ALAMEDA COUNTY
HEALTH CARE SERVICES
AGENCY
DAVID J. KEARS, Agency Director

RAFAT A. SHAHID, DIRECTOR

DEPARTMENT OF ENVIRONMENTAL HEALTH
State Water Resources Control Board
Division of Clean Water Programs
UST Local Oversight Program
1131 Harbor Bay Parkway
Alameda, CA 94502-6577
(510) 567-6700

November 17, 1995

REMEDIAL ACTION COMPLETION CERTIFICATION

Mr. Charles Gensler
c/o Peterson Properties
1939 Harrison Street, Suite 605
Oakland, California 94612

RE: Former Oakland Diesel Facility
1301 65th Street, Emeryville, California 94608
STID # 363

Dear Mr. Gensler:

This letter confirms the completion of site investigation and remedial action for the 2000 gallon gasoline underground storage tank removed on June 9, 1988 at the above described location. Enclosed is the Case Closure Summary for the referenced site for your records.

Based upon the available information, including the current land use, and with the provision that the information provided to this agency was accurate and representative of site conditions, no further action related to the underground storage tank release is required.

This notice is issued pursuant to a regulation contained in Title 23, California Code of Regulations, Division 3, Chapter 16, Section 2721 (e). If a change in the present land use is proposed, the property owner must promptly notify this agency.

Please contact Susan L. Hugo at (510) 567-6780 if you have any questions regarding this matter.

Sincerely,

Jun Makishima

Jun Makishima, Interim Director

Enclosure

c: Gordon Coleman, Acting Chief, Environmental Protection - files
Kevin Graves, RWQCB
Mike Harper, SWRCB (with enclosure)
Ed Peterson, 1939 Harrison Street, Suite 605, Oakland, CA 94612

CASE CLOSURE SUMMARY
Leaking Underground Fuel Storage Tank Program

I. AGENCY INFORMATION — **Date: August 23, 1995**

Agency name: **Alameda County-HazMat** Address: **1131 Harbor Bay Parkway**
City/State/Zip: **Alameda, CA 94502** Phone: **(510) 567-6700**
Responsible staff person: **Susan Hugo** Title: **Sr. Hazardous Materials Spec.**

II. CASE INFORMATION

Site facility name: **Former Oakland Diesel Facility**
Site facility address: **1301 -65th Street, Emeryville, CA 94608**
RB LUSTIS Case No: **N/A** Local Case No./LOP Case No.: **363**
URF filing date: **6/15/88** SWEEPS No: **N/A**

Responsible Parties:	Addresses:	Phone Numbers:
Mr. Charles Gensler	**1939 Harrison Street**	
c/o Peterson Properties	**Suite 605, Oakland**	
	California 94612	

Tank No:	Size in gal.:	Contents:	Closed in-place or removed?:	Date:
1	2000	Gasoline	Removed	6/9/88

III. RELEASE AND SITE CHARACTERIZATION INFORMATION

Cause and type of release: Corrosion holes in the UST
Site characterization complete? **YES**
Date approved by oversight agency: **11/22/94**
Monitoring Wells installed? **YES** Number: **One (1)**
Proper screened interval? **YES**
Highest GW depth below ground surface: **2.08 ft.** Lowest depth: **4.45 ft.**
Flow direction: **Southwest**
Most sensitive current use: **Commercial**
Are drinking water wells affected? **NO** Aquifer name: **NA**
Is surface water affected? **NO** Nearest affected SW name: **NA**
Off-site beneficial use impacts (addresses/locations): **NA**

Report(s) on file? **YES** Where is report(s) filed? **Alameda County**
1131 Harbor Bay Parkway
Alameda, CA 94502-6577

Treatment and Disposal of Affected Material:

Material	Amount (include units)	Action (Treatment of Disposal w/destination)	Date
Tank	2000 gallons	H & H Ship Service San Francisco, CA	6/9/88
Piping	Miscellaneous	H & H Ship Service San Francisco, CA	6/9/88
Soil	50 cubic yards	Aerated & Disposed at West Contra Costa Landfill	9/23/88
Barrels	55 gallons	Refineries Services	7/2/90
	55 gallons	Hedrick Distributors	4/8/91

III. RELEASE AND SITE CHARACTERIZATION INFORMATION (Continued)
Maximum Documented Contaminant Concentrations - - Before and After Cleanup

Contaminant	Soil (ppm)		Water (ppb)	
	Before	After	Before	After
TPH (Gas)	220	35	1,400	ND
Benzene	2.4	0.58	440	28
Toluene	< 1.0	0.46	5.6	ND
Xylene	22	4.9	15	1.2
Ethylbenzene	< 2.0	0.67	25	2.0
TCE	-	-	52	-
DCE	-	-	100	-

Comments (Depth of Remediation, etc.):

One 2,000 gallon gasoline underground storage tank was removed from the subject site on June 9, 1988. Holes were found in the former tank. Ground water was present in the excavation at approximately 12 feet bgs. A sheen was visible on the ground water. Three soil samples were collected upon removal of the tank. Two of the soil samples were collected at 11 feet depth (one sample near the fill end and the other sample near the vent line). The third sample was collected at 12 feet depth along the south wall of the excavation. The soil samples collected at the south wall (12 feet bgs) and near the vent line (11 feet bgs) showed no detectable levels of TPH gasoline and BTEX. Low levels of contamination (180 ppb TPH gasoline and 53 ppb benzene) were found in the sample collected near the fill end of the former tank.

One 23-foot-deep, 2-inch-diameter ground water monitoring well was installed on June 28, 1988 in the inferred downgradient direction (southwest). The well was installed 25 feet from the UST excavation rather than within 10 feet due to the presence of an overhead power line. Soil samples were collected during the installation of the monitoring well at approximate depths of 5, 10 and 15 feet bgs. Soil sample collected at 5 feet bgs showed TPH gasoline at 35 ppm, benzene at 0.58 ppm, toluene at 0.46 ppm, xylene at 4.9 ppm, and ethyl benzene at 0.67 ppm. Soil sample collected at 10 feet bgs showed TPH gasoline at 0.63 ppm and benzene at 0.02 ppm. No detectable level of petroleum hydrocarbon contamination was found in the soil sample collected at 15 feet bgs.

Ground water was encountered during drilling at 14.5 feet bgs and stabilized at a depth of 3 to 4 feet bgs. The site stratigraphy generally consisted of clay with varying amounts of silt and sand. Based on the review of the ground water data from several neighboring sites, ground water appears to flow generally to the west - southwest (towards the San Francisco Bay which is approximately 2,500 feet from the subject site). Depth to ground water at the site fluctuates from 2.08 feet to 4.45 feet.

Ground water had been sampled consistently since 1988. Petroleum hydrocarbon contamination was detected in the well (MW-1) at the following concentration: <0.05 - 1.4 ppm TPH gasoline; <0.5 - 440 ppb benzene; <0.5 - 5.6 ppb toluene; <0.5 - 25 ppb ethyl benzene; <0.5 - 15 ppb xylene. In addition, TCE (52 ppb) and DCE (100 ppb) was detected during the initial sampling of the well using the EPA 8240 analyses. The presence of the chlorinated solvents in the groundwater appeared to be coming from an adjacent / upgradient property. Therefore, the 8240 analyses for chlorinated solvents was dropped after the initial sampling. Lead (<100 ppb) was analyzed one time during the May 1990 sampling event.

Based on the historical ground water data collected at the site, TPH gasoline has been non detect (< 0.05 ppm) for five consecutive events since May 1994. Benzene has dropped considerably since the start of the investigation and was detected at 28 ppb during the last sampling event (2/15/95). Ethyl benzene (2.0 ppb) and xylene (1.2 ppb) was detected during the last sampling on 2/15/95. However, toluene was not detected during this sampling event.

IV. CLOSURE

Does completed corrective action protect existing beneficial uses per the Regional Board Basin Plan? **Undetermined**
Does completed corrective action protect potential beneficial uses per the Regional Board Basin Plan? **Undetermined**
Does corrective action protect public health for current land use? **YES**
Site management requirements: **NA**
Should corrective action be reviewed if land use changes? **YES**
Monitoring wells Decommissioned: **No, will decommission upon approval of case closure**
Number Decommissioned: **NA** Number Retained: **NA**
List enforcement actions taken: **NA**
List enforcement actions rescinded: **NA**

V. LOCAL AGENCY REPRESENTATIVE DATA

Name: **Susan L. Hugo** Title: **Sr. Hazardous Materials Specialist**
Signature: Susan L Hugo Date: 8/28/95
Reviewed by
Name: **Dale Kletkke** Title: **Hazardous Materials Specialist**
Signature: Dale Kletkke Date: 8/30/95
Name: **Thomas Peacock** Title: **Sup. Hazardous Materials Specialist**
Signature: Thomas Peacock Date: 8-29-95

VI. RWQCB NOTIFICATION

Date Submitted to RB:
RWQCB Staff Name: Kevin Graves
RB Response: Approved
Title: Water Resources Control Engineer
Date: 9/27/95

VII. ADDITIONAL COMMENTS, DATA, ETC.

Although low levels of benzene (28 ppb) are still detected in the ground water beneath the site, aggressive source removal and long term monitoring (from 6/88 to 2/95) has occurred at the subject site. The concentration of benzene has decreased considerably and the shallow ground water in the area are not used a source of drinking water. Therefore, based on the available information for the site, it appears that further investigation and clean up of petroleum hydrocarbons are not necessary.

SOURCE: UNITED STATES GEOGRAPHICAL SURVEY 7.5' QUAD. "OAKLAND WEST, CA" PHOTOREVISED 1980.

BLYMYER ENGINEERS, INC.

BEI JOB NO. 89070

DATE 5/24/94

0 1000 2000

SCALE IN FEET

N

SITE LOCATION MAP

1301 65th ST. ASSOCIATION
1301 65th ST.
EMERYVILLE, CA

FIGURE 1

Table II. Groundwater Elevations
1301 65th Street Association/Rix Industries
1301 65th Street/6460 Hollis Street, Emeryville, California
BEI Job No. 89070

Monitoring Well	Date	TOC Elevation* (feet)	Depth to Water (feet)	Groundwater Elevation (feet)
MW-1[1]	11/11/94	100.66	2.24	98.42
	2/13/95		2.08	98.58
MW-1[2]	11/11/94	100.00	2.08	97.92
	2/13/95		2.25	97.75
MW-2[2]	11/11/94	100.04	1.89	98.15
	2/13/95		2.12	97.92
MW-3[2]	11/11/94	101.99	2.38	99.61
	2/13/95		2.49	99.50

TOC = Top-of-Casing

* Arbitrary datum of 100.00 feet is top-of-rim on MW-1 well box at Rix Industries site

[1] Monitoring well at 1301 65th Street Association site

[2] Monitoring wells at Rix Industries site

Table 1, Summary of Groundwater Sample Analytical Results
1301 65th Street Association
1301 65th Street, Emeryville, California
BEI Job No. 89070

Monitoring Well	Sampling Date	TPH as Gasoline	Benzene	Toluene	Ethylbenzene	Total Xylenes	DTW
		EPA 8015M	EPA 8020	EPA 8020	EPA 8020	EPA 8020	
		mg/L	µg/L	µg/L	µg/L	µg/L	
MW-1	6/10/88*	1.4	<3	<10	<4	15	
	2/13/89	0.21	<1	<0.9	5.6	<2	2.96
	5/8/89	0.36	79	<2	7.5	<4	3.16
	8/8/89	0.24	21	<2	5.2	<7	4.03
	11/8/89	0.44	270	<3	5.9	<9	3.91
	2/8/90	0.56	440	5.6	13	<10	3.67
	5/10/90	0.29	200	<3	<5	<10	3.99
	8/8/90	0.62	430	<5	25	<10	3.90
	11/12/90	0.18	9.4	1.8	<0.5	<0.5	4.45
	2/11/91	1.3	45	1.9	4.8	0.7	3.92
	5/14/91	1.0	61	<0.5	9.5	1.9	3.34
	5/2/94	<0.05	<0.5	<0.5	<0.5	<0.5	2.70
	8/2/94	<0.05	31	<0.5	3.4	2.7	3.46
	8/25/94	<0.05	13	<0.5	<0.5	<0.5	3.58
	11/11/94	<0.05	28	4.3	<0.5	5.0	2.24
	2/15/95	<0.05	28	<0.5	2.0	1.2	2.08

* Benzene, toluene, ethylbenzene, and total xylenes analyzed by EPA Method 624

TPH = Total Petroleum Hydrocarbons
mg/L = milligrams per liter (parts per million)
µg/L = micrograms per liter (parts per billion)

Note: For results shown as <x, x represents the method reporting limit.

BLYMYER
ENGINEERS, INC.

BORE & WELL CONSTRUCTION LOG: MW-1

Job No.: 89070
Client: Henry Horn and Sons
Site: 1301 65th Street
Emeryville, CA
Date Drilled: 8/8/88
Logged By: S. Costello/ENSCO Env. Services

Drilling Company: All Terrain Exploration
Driller: Harry
Drilling Equipment: Hollow Stem Auger
Sample Method: Lined Split-spoon
Bore Diameter: 8 in.
Total Depth: 28 ft.

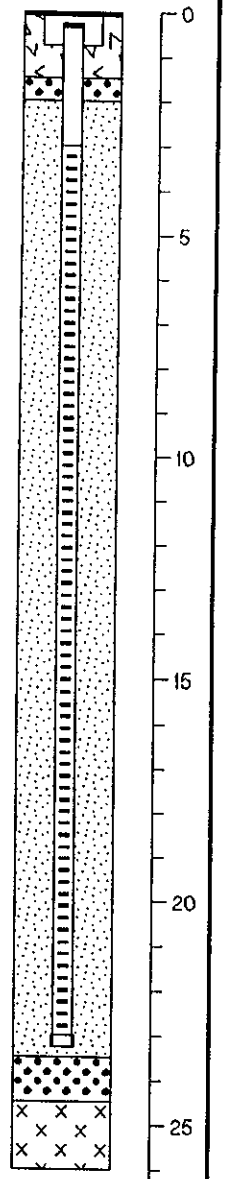
Well Completion Depth: 23 ft.
Component Size/Type — Depths in feet From — To

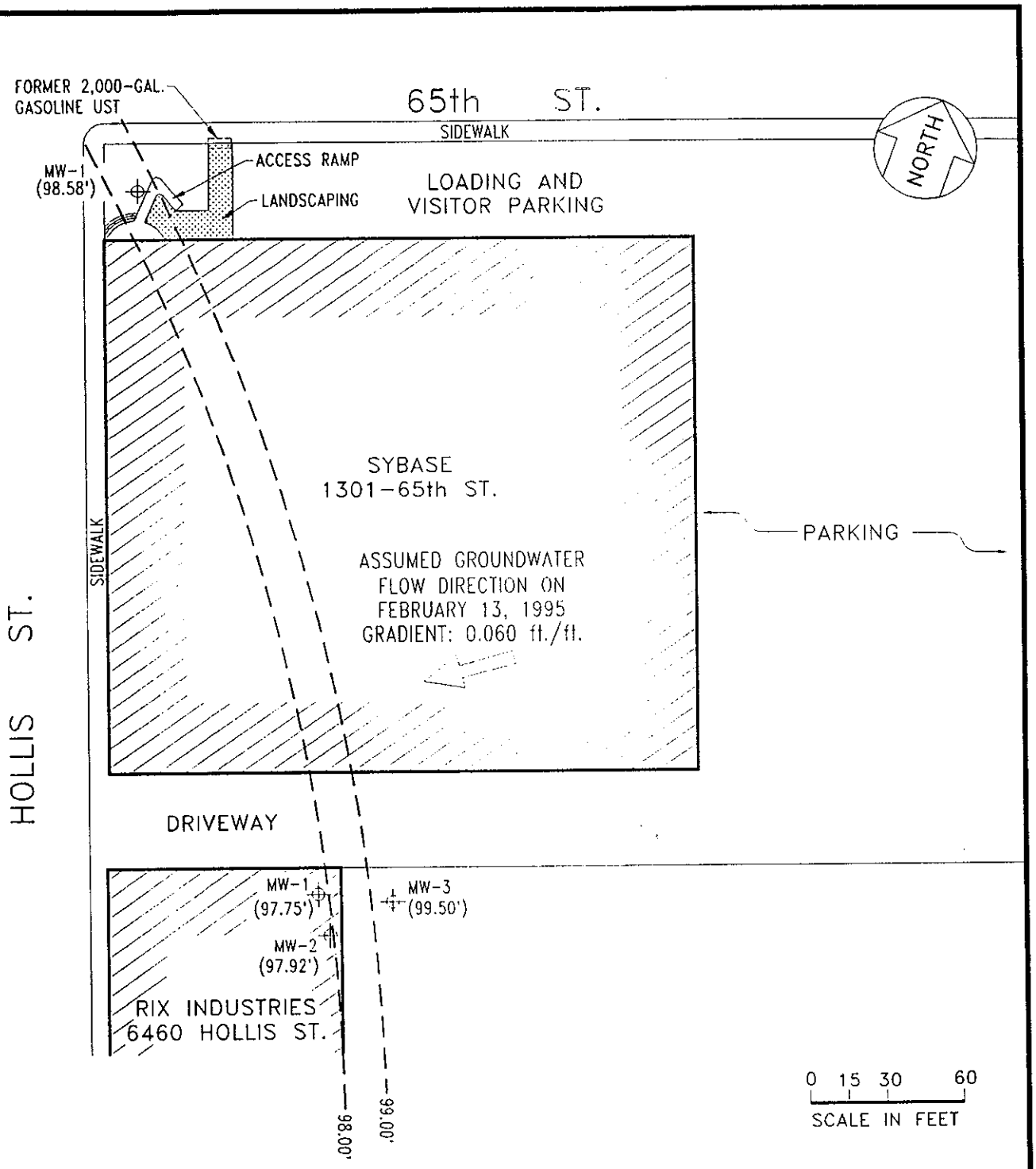
Component Size/Type	From	To
Surface Completion: Flush Traffic Rated Vault with Locking Cap		
Surface Seal: Cement	.00	1.50
Annular Seal: Cement		
Seal: Bentonite	1.50	2.00
Sand Pack: #3-16 Sand	2.00	23.50
Bottom Seal: Bentonite	23.50	24.50
Blank Casing: 2" Diam. PVC	.25	3.00
Screened Casing: 0.02" Slot-2" Diam. PVC	3.00	23.00

Initial Water Depth: ▽ 14.4 ft.
Stabilized Water Depth: ▽

Depth (ft.)	Blows/6 in.	P.I.D. (ppm)	Sample Intervals Cored / Cored/Analyzed	Unified Soil Classification	LITHOLOGIC DESCRIPTION
0				A	ASPHALT
				F	Sandy GRAVEL FILL
				CH	Dark brown CLAY, with minor amounts of silt and fine grained sand; damp; slight odor
5	7 15 28				Gray-green sandy CLAY; with fine to coarse grained sand; hard; damp; slight odor
					mottled light brown; few root holes
10	5 8 10				silty; very stiff; damp; very slight odor
15	8 13 20			CH	less silty; hard; wet; odorless; root holes (0.375-0.625 in. in diameter)
20	10 15 19				gray mottling; odorless; trace organic staining; few shell fragments
25	9 11 14			CL	Light brown sandy CLAY, very silty; very stiff; wet; odorless; one 4 in. thick black silty sand lens
					Bore terminated at 28 ft.
30					

Water Depth: ▽ 14.4'





BLYMYER ENGINEERS, INC.

BEI JOB NO.	DATE
89070	2/23/95

LEGEND
- ⊕ MONITORING WELL
- (98.58') GROUNDWATER ELEVATION ON 2/13/95
- UST UNDERGROUND STORAGE TANK

SITE PLAN
1301 65th ST. ASSOCIATION
EMERYVILLE, CA, CA

FIGURE 2

H:\PUBLIC\ACADLW\890702C

BEI JOB NO. 8897.1

INTRODUCTION

Blymyer Engineers was retained by Henry Horn & Sons to provide environmental services required for the sale of real estate property located at 1301-65th Street, Emeryville, California. These services included the installation of one groundwater monitoring well near the tank location and the removal of one 2,000 gallon underground storage tank. This report conveys the results of the performance of these tasks per Regional Water Quality Control Board notification and reporting requirements.

SITE HISTORY

The building and 2,000 gallon underground storage tank on site were installed ~~in 1952.~~ The tank and associated piping, which was used for gasoline storage until January, 1972, passed Precision tank testing two years ago (Exhibit A). The tank was filled with water for the tank test.

The property has been leased for the last seven years by Oakland Diesel Distributing Corporation. Oakland Diesel uses the site as a center for the sale and repair of engine parts.

SITE LOCATION & GEOLOGY

The site is located to the east, northeast of the San Pablo Ridge in an industrialized section of Emeryville, CA. The topography is relatively flat with low rolling hills to the east. The San Francisco Bay is approximately 1/2 mile to the west (Exhibit B). The site is underlain by stiff bay mud. Groundwater was expected to be between 5 feet and 10 feet and is typically non-potable in this area.

MONITORING WELL INSTALLATION

One 2" diameter .020 slotted PVC monitoring well was installed Wednesday, June 8, 1988, by All Terrain Exploration, Roseville, CA. An 8-1/4" tire mounted, hollow-stem, auger rig was used to drill the bore. A geologist from Ensco, Inc. was on site to log the bore. (Exhibit C). [redacted] The well was installed approximately 25 feet southwest of the tank. This location is inferred to be hydraulically downgradient of the tank. (Exhibit B).

The bore was drilled to a depth of 26 feet; however, when removing the augers to set the well screen, some soil collapsed into the hole. As a result, the final well depth is 23 feet deep with 20 feet of screen. Due to the well screen configuration, only 3 feet of casing was installed instead of the intended 5 feet. #3 Lonestar Sand was used as filter pack which was brought up to a depth of one foot above screen height. Six inches of

bentonite pellets were then placed and finally 1-1/2 feet of concrete was added as a sanitary seal to grade. A locking well monument and a traffic-rated well cover were installed.

The well was developed by bailing on June 9, 1988 by All Terrain Exploration. All bailed well water was collected in two 55 gallon drums. During the bailing sequence groundwater quickly recharged. On June 16, 1988 the depth of groundwater was observed to be at 4 feet 9 inches.

SOIL SAMPLING

Samples were collected at five foot intervals to a depth of first water, 14 feet, using a California split-spoon sample. Slight hydrocarbon odors were detected at the time of drilling. Samples were logged and properly prepared for transportation to Trace Analysis Laboratory, Hayward, California, a State-certified laboratory. (Exhibit D).

The samples were analyzed for TPH-g and BTXE. The results of these analyses are presented in Exhibit D and are summarized in Table I.

TABLE I

SOIL BORING SAMPLE ANALYTICAL RESULTS (ppb)

	TPH-g	BENZENE	TOLUENE	XYLENE	EYTHL-BENZENE
MW-1 5'	35,000	580	460	4,900	670
MW-1 10'	630	20	<10	<20	<10
MW-1 15'	<500	<10	<10	<20	<10

These results indicate that the majority of the petroleum constituents are located above 10 feet bgs and are, therefore, not present in the water-saturated soils.

WATER SAMPLING

One water sample was collected from the monitoring well and analyzed for TPH-g, BTXE and EPA Method #624/8240 constituents. The results of these analyses are presented in Exhibit D. The results of the TPH-g and BTXE analyses are summarized in Table II.

TABLE II

MONITORING WELL ANALYTICAL RESULTS (ppb)

	TPH-g	BENZENE	TOLUENE	XYLENE	ETHYL-BENZENE
MW-1	1,400	<3	<10	15	<4

UNDERGROUND STORAGE TANK REMOVAL

The underground storage tank was removed on June 9, 1988, by the subcontractor, Eagan & Company. Prior to tank removal, H & H Ship Service removed a 60% water and 35% gas mixture from the tank. A 3 inch gas main and an unidentified line layed over the longitudinal axis of the tank.

The tank backfill consisted of foundry sand which has become cemented since the tank was installed. Excavation of cemented backfill was difficult and required a considerable amount of time.

Groundwater began infiltrating the excavation to a depth of approximately 12 feet bgs. A sheen was visible on the water-table. The majority of contaminated soil was removed from the excavation and stock-piled on Visqueen. Clean soil was separated from contaminated soil based upon apparent odors.

An inspection of the tank indicated that two 1-inch diameter holes had developed due to corrosion at the bottom of the tank and along the fill riser.

Tank Soil Samples

Soil samples were collected by Trace Analysis from beneath the tank (approximately one foot into native soil) at both ends of the tank. (This corresponds to a depth of approximately 11 feet). A soil sample was also collected from a depth of 12 feet along the south wall of the excavation. The soil was brought to the surface for sampling by the backhoe. The results of the soil samples were as follows:

TABLE III

TANK SOIL SAMPLE RESULTS (ppb)

	TPH-g	BENZENE	TOLUENE	XYLENE	ETHYL-BENZENE
#1 - Fill	180	53	<10	<5	<4
#2 - Vent	<40	<3	<10	<5	<4
#3 - 12'	<40	<3	<10	<5	<4

Mr. Jim Ingersole, City of Emeryville Fire Department, was on site during the removal of the tank from the excavation and soil sampling. Because a telephone and electric utility pole bordered the north side of the excavation, the excavation was immediately backfilled with crushed rock to support the pole. The contaminated soil pile was covered with Visqueen.

In compliance with California State Regulations, an Unauthorized Release Form has been filed with the Alameda County Department of Health Services, and the RWQCB, BAAQMD and DOHS have all been notified of the leak. Mr. Dennis Bryne is the official contact for this site at the Alameda County Department of Health Services.

Well Survey

A reconnaissance survey of wells located within a 1/2 mile radius of the site was conducted via telephone conversations with the Alameda County Flood Control District. The results of this survey indicate that no water supply wells are located within 1/2 mile of the site.

Soil Pile Samples

Three soil pile samples were obtained from the contaminated soil pile on June 16, 1988 to confirm the tank soil sample analytical results. Samples were collected from the most obvious points of contamination. Table III indicates the analytical results as performed by Trace Analysis Laboratories.

TABLE IV

SOIL PILE ANALYTICAL RESULTS (ppb)

	THP-g	BENZENE	TOLUENE	XYLENE	ETHYL-BENZENE
NE, Pile	340	28	<10	<20	<20
S Pile	54,000	310	49	470	82
NW, Pile	220,000	2,400	<1,000	22,000	<2,000

Conclusions

Based upon the above-mentioned observations and analytical results, Blymyer Engineers concludes the following:

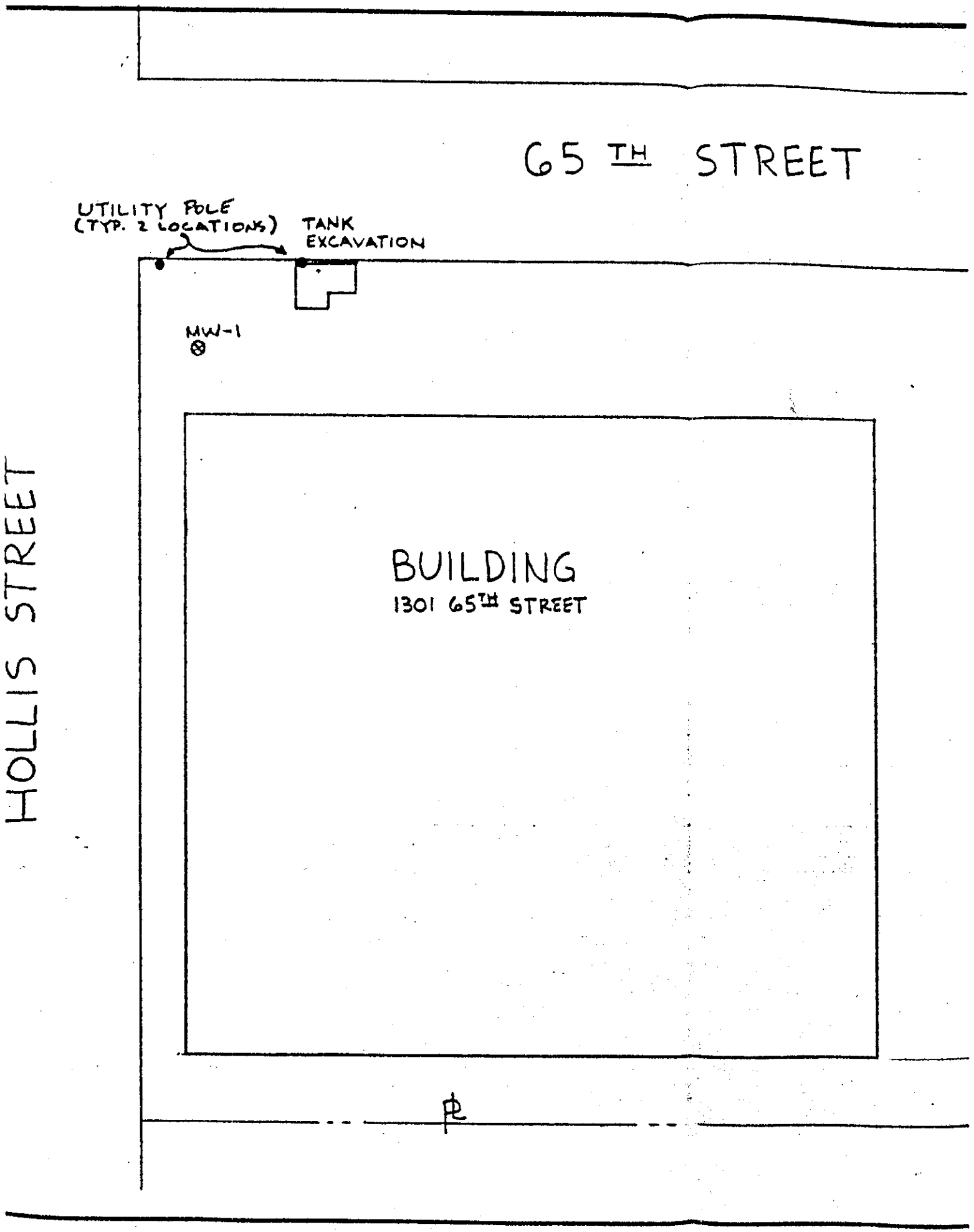
- The site is located in an industrial area.
- Groundwater is non-potable and is assumed to be brackish in quality.
- The tank has not been used for 16 years. In addition, the tank passed testing two years ago. Therefore, it appears that contamination has only recently entered the subsurface.
- Although two underground utility lines ran along tank top, these lines appeared to have been back-filled with native soil rather than with typical sandy back-fill. This native soil has a very low permeability. Therefore, laterial migration away from the tank site is unlikely. The real extent of contamination is assumed to be localized to the tank excavation.
- Although groundwater has been impacted from the leaking tank, the down gradient monitoring well shows only minimal contamination of 1.4 ppm of total petroleum hydrocarbons as gasoline and .015 ppm of Xylene.
- There are no water supply wells located within 1/2 mile of the site.

RECOMMENDATIONS

Blymyer Engineers recommends that the groundwater quality at the site be monitored by sampling MW-1 on a quarterly basis. The collected water sample should be analyzed for TPH-g and BTXE. Quarterly reports must be submitted to the RWQCB.

Gasoline contamination soil is in the process of being moved and spread on site for aeration in a 15' x 80' x 1' pile. The BAAQMD will be notified 24 hours in advance of aeration.

Blymyer Engineers, Inc. does not believe any other action be taken at this time and that the groundwater contamination found in the monitoring well is below action levels based upon the assumed water quality in this area of Emeryville.


65 TH STREET
UTILITY POLE
(TYP. 2 LOCATIONS)
TANK
EXCAVATION
MW-1
BUILDING
1301 65TH STREET
HOLLIS STREET

Blymyer Engineers, Inc.

Client Henry Horn and Sons
Site 1301 65th, Emeryville

Exploratory Bore Log
Date 6/8/88
Job# 8897 1
Rig 8 1/4" Hollow Stem Auger
Diameter 2"
Boring No. MW-1

Driller All Terrain Exploration Drilling
Logged by Steve Costello/Ensco Environmental Services

Description and Classification					Depth	Sample	Notes
Description and Remarks	Color	Blow Counts	Consist.	Soil Type			
Pavement 4" Asphalt							No odors
Fill Sandy clayey gravel	Drk Brn				1		
Clay With minor silt and trace fine sand	Drk Brn			CH			Slight odor Damp
Sandy Clay With fine to coarse sand	Grayish Green	7/15/28	Hard			1-1	
					5		Slight odor Damp
- Becomes mottled with light brown at 5', few rootholes							
						1-2	
- Becomes very silty		5/8/10	Very Stiff		10		Very slight odor Damp
				CH			
					▽	1-3	
- Less silt, rootholes approx. 3-5 mm dia.	Lighter	8/13/20	Hard		15		Wet No odors
- As above, grayish gray mottling, trace organic staining, rare shell fragments	Light Brown	10/15/19			20		No odors No liners
- Becomes very silty low plasticity, one 4" black saturated silty sand lense		9/11/14	Very Stiff	CL	25		Wet No odors No liner
Bottom of Borehole							
					30		

EXHIBIT

DATE: 6/20/88
LOG NO.: 6073
DATE SAMPLED: 6/9/88
DATE RECEIVED: 6/9/88
PAGE: Two

Sample Type: Water

Method and Constituent	Units	MW1 Concentration	MW1 Detection Limit
DHS Method:			
Total Petroleum Hydrocarbons as Gasoline	ug/l	1,400	40
Modified EPA Method 8020:			
Benzene	ug/l	< 3	3
Toluene	ug/l	< 10	10
Xylenes	ug/l	15	5
Ethyl Benzene	ug/l	< 4	4
EPA Method 8240:			
Chloromethane	ug/l	< 3	3
Bromomethane	ug/l	< 3	3
Vinyl chloride	ug/l	< 3	3
Chloroethane	ug/l	< 3	3
Methylene chloride	ug/l	< 9	9
Trichlorofluoromethane	ug/l	< 3	3
1,1-Dichloroethene	ug/l	< 3	3
1,1-Dichloroethane	ug/l	< 3	3
DCA trans-1,2-Dichloroethene	ug/l	100	3 ✓
Chloroform	ug/l	< 3	3
1,2-Dichloroethane	ug/l	< 3	3
1,1,1-Trichloroethane	ug/l	< 3	3
Carbon tetrachloride	ug/l	< 3	3
Bromodichloromethane	ug/l	< 3	3
1,2-Dichloropropane	ug/l	< 3	3
trans-1,3-Dichloropropene	ug/l	< 3	3
Trichloroethene TCE	ug/l	52	3 ✓
Benzene	ug/l	< 3	3

DATE: 6/20/88
LOG NO.: 6073
DATE SAMPLED: 6/9/88
DATE RECEIVED: 6/9/88
PAGE: Three

Sample Type: Water

Method and Constituent	Units	MW1 Concentration	MW1 Detection Limit
EPA Method 8240 (Continued):			
Dibromochloromethane	ug/l	< 3	3
1,1,2-Trichloroethane	ug/l	< 3	3
cis-1,3-Dichloropropene	ug/l	< 3	3
2-Chloroethylvinyl ether	ug/l	< 3	3
Bromoform	ug/l	< 3	3
1,1,2,2-Tetrachloroethane	ug/l	5.2	3 ✓
Tetrachloroethene	ug/l	< 3	3
Toluene	ug/l	< 9	9
Chlorobenzene	ug/l	< 3	3
Ethyl benzene	ug/l	< 3	3
1,3-Dichlorobenzene	ug/l	< 3	3
1,2-Dichlorobenzene	ug/l	< 3	3
1,4-Dichlorobenzene	ug/l	< 3	3
Other Constituents Identified:			
Butane	ug/l	33	20 ✓
Cyclopentane	ug/l	20	20 ✓
2-Methyl-Butane	ug/l	63	20 ✓
Cyclohexane	ug/l	29	20 ✓
2-Ethyl-3-Methyl-1-Butene	ug/l	37	20 ✓

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