ee	Poly	as	a la	ੁ	SH S			ă :	Soil	;	1	TP.H.										⊠ 1 wk	
Sample Designation		Date	7	_	_	-	) 	_	<del>Ĭ</del>				4	ı	╁	1			1	_		-1-1						21
C9,10		9/25/0	1824		X					14	وسسون	_		$\lambda$		X	X		-			_			<del>                                     </del>			
C9. 15		9/25/08	0830		X					Y				8		8	X								<del>                                     </del>	_		22
(-9 20		/	0838		X					×				X		K	X											23
C-川、マ·5			1006	1	χ					- X			Ť	X		X	4											21
		<del></del>	+	╁	+	╀╾┤	$\dashv$			- <del> </del>	7		1	X	十	X	X		1						$\prod$			25
C-14,5			1014	╀	X				1		<del>- </del>				-	4	<del>                                     </del>	<b></b>	-	_	$\vdash$	╅	-	+-	$\vdash$			
C-14,10			1056	·L	X					_ >				X	┩_	K	7					_			$\vdash$	_		26
C-14, 15			1105	1	X						۲			4		X	4								igspace			27
(-14, 20			1108	electron/III	X				and the same	h			ŀ	4		K	4											28
			0906	+	Х		$\neg$			1			Ī	X		1	X							ļ				29
			0928	4	×	1-1	1	+		٦,	Ϋ́	┢┯╅	$\dashv$	ग्र	$\top$	X												30
C-16/6		<u> </u>		1_	1	Tim	- 1	Receiv	nd by		ו			//			<u></u>	Remarks:			<u> </u>	نــــــــــــــــــــــــــــــــــــــ	1			1	<u> </u>	
Relinquished by:	_		Date			111111		TECEIV	eu by.	•								Temans.										
Dianoi	سرد						-		_						-													
Relinquished by:		<del></del>	Date			Tim	e F	Receiv	ed by			-,																
								***************************************										Bill to:									*	
			Date			Tim		Receiv	ed by	Labo	tatota.									For	l ab Us	se Only	r. Sa	mple F	Receir	ot .		
Relinquished by:		***	ł	^ ^2	2		- !	\ \	<i>)</i> .	/ /	1/			K:1	6			Temp °C		nítials	T	Date	T	Time		m. ID#	Coolan	t Present
			0929	ラリ、	D	11/	29]	J	m	γÜ	MA		8	lna.	14	ica			+-		<del>                                     </del>	<del></del>	1		<b>†</b>		Yes	/ No

K	I	F	F	
Ana	vt	ical	LLC	T

Z/95 ZNG Street Suite 300 Davis, CA 95616

Lab: 530.297.4800 Fax: 530.297.4802

														***************************************		7	************													_
Project Contact (Hardcopy or	PDF T	o):		California EDF Report?											t															
Maura Dougherty		······································		C		ng Co		<u> </u>		40.						┢							ques						ΆΤ	
Company / Address:		ON 045	00	Sai	upiii	ig Cu	ii pai	ıy Loş	3 00	uer.									1	-	T	3116	ques	T		Т	T T	_		
2285 Morello Ave., Pleasar Phone #:	Fax ?		23	Gio	nal	ID: T	กลกด	annr	185							1	()WG						ı							1
925-602-4710, ext. 41		r. 302-4720	5		V61	. J	0008	0000	,00								(EPA 8015M)											1	2 hr	≥
Project #:	P.O.					elivera								······································		1	(EP/						Ì				1 1		<b>]</b> [	or Lab Use Only
TMTIDE4, 2									ı, etic	labre	eports@	②etic	eng.	com														24	4 hr	Jse
Project Name:	· •			Sar	nple	Sign			_	*							Sear											_	_ l	۾
Tidewater									_[_	سو				-		4	TPH as Diesel with silica gel cleanup											1 -		آ آ
Project Address:	ŀ	Samp	<u>ling</u>	L.,		ontai	<u>ner</u>		Pr	eser	vative	4		Vlatri	X	┥、	ilica						i					- 141	8hr	ñ
4919 Tidewater Ave.																8	ith s											lr	J	
Oakland, CA 94601				4								1	ı			A 82	i se												2 hr	.
				Š	ø.		١					1				(EPA 8260B)	Die											1		
				Ξ	eev	Poly Class	물	;	<u> </u>		<b>}</b>		ate :	Air Air		BTEX	Has					Ì						ĮŞ	wk	
Sample Designation		Date		40	S	م ر	5 F		Ĭ   Ī	Ē Į Ž		_	<u>}</u> [	ğξ	4-				4		4			4		┿	+-+	41		
6-16,12	ľ	1/25/95	942		X											X	4									_	11		_	31
C-16, 16	ĺ		0947		X					Ý				ζ.		X	X													32
C-16, 20			0951		X					7	(		}	r		X	Y									L		$\bot$		33
(-13, 2,5			1030		X					X			Ż	X		Х	X									L.				34
C-13: 5		}	1036		Х					γ			7	<		X	X													35
C-13, 10		/	1144		X					$\lambda$				X		X	X													36
C-13, 15			1150		X					7>	1			X		X	V													37
C-13, 20		1	1156		X		1			)	1			d		X	X													38
C-8, 2.5		1	1370		X		1				AT I		)	X	T	X	X													39
C-8, 5		V	1354		X			П			7		1	X	T	X	X													40
Relinquished by:	<u>المسيحة</u> مر		Date			Time	Re	ceived	by:									Remark	(S:											
O jost one			_				+					<u>.</u>	······································																	
Dalia su dahad hus			Date			Time	-	ceiveo	( hu																					
Relinquished by:			Date			1446		CEIVEC	, by			_																		
					**********									~				Bill to:												
Relinquished by:			Date			Time		ceived	by L	abo	ratory:	1 ~	···.	سما	U	<del></del>				•	For L	ab U:	se On	y: S	ample l	Rec	eipt			
			092	50	8	170	١   ١	Š,	. /	/ /	V A			Ki		i.	ı	Temp	o°C	Initia	als		Date		Time	TT	herm, Il	5# c	coolent l	Present
			1	-		11 /	1	10	hh	W.	W			An	14	lica.	<del>]</del>	<u> </u>								T		Y	es /	No

KIFF	
Analytical LLC	

2795 2nd Street Suite 300

Davis, CA 95616 Lab: 530.297.4800

SRG#/Lab No. 65013

Allaytical atc			Fax: 5	30.2	97.4	400/	4																												
Project Contact (Hardcopy or	PDF T	o):		Cali	iforr	nia E	DF	Repo	ተ?		✓ Yes	[	<u> </u>	No					C	hai	n-of	-Cı	isto	ďν	Re	COI	d a	nd	Ana	ilys	sis I	Req	ues	t	
Maura Dougherty									····							4				. ,												- 1			
Company / Address:				San	nplii	ng C	omi	any L	.og C	ode	:					L	· · ·			<del> </del>	-	F	Ana	iysi	s Re	∍qu	est			· }	<del></del>			<u> FAT</u>	
2285 Morello Ave., Pleasar			23	<u> </u>				2022	000							_	- 1	<u>\$</u>				ĺ		ĺ						-					
Phone #:	Fax t	#: 602-4721	0	Glo	bal	ID:	T06	0990	008	5								8						- 1		- 1	- 1						1	2 hr	
925-602-4710, ext. 41 Project #:	P.O.		<u> </u>	En	F Da	elive	rahl	e To (	Ema	hA li	dress):					-1		(EPA 8015M)							1										5
TMTIDE4, 2	F.O.	π.									oreports@	etice	eng.	cor	m	1												1			1			4 hr	se (
Project Name:	· <b>i</b> —		······································	San	nple	er∕Si	ģņąl	ure:								7		gei cleanup					l		ļ			-			- 1		ı,		For Lab Use Only
Tidewater				/	16	زمر	14									╝		iei cl							Ì										Ę
Project Address:		Sam	oling		C	cont	aine	Γ		Pres	ervative		<u> </u>	Vla	ıtrix						***************************************	1		1									1	18hr	υ. C
4919 Tidewater Ave. Oakland, CA 94601				ξ													(EPA 8260B)	TPH as Diesel with silica																 ′2 hr	
Sample Designation		Date	Time	40 ml VOA	Sleeve	Poly	Glass	Tedlar	Ξ̈́Ξ	HNO3	None	14/242	Water	Soil	Air		BTEX (E	TPH as Di															!	X 1 wk	
C8,10		9/25/55	1343		X						$\chi$		]	Y			X	7				1													41
C-8, 15		1	1352		X						Y			\			1	V																	42
C-8, ZU			1338		$\lambda'$						M		,	1				$\lambda^*$																	¥3
65: 5		İ	1420		X						X			X		ľ	Χ	X																	44
G5,5			1425		X						K			, <b>*</b>			ベ	×																	45
C-5, 10		į.	(433)		γ						Х			Ÿ			Χ	X																	46
C5, 5 C-5, 10 C-5, 15			1443	,	٧.						X			×			X	メ																	47
C-5, 20		1	1448	3	×						7			K			*	$\prec$												_					48
L-12,2.5			1516		X						X			X.			X	¥					·												49
4-12,5	, in the	V	570		X						x			X.			X	X																	SO
Relinquished by:	ز سرز (		Pate			Tim	e	Recei	ved b	y:									Re	marks	<b>5</b> .														
Relinquished by:			Date			Tim	e	Recei	ved b	y:																									
																			Bill	to:															
Relinquished by:	<del>-:</del>		Date			Tim					oratory:	,	k	~	r								F	or L	ab U	se (	Only:	S	amp	e R	ecei	pt			
<del></del>			092	50	8	17	29	K.		f,	12	2	1	\	aly	1:	_ ]			emp	°C	l	nitials	3		D	ate		Tim	ie	The	erm. IC			Present
			1 -12		_	1, ',	ŧ	·	μV	VIC	NA			ŢΛ	119	! (	91					l							l		ĺ			Yes	/ No

KIFF	
Analytical LLC	V

ZISO ZNO SIFEET SUITE JUU Davis, CA 95616

Lab: 530.297.4800 Fax: 530.297.4802

Project Contact (Hardcopy or	PDF To		, αλ, υ				F Re	port?	***********	J	Yes			No		Т			Cha	in-of	LCu	etor	iv R	ecc	rd a	nd	Analy	/Sie	s Red	TUAS	.t	
Maura Dougherty																			Ona	II I-O						arca .	, 11 1Ci )	<del></del>	<i>-</i>			
Company / Address:				San	nplin	g Co	mpar	ny Log	Coc	le:						L						Anal	/sis l	Requ	uest						TAT	- 1
2285 Morello Ave., Pleasa	nt Hill, (	CA 9452	23	<u> </u>										**********	···········	$oldsymbol{oldsymbol{oldsymbol{\square}}}$	1	È.				_								. I 1		1
Phone #:	Fax #:	:		Glo	bal I	D: T	0609	9000	85								1 3													1	2 hr	
925-602-4710, ext. 41		02-4720	}	<u> </u>	·											_	1 8	2				ł								١,	_	칕
Project #:	P.O. #	<b>‡</b> :						o (Er									Įų				- 1	I										For Lab Use Only
TMTIDE4, 2			···					g.com	, etici	abre	ports@	yetic	eng.	.con	n	_		è				l								4	24 hr	Š
Project Name:				San	nple		nature				•						1	8						1							<u> </u>	슡
Tidewater			<u></u>				)	the			-ce							5				l										Ĭ.
Project Address:	ļ.,	Samp	ling	L.,	<u> </u>	ontai	ner		Pre	sen	/ative	4		Ma	trix	4,	.   }	2			-	Ė								"	48hr	ŭ
4919 Tidewater Ave. Oakland, CA 94601												ı				OTEN ACON SOCIO	DIEX (EFA OXONO)	W1(18 S)														
Oakland, OA 04001				ð								ı				Š		200												7	72 hr	.
				[골	ş		<u>a</u> 8		ئ	یو ا			Į.	_		>	. I	2												1,	K.	
Sample Designation		Date	Time	40 ml VOA	Sec	g	Tedlar			None			Water	Soil	Α̈́	1		<u> </u>						<u> </u>				L		4	X I wk	
C-12,10	4	9.2508			X					X				X		>	()	<														S/
6-12/15			1527		X					X			ľ	X		?	<b>`</b>	Ķ														SZ
C-12,20			1530		X					X		$\Box$		X		7																53
C-12,25			1600		X					X				Х		X		4														54
C-12,30			1605		¥			П		×				×		7	<  ·	У														<i>S</i> S
2 12 30			1000				-	††		+	1-1	1	$\dashv$	Ì			Ť	1	_			_	1					T				
				$\blacksquare$			╅	╁╂	$\dashv$	+		$\dashv$	$\dashv$			┰	╁	+	1			+	╅╾	+			_	t				
						-	┪-	╁╌╂	_	-	-	$\dashv$	$\dashv$		-+	+	_	$\dashv$		-		$\dashv$	+	+			_	十				
				-			-	╀		+		-				+	-	+	_			-	+	+-	+-			╁	-	-+		
	•					-				_						+	+	$\dashv$	<u> </u>	1		+	+					╀		_		
Malian dalam dalam		·	Date			Time	D.	ceived	l hv:		لــــــــــــــــــــــــــــــــــــــ								Remark	.e.								Т.				
Relinquished by:						. 11710	<del>- ``</del>						_					ľ	i veri ielin													
Jan T	ىقىد (																	_														
Relinquished by:			Date			Time	Re	ceive	by:																							
-												,				Ì	Bill to:				••••••		·····	·····	-			<del></del>	Margini	·		
Relinquished by:			Date			Time	Re	ceive	1 by L	abora	atory:		_	1	H			1				Fo	Lab	Use	Only	: S	ample	Rec	ceipt			
			0129	09	ζ !	170	9 \	1.	. [		1		:			1 👡		Ì	Temp	°C	in	itials			)ate		Time	T	herm.	iD#	Coolant	Present
	- /		•	' ' '	1 4	1	W	N	M	_	F	ተላ	417	7	a	Ī					T					T			Yes	/ No		



Date: 10/03/2008

Maura Dougherty ETIC Engineering, Inc 2285 Morello Avenue Pleasant Hill, CA 94523

Subject: 6 Soil Samples
Project Name: Tidewater
Project Number: TMTIDE4, 2

Dear Ms. Dougherty,

Chemical analysis of the samples referenced above has been completed. Summaries of the data are contained on the following pages. Sample(s) were received under documented chain-of-custody. US EPA protocols for sample storage and preservation were followed.

Kiff Analytical is certified by the State of California (# 2236). If you have any questions regarding procedures or results, please call me at 530-297-4800.

Sincerely,



Date: 10/03/2008

Subject:

6 Soil Samples

Project Name : Project Number :

Tidewater TMTIDE4, 2

## Case Narrative

Matrix Spike/Matrix Spike Duplicate results associated with samples C-15,2, C-15,5, C-15,10, C-15,15, C-15,20, and C-15,24 for the analyte Benzene were outside of control limits. This may indicate a bias for the sample that was spiked. Since the LCS recoveries were within control limits, no data are flagged.

Matrix Spike/Matrix Spike Duplicate results associated with samples C-15,2, C-15,5, C-15,10, C-15,15, C-15,20, and C-15,24 for the analyte Toluene were affected by the analyte concentrations already present in the un-spiked sample.



Project Number: TMTIDE4, 2

Matrix : Soil

Lab Number : 65041-01

Report Number: 65041 Date: 10/03/2008

Sample Date :09/25/2008

Sample : **C-15,2** 

Sample Date :09/25/2006	Managara	Method		Amakain	Dete
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	103		% Recovery	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	100		% Recovery	EPA 8260B	09/30/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>46</b> an typical Diese	5.0 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	92.2		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-15,5

Matrix : Soil

Lab Number : 65041-02

Report Number: 65041 Date: 10/03/2008

Sample Date :09/25/2008		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
1,2-Dichloroethane-d4 (Surr)	106		% Recovery	EPA 8260B	10/01/2008
Toluene - d8 (Surr)	102		% Recovery	EPA 8260B	10/01/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling tha	<b>380</b> n typical Diese	10 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	Diluted Out		% Recovery	M EPA 8015	10/02/2008



Project Number: TMTIDE4, 2

Sample: C-15,10

Matrix : Soil

Lab Number : 65041-03

Report Number: 65041 Date: 10/03/2008

Sample Date :09/25/2008		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
1,2-Dichloroethane-d4 (Surr)	104		% Recovery	EPA 8260B	10/01/2008
Toluene - d8 (Surr)	102		% Recovery	EPA 8260B	10/01/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling than	<b>7.4</b> n typical Diese	1.0 I Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	102		% Recovery	M EPA 8015	10/02/2008



Project Name : Tidewater Project Number: TMTIDE4, 2 Report Number: 65041

Date: 10/03/2008

Sample: C-15,15

Matrix : Soil

Lab Number : 65041-04

Sample Date :09/25/2008		Method			
Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
1,2-Dichloroethane-d4 (Surr)	103		% Recovery	EPA 8260B	10/01/2008
Toluene - d8 (Surr)	101		% Recovery	EPA 8260B	10/01/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>5.0</b> n typical Diese	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/03/2008
1-Chlorooctadecane (Sílica Gel Surr)	116		% Recovery	M EPA 8015	10/03/2008



Project Name: Tidewater Project Number: TMTIDE4, 2

Report Number: 65041

Date: 10/03/2008

Sample: C-15,20

Matrix: Soil

Lab Number: 65041-05

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed		
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008		
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008		
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008		
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008		
1,2-Dichloroethane-d4 (Surr)	102		% Recovery	EPA 8260B	10/01/2008		
Toluene - d8 (Surr)	101		% Recovery	EPA 8260B	10/01/2008		
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling that	<b>8.6</b> n typical Diese	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008		
1-Chlorooctadecane (Silica Gel Surr)	118		% Recovery	M EPA 8015	10/02/2008		



Project Name : Tidewater Project Number: TMTIDE4, 2 Report Number: 65041

Date: 10/03/2008

Sample: C-15,24

Matrix : Soil

Method

Lab Number : 65041-06

Parameter	Measured Value	Reporting Limit	Units	Analysis Method	Date Analyzed
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	10/01/2008
1,2-Dichloroethane-d4 (Surr)	102		% Recovery	EPA 8260B	10/01/2008
Toluene - d8 (Surr)	101		% Recovery	EPA 8260B	10/01/2008
TPH as Diesel (Silica Gel) (Note: Hydrocarbons are higher-boiling the	<b>1.3</b> nan typical Dies	1.0 el Fuel.)	mg/Kg	M EPA 8015	10/02/2008
1-Chlorooctadecane (Silica Gel Surr)	112		% Recovery	M EPA 8015	10/02/2008

Date: 10/03/2008

QC Report : Method Blank Data

Project Name : Tidewater

	Measured	Method Reportin	g	Analysis	Date
Parameter	Value	Limit	Units	Method	Analyzed
TPH as Diesel (Silica Gel)	< 1.0	1.0	mg/Kg	M EPA 8015	10/01/2008
1-Chlorooctadecane (Silica Gel Surr)	106		%	M EPA 8015	10/01/2008
Benzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Ethylbenzene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Toluene	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
Total Xylenes	< 0.0050	0.0050	mg/Kg	EPA 8260B	09/30/2008
1,2-Dichloroethane-d4 (Surr)	103		%	EPA 8260B	09/30/2008
Toluene - d8 (Surr)	92.3		%	EPA 8260B	09/30/2008

		Method			
·	Measured	Reportin	g	Analysis	Date
Parameter	Value	Limit	Units	Method	Analyzed

Date: 10/03/2008

QC Report : Matrix Spike/ Matrix Spike Duplicate

Project Name : Tidewater

Parameter	Spiked Sample	Sample Value	Spike Level	Spike Dup. Level	Spiked Sample Value	Duplicate Spiked Sample Value	e Units	Analysis Method	Date Analyzed	Spiked Sample Percent Recov.	Duplicat Spiked Sample Percent Recov.	Relative	Spiked Sample Percent Recov. Limit	Relative Percent Diff. Limit
Benzene	65050-21	0.014	0.0398	0.0400	0.0445	0.0413	mg/Kg	EPA 8260B	9/30/08	77.1	68.7	11.5	70-130	25
Toluene	65050-21	0.14	0.0392	0.0394	0.190	0.171	mg/Kg	EPA 8260B	9/30/08	136	85.8	45.5	70-130	25
TPH-D (Si Gel)	65050-21	150	20.0	20.0	153	148	mg/Kg	M EPA 8015	10/1/08	88.4	85.6	3.26	60-140	25

Date: 10/03/2008

QC Report : Laboratory Control Sample (LCS)

Project Name : **Tidewater** 

Parameter	Spike Level	Units	Analysis Method	Date Analyzed	LCS Percent Recov.	LCS Percent Recov. Limit
TPH-D (Si Gel)	20.0	mg/Kg	M EPA 8015	10/1/08	81.0	70-130
Benzene Toluene	0.0394 0.0388	mg/Kg mg/Kg	EPA 8260B EPA 8260B	9/30/08 9/30/08	88.4 89.0	70-130 70-130

K	I	-		<b>Z/2</b>
Ana	IV	tical	LLC	

Rev 051805

Davis, CA 95616 Lab: 530.297.4800 Fax: 530.297.4802

SRG # / Lab No

(e504)

age 1 of

/ Willing Eredi EEC			rax. o									,,,,,,,,									-						
Project Contact (Hardcopy or PDF To): California EDF Report? Yes No												Chain-of	-Custo	dy F	Reco	ord and	d Analy	ysis	Reque	est							
Maura Dougherty					)*	- 0		100	\			_			+				Ana	lveic	Requ	iest			***************************************	TAT	
Company / Address:				Sam	חווסו	g Col	mpany	reg (	∠oae	1,					┢	<del></del>		1 1	Alla	yoro	Negl	1 1	1	Т	1 1		
2285 Morello Ave., Pleasa			23	<del> </del>			20000	2202	r							1	2			ĺ							
Phone #:	Fax			Glo	al II	J: [1	06099	UUUB	Ö						ı	(415) 004514)	3						1 1			12 hr	
925-602-4710, ext. 41		302-4720		EDE	DF Deliverable To (Émail Address):									$\dashv$	á	Ĭ.			1	1						Ē	
Project #:	P.O.	<del>77</del> ;			Obugherty@sticeng.com, eticlabreports@eticeng.com								۱											24 hr	se (		
TMTIDE4, 2	l			San	moder Signature								PH as Diesel with silica gel deanup										or Lab Use Only				
Project Name:					moder/Sigherufe:							See			ı							ä					
Tidewater	- 1	Samp	lina	/		ontair		1	Proc	ervative			Mai	riy	-		8							1	1 1	48hr	ō
Project Address:	ŀ	Jan	mig	<del>                                     </del>	$\ddot{\tau}$	711104			T	CIVOLIV	Ť			T	1	<u>ا</u> ۾	Silic		***************************************								[ "
4919 Tidewater Ave.	-												ĺ		. 8	(EPA 8260B)	E								1 1		
Oakland, CA 94601				ا≥ا	1									Ì		8	ase									72 hr	·
,					0								1		į		֝֟֝֟֝֟֝֟֝֟֝ <u>֚֚</u>			1				İ		,	
	1			Ē	Se l	Poly	Tedlar	1,5	HNO3	None		Water	ݓ			BIEX	ř.					1 1		.		X wk	
Sample Designation		Date	Time	40 ml VOA	8	<u> 2</u>	5 10	J≚	主	ž		3	<u>ŏ</u>	₹		<u> </u>	-					<del>                                     </del>		-	<b>↓</b>	1 WK	
C-15,2		9.25.05	1636		X			$oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{oldsymbol{ol}}}}}}}}}}}}}}}}}}$		$\chi_{\perp}$			X			$\langle \rangle$						<u> </u>		1			01
C-15.5			1645		X					$X_{\perp}$		ľ	X		`	<u> </u>	X							_	<u> </u>	<u> </u>	OZ
C-15, 2 C-15, 5 C-15, 10 C-15, 15 C-15, 20 C-15, 24		$\overline{}$	1656		X					X			$\times$			$\langle \uparrow \rangle$	$\sqrt{}$										ده
C-15-15			1700		X								X			<u>\</u>	$\langle$										34
C-15,20		/	1757		X			T		X			X		Ì	$\langle   \rangle$											05
C-15.24		V	1720		X			Τ		X			X			$\sqrt{1}$	$\langle$									<u> </u>	06
		-		1	1			1	T				·														
								+	-		<u> </u>				$\top$	1											
							1 1	1	<b>†</b>						T	7											
Relinquished by: /			Date	<u> </u>	-	Time	Rece	lived b	y.		-	I					┪	Remarks:		······································							
Relinquished by:			9/2	6/3	5	120																					
7							<u> </u>	· · · · ·									_										
Relinquished by:			Date			Time	Rece	eived b	у:																		
																		Bill to:									
																		Diff (U.									
Relinquished by:	······································		Date		3	Time		eived t	y La	boratory:	-		K	7	7	_	- 1		F	or La	b Use	Only:	Sample	Rec	eipt		
			07.	2608 1578 Received by Laboratory: Arruly							. / .		Temp °C	Initials	; <b>T</b>	(	Date	Time	Tr	nerm. ID#	Coclar	l Present					
	<u> </u>						ر [		مرية				_//	- 444	J	ter	*/	2,4	22.0	_	01	8003	1740	Τ	(R)	es	)/ No
Distribution: White - Lab: Copy - Or	riginator		1										,,,						<b>4</b>								
	9					_		-																			