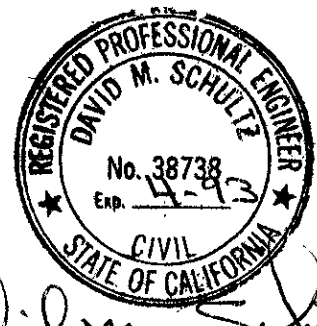
aqua science engineers inc.

November 6, 1992

PROJECT REPORT
for
PHASE II SOIL AND GROUNDWATER ASSESSMENT, NO. 2580
at
The Goodman Property
2501 Santa Clara Avenue
Alameda, California 94501

Prepared for:
Ms. Helen Goodman
3239 Thompson Avenue
Alameda, California 94501

Prepared by:
AQUA SCIENCE ENGINEERS, INC.
2411 Old Crow Canyon Road, #4
San Ramon, CA 94583



EXECUTIVE SUMMARY

A limited groundwater and subsurface site investigation was conducted at The Goodman Property, 2501 Santa Clara Avenue, Alameda, California as follow up to underground storage tank removals conducted in August 1992 by Aqua Science Engineers, Inc. (ASE). The site assessment activities were initiated by the property owner in accordance with the Alameda County Health Care Services Agency (ACHCSA) requirements (see Appendix A for a copy of the "Direction Letter"). The purpose of this site assessment was to: (1) further define the limits of elevated concentrations of petroleum hydrocarbon and waste-oil contamination which was found in the soil upon excavation of the former underground storage tanks, and (2) to assess the potential for groundwater contamination caused by the leaking tanks or associated product lines. Prior to commencement of field activities, the work plan was approved by the ACHCSA, and well permits were obtained from the Alameda County Flood Control and Water Conservation District, Zone 7 (see Appendix E for copies of the permit).

The project included the installation of three (3) groundwater monitoring wells and one (1) soil boring (see Figure 2, Site Plan). Soil samples were collected at five foot intervals until saturated material was encountered. Groundwater samples were collected once well installation and well development activities were concluded. Both the soil and groundwater samples were tested at a State of California Certified Laboratory for all or a combination of the following constituents:

Total Petroleum Hydrocarbons as Gasoline (TPH-G) (EPA 5030/8015)
Total Petroleum Hydrocarbons as Diesel (TPH-D) (EPA 3510/8015)
BTEX (EPA 8020)
Purgeable Halocarbons (EPA 8010)
Oil & Grease (EPA 5520)

The above-referenced analytical tests resulted in detectable levels of constituents in both the soil and groundwater samples submitted. Soil samples submitted for analytical testing for the above-referenced constituents resulted primarily in minor to moderate levels of TPH-G, and BTEX contamination in MW-2 and MW-3. Soil samples from the soil boring SB-1 also resulted in moderate levels of TPH-G, and BTEX contamination. Monitoring well MW-1 showed no detectable levels of constituents in the groundwater; however, minor levels of oil and grease were detected in the soil. Groundwater has been impacted at the site, but the levels of contamination are fairly low. Soil contamination still exists on site in the areas near the former gasoline underground tanks.

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1.0 INTRODUCTION

The following is a report on the further soil investigation and initial groundwater assessment conducted at the Goodman Property, 2501 Santa Clara Avenue, Alameda, California. The site investigation/assessment was initiated by Ms. Helen Goodman, the current property owner, in accordance with the Alameda County Health Care Services Agency (ACHCSA) requirements (see the "Direction Letter" dated October 6, 1992 enclosed in Appendix A). This report is intended as a supplement to the "Tank Pull" report performed by Aqua Science Engineers, Inc. (ASE) dated September 15, 1992. The afore-mentioned report details the removal of two (2) 5,000 gallon, underground, steel, gasoline, storage tanks, one (1) 6,000 gallon, underground, steel, gasoline storage tank, and one (1) 250 gallon, underground, steel, waste-oil storage tank and subsequent excavation of petroleum-contamination impacted soil. The purpose of this investigation was to define the direction and gradient of groundwater flow, and to investigate the possible existence and extent of soil and groundwater contamination resulting from the leakage of the underground storage tanks.

2.0 SITE BACKGROUND

2.1 Physical Location Surface Condition

The subject site is located on the east side of Santa Clara Avenue at Everett Street. The site is approximately 1 mile west of interstate 880 and approximately 1 mile east of the San Francisco Bay, within the city limits of Alameda, CA. The site currently contains a building and canopy for a former gasoline station/tire repair shop. The site has been abandoned for several years. The site is primarily covered with asphalt except for the former pump islands and building foundation which are concrete. The topography of the immediate area is generally even and located at approximately 25 feet above mean sea level (AMSL). (See Figure 1: Site Location Map).

2.2 General Geology Hydrogeology

The site rests on unconsolidated sediments primarily composed of sand with some silt (SM). The eastern shoreline of the San Francisco Bay is located approximately one mile west of the site. Shallow groundwater in the area is located approximately 10 feet below grade at the site, and is assumed to be manipulated by tidal fluctuations.

2.3 Review of Preliminary Soil Assessment

In August of 1992 when the four (4) underground storage tanks (UST) were removed, soil samples were collected from below each of the tanks and from sidewalls of the excavation when appropriate. Chemical analytical testing of the soil samples indicated petroleum hydrocarbon contamination in the immediate vicinity of the former UST's. Detectable levels of Total Petroleum Hydrocarbons (TPH) as Gasoline and the fractions BTEX were identified regarding the former gasoline UST's. Detectable levels of TPH as Diesel and Oil & Grease were identified regarding the former waste-oil UST. Overexcavation activities were conducted on the former waste-oil UST excavation. Sampling and analysis after overexcavation activities resulted in Non-Detectable (N.D.) levels of TPH as Gas, Diesel, BTEX, and Oil & Grease.

3.0 SCOPE OF WORK

What follows is the report covering the methods and findings regarding the initial groundwater assessment and additional soil investigation as outlined in the October 1, 1992 workplan.

The scope of work performed for the initial groundwater investigation and further limited soil assessment, included the following tasks:

- Installation of three 25 foot depth groundwater monitoring wells and one hand-augered soil boring.
- Collection of soil samples at five foot intervals during drilling of the wells and within the capillary fringe.
- Surveying of the monitoring wells.
- Collection of groundwater depth measurements from the wells to determine the direction of groundwater flow and gradient at the site.
- Collection of groundwater samples from the wells.
- Chemical analysis of soil and groundwater samples for TPH as Gas and Diesel and the fractions BTEX, Purgeable Halocarbons, and Oil & Grease.

4.0 DRILLING AND GROUNDWATER WELL CONSTRUCTION

A total of three wells were installed at the site on October 20, 1992. The locations of the ground water monitoring wells are indicated on Figure 2, Site Plan. The soil borings for well installation were drilled to 25 feet below ground surface using a Mobil B-61 drill rig equipped with 7 3/4 inch O.D. continuous flight, hollow stem augers. All drilling equipment was steam cleaned before use and between borings. Water saturated soil was first encountered at approximately 10 feet in all borings.

Two-inch diameter schedule-40 PVC well casing with 0.020-inch slots was installed from 25 feet to 5 feet below the surface in each boring. Two-inch diameter schedule-40 PVC blank casing was installed above the slotted casing, to the surface. The well casings were capped on the bottom with a two-inch threaded female plug and on top with a two inch locking security plug. The annular space of the wells was packed with No. 3 Monterey sand from the bottom of the borings to 3.5 feet below the surface. 1.5 feet of bentonite clay was placed above the sand packs. Class "H" Portland Cement was placed above the bentonite seals, to the surface. The well heads were secured with concrete vaulted, water-tight, locking steel street boxes. Well construction details are provided in Appendix B.

The ground water wells were developed on October 21, 1992 using a 2-inch PVC bailer. The wells were initially surged to correct any sand pack bridging which may have occurred, and to remove any "fines" from the sand pack. Approximately 50 gallons of water was bailed from the wells and placed in 55-gallon 17H steel drums for temporary on-site storage.

5.0 SOIL SAMPLE COLLECTION AND CHEMICAL ANALYSIS

Soil samples were collected in groundwater monitoring well MW-1 at 5, and 10 feet. Soil samples from monitoring well MW-2 were collected at 5 and 10 feet. Soil samples were collected from monitoring well MW-3 at 5 and 11 feet. Soil samples were collected from soil boring SB-1 at 9.5 feet. The monitoring well soil samples were collected using a two-inch I.D. California split-spoon sampler holding three pre-cleaned two-inch O.D. by six-inch length sample tubes. The tube nearest the shoe from each sample interval was secured with double thickness aluminum foil, plastic end caps, and tape, then immediately placed in an ice chest containing "blue" ice for cold storage. The next sample tube nearest the shoe was emptied into a zip-loc plastic storage bag and placed in sunlight, to enhance the volatilization of organic carbon from the soil matrix. After approximately 1/2 hour, the sample was screened in the field with a "Gastechtor Super Surveyor" model no. 1314. The Gastechtor is equipped with a combustible gas sensor calibrated with hexane. Needle deflections in ppm were recorded and are included on the soil boring logs, which are provided in Appendix B of this report.

The soil samples were submitted to Priority Environmental Laboratory located in Milpitas, California for definitive chemical analysis. The submitted soil samples were analyzed as follows:

MW-1	TPH as Gasoline (EPA 5030/8015) TPH as Diesel (EPA 3550/8015) BTEX (EPA 8020) Oil and Grease (EPA 5520 D&F) Purgeable Halocarbons (EPA 8010)
MW-2 & MW-3	TPH as Gasoline (EPA 5030/8015) BTEX (EPA 8020)
SB-1	TPH as Gasoline (EPA 5030/8015) BTEX (EPA 8020)

Priority Environmental Laboratory is CSDHS certified for the chemical analyses preformed for this investigation. The chemical analyses provided by Priority Environmental Laboratory regarding soil samples are provided below as Tables 1 & 2. Copies of the laboratory analytical reports and sample chain-of-custody documents are provided in Appendix C.

TABLE 1
Summary of Chemical Analysis of **SOIL** Samples
TPH Gasoline and Diesel, BTEX, and Oil and Grease

Sample I.D.	TPH Gasoline (ppm)	TPH Diesel (ppm)	Benzene (ppb)	Toluene (ppb)	Ethyl Benzene (ppb)	Total Xylenes (ppb)	Oil & Grease (ppm)
MW1-5'	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.	51
MW1-10'	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.
MW2-5'	2500	---	1200	1800	2300	6500	---
MW2-10'	1.2	---	6.8	10	10	39	---
MW3-5'	N.D.	---	N.D.	N.D.	N.D.	N.D.	---
MW3-11'	2.5	---	7.1	6.3	25	45	---
SB1-9.5'	740	---	860	1200	1500	4000	
EPA METHOD	5030/ 8015	3550/ 8015	8020	8020	8020	8020	5520 C&F

ND Non Detectable at analytical method limits
ppm parts per million
ppb parts per billion
--- not analyzed

TABLE 2
Summary of Chemical Analysis of **SOIL** Samples
Purgeable Halocarbons

Sample I.D.	ALL 8010 CONSTITUENTS (ppb)
MW1-5'	N.D.
MW1-10'	N.D.
EPA METHOD	8010

ND Non Detectable at analytical method limits
ppb parts per billion

6.0 GROUND WATER SAMPLE COLLECTION AND ANALYSIS

Ground water measurements and identification of any "free-product" were collected before any water was purged from the wells. No free product was identified, however in MW-2 a petroleum odor was recognized, see Appendix F, Well Sampling Field Logs for sampling criteria. Ground water samples were collected from each of the three groundwater monitoring wells on October 26, 1992, after removal of approximately five well volumes of water and 90% well recharge. The wells were purged using a 2-inch PVC bailer. The well purge water was placed in 55-gallon steel 17H drums, labeled, and left on site for storage. The samples were collected using disposable, sterile, polyethylene, single check valve bailers. The samples were placed in pre-cleaned, sterile, 40 ml. glass VOA and one liter vials, then immediately placed in an ice chest for cold storage. They were later transported to Priority Environmental Laboratory in Milpitas, California using proper Chain-of-Custody procedures, for chemical analysis. The analytical results and chain-of-custody documents are included in Appendix D.

The groundwater samples collected for this project were analyzed as follows:

MW-1	TPH as Gasoline (EPA 5030/8015) TPH as Diesel (EPA 3510/8015) BTEX (EPA 602) Oil and Grease (EPA 5520 C&F) Purgeable Halocarbons (EPA 601) pH (EPA 9045) Conductivity (EPA 120.1)
MW-2 & MW-3	TPH as Gasoline (EPA 5030/8015) BTEX (EPA 8020) pH (EPA 9045) Conductivity (EPA 120.1)

The chemical analyses provided by Priority Environmental Laboratory regarding groundwater samples are provided below as Tables 3, 4, & 5. Copies of the laboratory analytical reports and sample chain-of-custody documents are provided in Appendix D.

TABLE 3
Summary of Chemical Analysis of **WATER** Samples
TPH as Gasoline and Diesel, BTEX, and Oil & Grease

Sample I.D.	TPH Gasoline (ppb)	TPH Diesel (ppb)	Benzene (ppb)	Toluene (ppb)	Ethyl Benzene (ppb)	Total Xylenes (ppb)	Oil & Grease (ppm)
MW-1	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.
MW-2	32000	---	76	100	77	220	---
MW-3	320	---	2.2	1.7	1.3	9.5	---
EPA METHOD	5030/ 8015	3510/ 8015	602	602	602	602	5520 C&F

ND Non Detectable at analytical method limits
ppb parts per billion
--- Not Analyzed

TABLE 4
Summary of Chemical Analysis of **Water** Samples
Purgeable Halocarbons

Sample I.D.	ALL 8010 CONSTITUENTS (ppb)
MW-1	N.D.
EPA METHOD	8010

ND Non Detectable at analytical method limits
ppb parts per billion

TABLE 5
Summary of Chemical Analysis of **Water** Samples
pH and Conductivity

Sample I.D.	pH	Conductivity (uS)
MW-1	6.9	620
MW-2	6.7	660
MW-3	6.7	670
EPA METHOD	9045	120.1

7.0 GEOLOGY AND GROUNDWATER GRADIENT

The native soil types encountered while drilling were primarily composed of sand with slight silt (SM) from below the asphalt base to the bottom of the hole in all boring locations. Water saturated soil was first encountered during drilling at approximately 10 feet in all monitoring wells. A graphical description of the soil types are provided on the well construction logs (see Appendix B).

The elevations of the tops of the well casings were surveyed relative to mean sea level (MSL) on October 26, 1992. The depths to groundwater were measured in each well on the day of the survey using a water level sounder (Solinst). Two measurements were taken in each well to confirm groundwater depth. The depth to water and the top of casing survey data were used to calculate a groundwater flow direction and gradient. A summary of the elevation data is provided below in Table 6.

TABLE 6
Summary of Groundwater Well Survey Data

Well Number	Depth to Water	Top of Casing Elevation	Groundwater Elevation
MW-1	8.40 ft.	24.46 ft. AMSL	16.06 ft. AMSL
MW-2	8.60 ft.	24.42 ft. AMSL	15.82 ft. AMSL
MW-3	9.65 ft.	25.00 ft. AMSL	15.35 ft. AMSL

A three-point problem was solved for well combinations MW-1, MW-2 and MW-3. A graphic representation of the three-point problem indicating groundwater flow direction and gradient is presented in the Groundwater Gradient Map, Figure 3. The current direction of groundwater flow is east at a gradient of 0.008 ft/ft.

8.0 CONCLUSIONS

Based on the results of the chemical analyses, and supplemental investigative work, it is the opinion of Aqua Science Engineers, Inc. that the following conditions are present at the subject site:

1) TPH as Gasoline has impacted the groundwater at the subject site; however, the levels of contamination detected in the groundwater are fairly low (32 ppm in MW-2, and 0.32 ppm in MW-3).

Not Low!

2) Soils testing relative to MW-2 and MW-3 did result in detectable levels of TPH as Gasoline, MW-2 having the highest concentrations (2500 ppm at 5'). The source of this shallow soil contamination (MW-2 at 5') could quite possibly be from previous leaking product lines extending from the tanks to the pump islands. Or perhaps, since the tanks were not retrofitted with overspill protection, the contamination could be caused by spills/overfills when the underground tanks were being filled many years ago.

3) Groundwater analysis results relative to MW-1 show no significant levels of contamination by either petroleum hydrocarbons or oil and grease. Soils testing at the 5 foot depth did result in detectable levels of oil and grease; however, the level was fairly low (51 ppm).

4) The soil boring SB-1 was sampled at a depth of 9.5'. Analytical testing results indicated detectable levels of TPH as Gasoline (740 ppm). This is probably the result of leak from either the pump island piping or a hole found in the 5,000 gallon tank at the west end of the excavation.

5) Groundwater on site has not been significantly impacted due to the leaking of former tanks and/or associated piping. Soil contamination is still present in several localized areas (under pump islands and near MW-2).

9.0 RECOMMENDATIONS

Aqua Science Engineers recommends the monitoring wells be sampled and analyzed on a quarterly basis for a period of one (1) year. After the first year, a review of the quarterly reports will dictate further groundwater action, if necessary. Groundwater samples should be analyzed for TPH as Gasoline and Diesel, BTEX, Oil & Grease, and Purgeable Halocarbons where appropriate.

As for the petroleum impacted soils on site, Aqua Science engineers recommends overexcavation of the suspect areas. Samples should be taken once the assumed extent of contamination is removed. This task will require the demolition of the on-site canopy and the removal of the existing pump islands. Soil samples should be sampled for TPH as Gasoline, and the fractions BTEX.

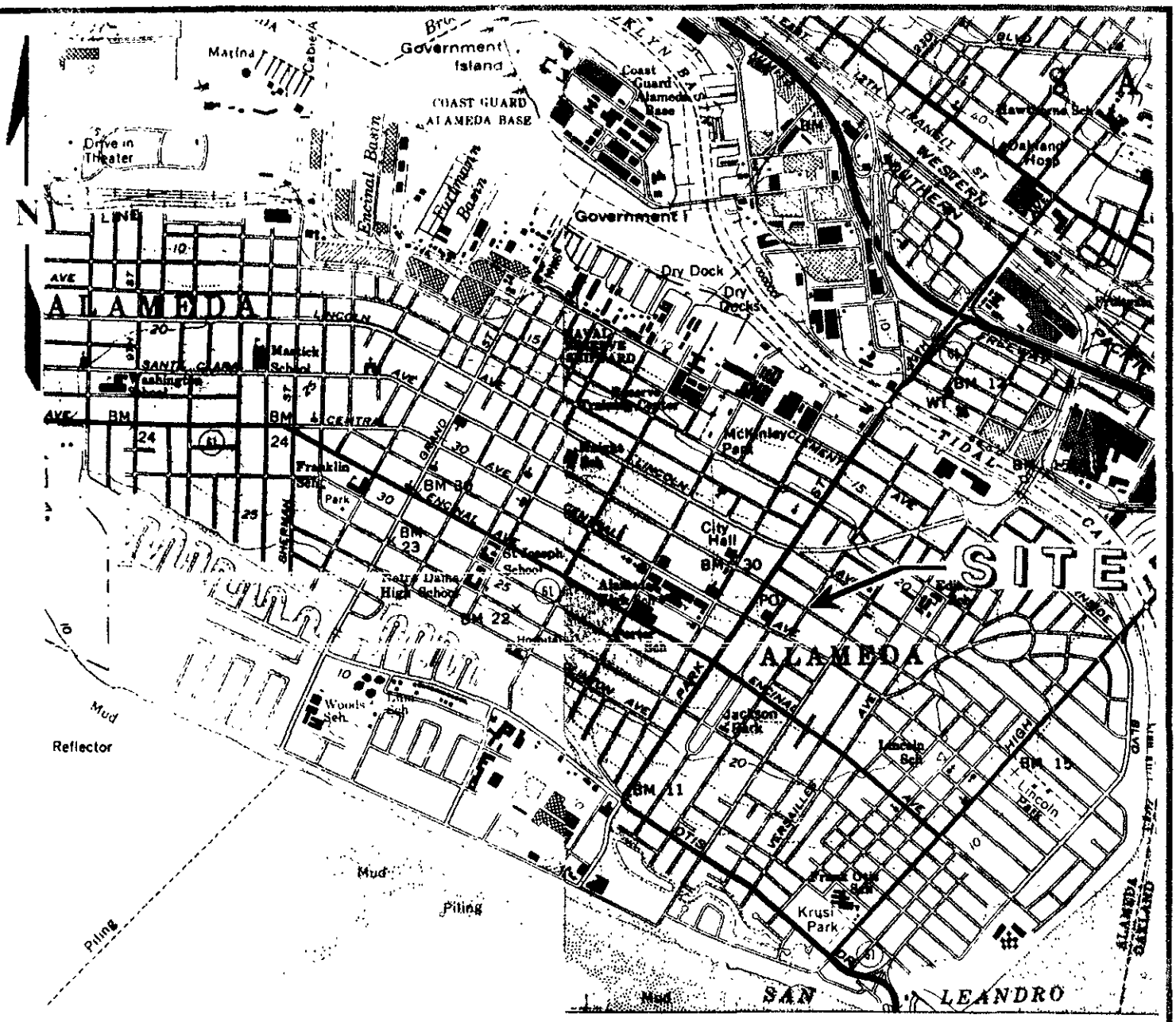
10.0 REPORT LIMITATIONS

The results of this investigation represent conditions at the time and specific location at which soil and groundwater samples were collected, and for the specific parameters analyzed for by the laboratory. It does not fully characterize the site for contamination resulting from sources other than the underground storage tanks at the site, or for parameters not analyzed for by the laboratory. All of the laboratory work cited in this report was prepared under the direction of independent CSDHS certified laboratory. The independent laboratory is solely responsible for the contents and conclusions of the chemical analysis data.

Respectfully submitted,

AQUA SCIENCE ENGINEERS, INC.

David Allen
Project Manager

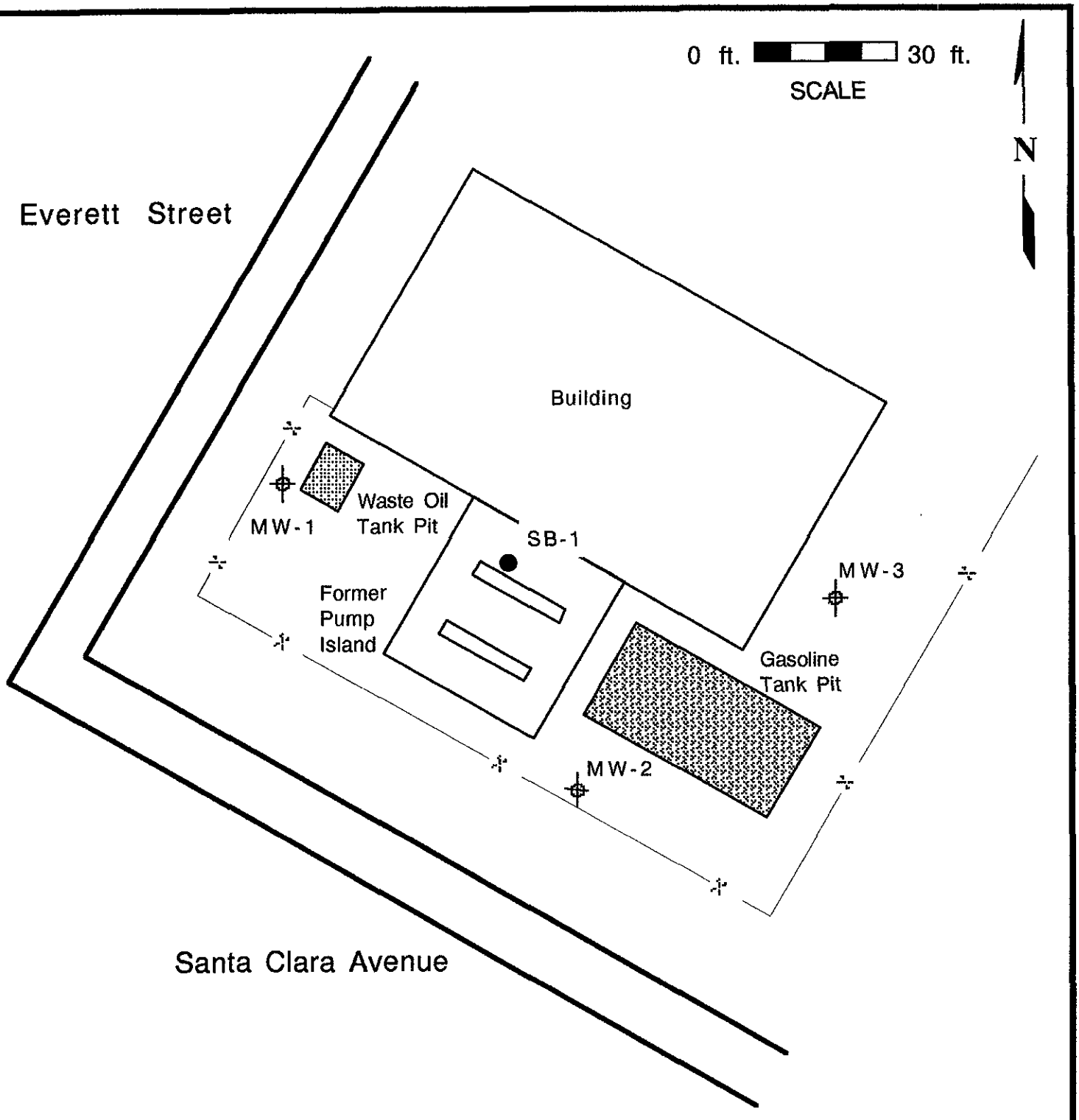


SITE LOCATION MAP

Goodman Property
2501 Santa Clara Avenue
Alameda, California

BASE Oakland East and Oakland West 7 5 minute quadrangle topographic map, dated 1980, scale 1 24,000

Aqua Science Engineers | Figure 1



LEGEND

MW-1 — Monitoring Well

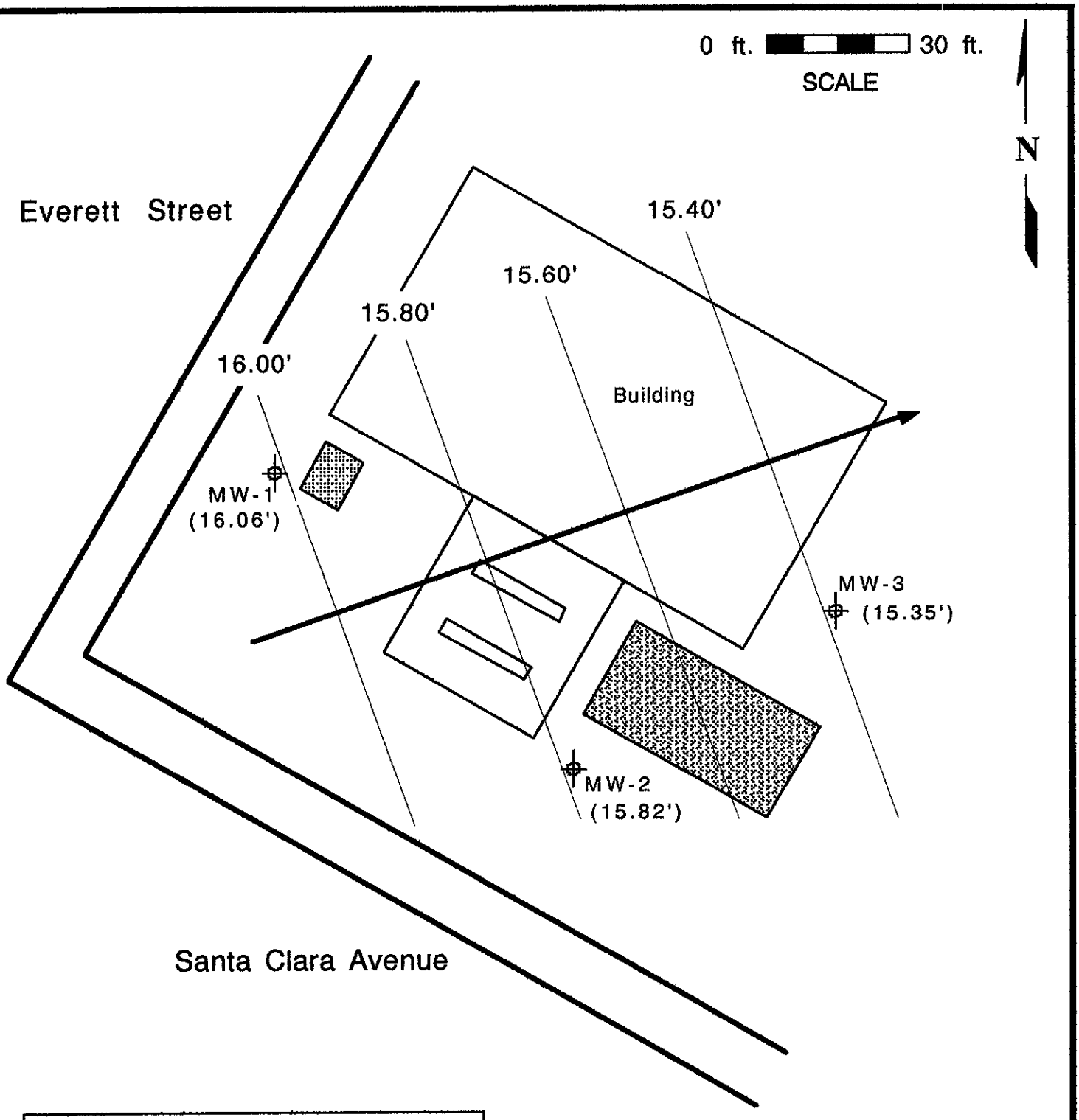
SB-1 — Soil Boring

—X—X— Fence

SITE PLAN

Goodman Property
2501 Santa Clara Avenue
Alameda, California

Aqua Science Engineers | Figure 2



LEGEND

MW-1
(16.06')
Monitoring Well with groundwater depth in feet above mean sea level

Groundwater Gradient direction

GROUNDWATER GRADIENT MAP
10/26/92

Goodman Property
2501 Santa Clara Avenue
Alameda, California

Aqua Science Engineers | Figure 3

APPENDIX A

Alameda County Health Care Services Agency
"Direction Letter"

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

RAFAT A. SHAHID, ASST. AGENCY DIRECTOR

DEPARTMENT OF ENVIRONMENTAL HEALTH
State Water Resources Control Board
Division of Clean Water Programs
UST Local Oversight Program
80 Swan Way, Rm 200
Oakland, CA 94621
(510) 271-4530

October 6, 1992

Helen Goodman
Goodman Property
3239 Thompson Ave.
Alameda, CA 94501

STID 2063

RE: The site located at 2501 Santa Clara Avenue, Alameda, California

Dear Ms. Goodman,

This office has received and reviewed the work plan, dated October 1, 1992, for the above site. The work plan is acceptable to this office with the following changes/additions:

1) In addition to the analysis for Oil and Grease (EPA Method 5520 E & F) and purgeable halocarbons (EPA Method 8010), the ground water samples collected from MW-1, the monitoring well closest to the former waste-oil tank, must be analyzed for gasoline, diesel, and BTEX using acceptable methods, such as EPA Methods 8015 and 8020. EPA Method 418.1 is not acceptable because it does not distinguish which hydrocarbons are identified;

2) In addition to soil samples being collected at depth intervals of 5 feet and at the soil/ground water interface, soil samples should also be collected from changes in lithology. A minimum of one soil sample is required to be analyzed from each boring; and

3) Monitoring wells need to be screened adequately above and below the water table in order to account for seasonal fluctuations of the ground water.

Additionally, during the removal of the gasoline underground storage tanks, up to 7,200 ppm of Total Petroleum Hydrocarbons as gasoline was identified from the north and south walls of the excavation. You are required to determine the extent of soil contamination at the site, and eventually remediate this soil.

If you have any questions or comments, please contact me at (510) 271-4530.

Sincerely,

Juliet Shin
Hazardous Materials Specialist

cc: Richard Hiett, RWQCB

Robert La Grone, Alameda Fire Dept.

David Allen
Aqua Science Engineers, Inc.
P.O. Box 535
San Ramon, CA 94583

Edgar Howell-File(JS)

APPENDIX B

Soil Boring Logs and Well Logs

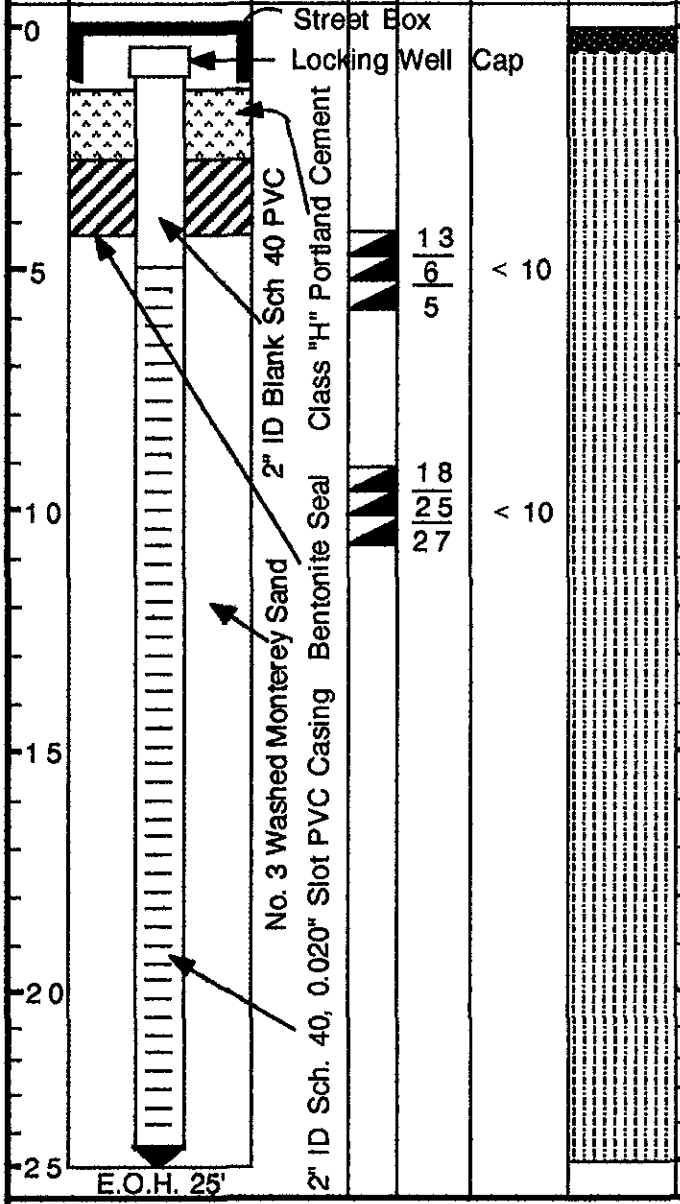
SOIL BORING LOG AND MONITORING WELL CONSTRUCTION DETAILS

WELL NO. MW1

Project Name: Goodman	Project Location: 2501 Santa Clara Ave., Alameda	Page 1 of 1
Driller: WEST HAZMAT	Type of Rig: Mobil B-61	Type and Size of Auger: 7-3/4 O.D. Hollow / 3-1/4 I.D. Stem
Logged By: DS	Date Drilled: 10/20/92	Checked By: David M. Schultz, P.E.

WATER AND WELL DATA

Depth of Water First Encountered: ≈ 10'	Total Depth of Well Completed: 25.0'
Static Depth of Water in Well: 8.4' Below T.O.C.	Well Screen Type and Diameter: 2" Diameter Schedule 40 PVC
Total Depth of Boring: 25'	Well Screen Slot Size: 0.020"
	Type and Size of Soil Sampler: 2" I.D., Calif. Split-Spoon



DESCRIPTION OF LITHOLOGY

standard classification, texture, relative moisture, density, stiffness, odor-staining, USCS designation.

And	With	Some	Trace
(40-50%)	(40-25%)	(25-10%)	(10-0%)

0 — Approximately 5" of Asphalt

From 1/2 to 5 feet medium brown Sand with some Silt (SM), dry, no odor.

Static Water Level = 8.4'

10 — Medium brown Sand with some Silt (SM), moist, no odor.

15 — Medium brown Sand with some Silt (SM), moist, no odor.

20 — SAME AS ABOVE

25

AQUA SCIENCE ENGINEERS, INC.

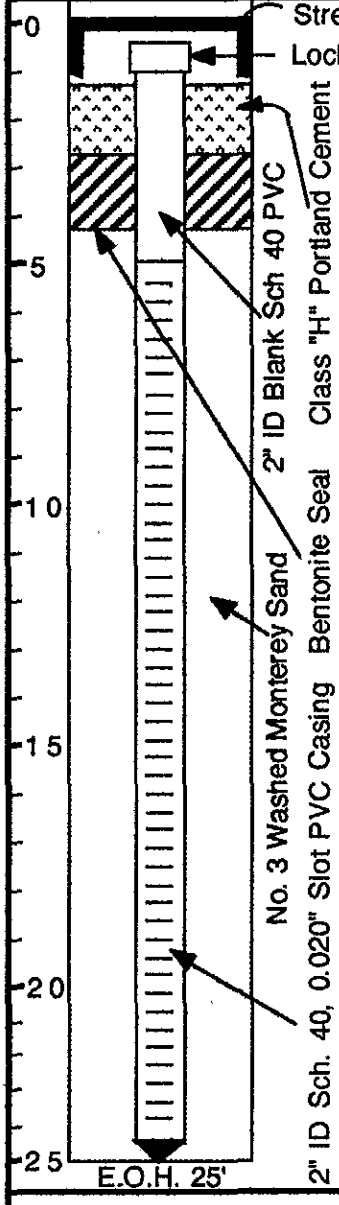
SOIL BORING LOG AND MONITORING WELL CONSTRUCTION DETAILS

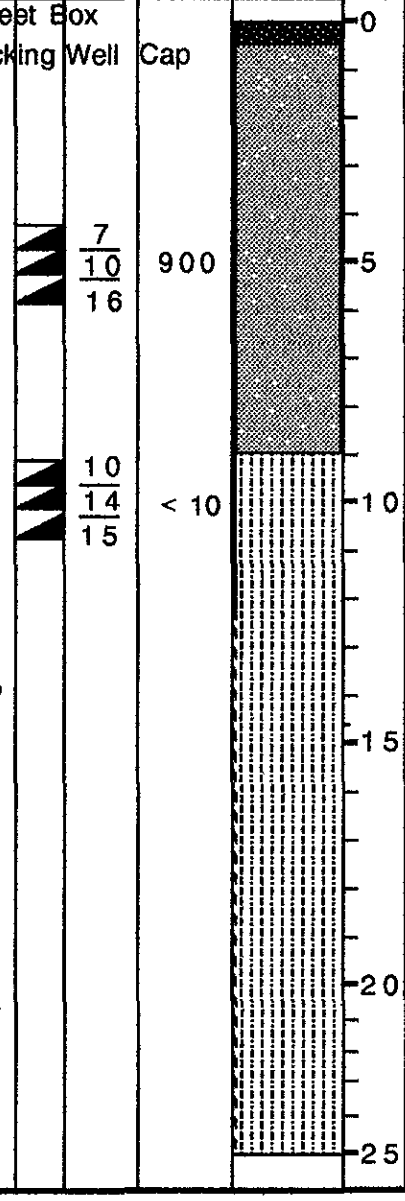
WELL NO. MW2

Project Name: Goodman	Project Location: 2501 Santa Clara Ave., Alameda	Page 1 of 1
Driller: WEST HAZMAT	Type of Rig: Mobil B-61	Type and Size of Auger: 7-3/4 O.D. Hollow 3-1/4 I.D. Stem
Logged By: DS	Date Drilled: 10/20/92	Checked By: David M. Schultz, P.E.

WATER AND WELL DATA

Depth of Water First Encountered: ≈ 10'	Total Depth of Well Completed: 25.0'
Static Depth of Water in Well: 8.6' Below T.O.C.	Well Screen Type and Diameter: 2" Diameter Schedule 40 PVC
Total Depth of Boring: 25'	Well Screen Slot Size: 0.020"
	Type and Size of Soil Sampler: 2" I.D., Calif. Split-Spoon





DESCRIPTION OF LITHOLOGY

standard classification, texture, relative moisture, density, stiffness, odor-staining, USCS designation.

And (40-50%) With (40-25%) Some (25-10%) Trace (10-0%)

Approximately 5" of Asphalt

From 1/2 to 2 feet dark brown Sand (SP) dry, moderate petroleum odor.

From 2 to 9 feet gray-brown Sand (SP) dry, moderate petroleum odor.

Static Water Level = 8.6'

Gray-brown Sand with trace Silt (SM), small brown patches, moist, trace petroleum odor.

Gray-brown Sand with trace Silt (SM) moist to wet, trace petroleum odor.

SAME AS ABOVE

ASE Form 20A

AQUA SCIENCE ENGINEERS, INC.

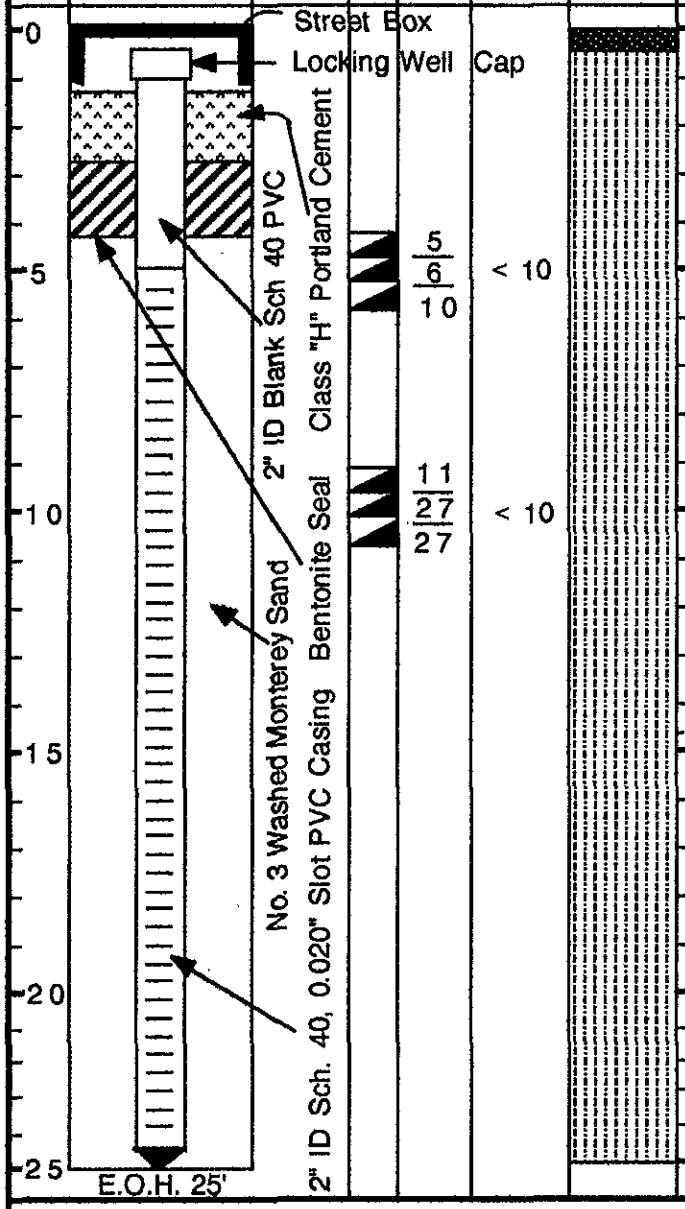
SOIL BORING LOG AND MONITORING WELL CONSTRUCTION DETAILS

WELL NO. MW3

Project Name: Goodman	Project Location: 2501 Santa Clara Ave., Alameda	Page 1 of 1
Driller: WEST HAZMAT	Type of Rig: Mobil B-61	Type and Size of Auger: 7-3/4 O.D. Hollow 3-1/4 I.D. Stem
Logged By: DS	Date Drilled: 10/20/92	Checked By: David M. Schultz, P.E.

WATER AND WELL DATA

Depth of Water First Encountered: ≈ 10'	Total Depth of Well Completed: 25.0'
Static Depth of Water in Well: 9.65' Below T.O.C.	Well Screen Type and Diameter: 2" Diameter Schedule 40 PVC
Total Depth of Boring: 25'	Well Screen Slot Size: 0.020"
	Type and Size of Soil Sampler: 2" I.D., Calif. Split-Spoon



DESCRIPTION OF LITHOLOGY

standard classification, texture, relative moisture, density, stiffness, odor-staining, USCS designation.

And (40-50%) With (40-25%) Some (25-10%) Trace (10-0%)

Approximately 5" of Asphalt

From 1/2 to 2 feet dark brown Sand with some Silt (SM), slightly moist, no odor.

Medium brown, slightly moist Sand with some Silt (SM), no odor

Static Water Level = 9.65'

Light gray Sand with some Silt (SM) moist to wet, slight petroleum odor.

SAME AS ABOVE

AQUA SCIENCE ENGINEERS, INC.

SOIL BORING LOG AND MONITORING WELL CONSTRUCTION DETAILS		BORING NO. SB1
Project Name: Goodman	Project Location: 2501 Santa Clara Ave., Alameda	Page 1 of 1
Driller: DA	Type of Rig: Hand Auger	Type and Size of Auger:
Logged By: DS	Date Drilled: 10/20/92	Checked By: David M. Schultz, P.E.

WATER AND WELL DATA	
Depth of Water First Encountered: N/A	Total Depth of Well Completed: N/A
Static Depth of Water in Well: N/A	Well Screen Type and Diameter: N/A
Total Depth of Boring: 10'	Well Screen Slot Size: N/A
	Type and Size of Soil Sampler: N/A

Depth in Feet	WELL\BORING DETAIL	Description	SOIL/ROCK SAMPLE DATA: Interval	Blow Ct.	Field VOC (ppmv)	Graphic Log	Depth in Feet	DESCRIPTION OF LITHOLOGY: standard classification, texture, relative moisture, density, stiffness, odor-staining, USCS designation. And (40-50%) With (40-25%) Some (25-10%) Trace (10-0%)
0							0	Medium brown, slightly moist Sand with some Silt (SM), no odor.
5							5	
10							10	Light gray Sand with some Silt (SM) moist, moderate petroleum odor. E.O.H. 10'
15							15	
20							20	
25							25	

APPENDIX C

California EPA Certified Laboratory
Report of Soil Samples

PRIORITY ENVIRONMENTAL LABS

October 23, 1992 PEL # 9210041

AQUA SCIENCE ENGINEERS, INC.

Attn: David Allen
Re: Seven soil samples for Gasoline/BTEX, Diesel, and Oil & Grease analyses.

Project name: Goodman Property
Project location: 2501 Santa Clara Ave., -Alameda
Project number: 2580

Date sampled: Oct 20, 1992 Date submitted: Oct 21, 1992
Date extracted: Oct 21-22, 1992 Date analyzed: Oct 21-22, 1992

RESULTS:

SAMPLE I.D.	Gasoline (mg/Kg)	Diesel (mg/Kg)	Benzene (ug/Kg)	Toluene (ug/Kg)	Ethyl Benzene (ug/Kg)	Total Xylenes (ug/Kg)	Oil & Grease (mg/Kg)
MW-1-5'	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.	51
MW-1-10'	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.
MW-2-5'	2500	---	1200	1800	2300	6500	---
MW-2-10'	1.2	---	6.8	10	10	39	---
MW-3-5'	N.D.	---	N.D.	N.D.	N.D.	N.D.	N.D.
MW-3-11'	2.5	---	7.1	6.3	25	45	---
SB 1-9.5'	740	---	860	1200	1500	4000	---
Blank	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.
Spiked Recovery	92.0%	97.1%	94.5%	92.3%	98.9%	92.5%	---
Duplicate Spiked Recovery	83.4%	86.3%	100.1%	98.8%	103.2%	99.6%	---
Detection limit	1.0	1.0	5.0	5.0	5.0	5.0	10
Method of Analysis	5030 / 8015	3550 / 8015	8020	8020	8020	8020	5520 D & F

David Duong
Laboratory Director

1764 Houret Court Milpitas, CA. 95035 Tel: 408-946-9636 Fax: 408-946-9663

PRIORITY ENVIRONMENTAL LABS

October 23, 1992 PEL # 9210041

AQUA SCIENCE ENGINEERS, INC. Attn: David Allen
Project name: Goodman Property Project location:2501 Santa Clara Ave.Alameda
Project number: 2580

Sample I.D.: MW 1-5'

Date Sampled: Oct 20, 1992 Date Submitted: Oct 21, 1992
Date Analyzed: Oct 21-22, 1992

Method of Analysis: EPA 8010 Detection limit: 5.0 ug/Kg

COMPOUND NAME	CONCENTRATION (ug/Kg)	SPIKE RECOVERY (%)
Chloromethane	N.D.	-----
Vinyl Chloride	N.D.	91.4
Bromomethane	N.D.	-----
Chloroethane	N.D.	-----
Trichlorofluoromethane	N.D.	-----
1,1-Dichloroethene	N.D.	-----
Methylene Chloride	N.D.	87.6
1,2-Dichloroethene (TOTAL)	N.D.	-----
1,1-Dichloroethane	N.D.	-----
Chloroform	N.D.	90.2
1,1,1-Trichloroethane	N.D.	-----
Carbon Tetrachloride	N.D.	-----
1,2-Dichloroethane	N.D.	-----
Trichloroethene	N.D.	103.8
1,2-Dichloropropane	N.D.	-----
Bromodichloromethane	N.D.	-----
2-Chloroethylvinylether	N.D.	-----
Trans-1,3-Dichloropropene	N.D.	-----
Cis-1,3-Dichloropropene	N.D.	-----
1,1,2-Trichloroethane	N.D.	-----
Tetrachloroethene	N.D.	88.5
Dibromochloromethane	N.D.	-----
Chlorobenzene	N.D.	-----
Bromoform	N.D.	-----
1,1,2,2-Tetrachloroethane	N.D.	-----
1,3-Dichlorobenzene	N.D.	-----
1,4-Dichlorobenzene	N.D.	-----
1,2-Dichlorobenzene	N.D.	-----

David Duong
Laboratory Director

1764 Houret Court Milpitas, CA. 95035 Tel: 408-946-9636 Fax: 408-946-9663

PRIORITY ENVIRONMENTAL LABS

Environmental Analytical Laboratory

October 23, 1992 PEL # 9210041

AQUA SCIENCE ENGINEERS, INC. Attn: David Allen
Project name: Goodman Property Project location:2501 Santa Clara Ave.Alameda
Project number: 2580

Sample I.D.: MW 1-10'

Date Sampled: Oct 20, 1992 Date Submitted: Oct 21, 1992
Date Analyzed: Oct 21-22, 1992

Method of Analysis: EPA 8010 Detection limit: 5.0 ug/Kg

COMPOUND NAME	CONCENTRATION (ug/Kg)	SPIKE RECOVERY (%)
Chloromethane	N.D.	-----
Vinyl Chloride	N.D.	91.4
Bromomethane	N.D.	-----
Chloroethane	N.D.	-----
Trichlorofluoromethane	N.D.	-----
1,1-Dichloroethene	N.D.	-----
Methylene Chloride	N.D.	87.6
1,2-Dichloroethene (TOTAL)	N.D.	-----
1,1-Dichloroethane	N.D.	-----
Chloroform	N.D.	90.2
1,1,1-Trichloroethane	N.D.	-----
Carbon Tetrachloride	N.D.	-----
1,2-Dichloroethane	N.D.	-----
Trichloroethene	N.D.	103.8
1,2-Dichloropropane	N.D.	-----
Bromodichloromethane	N.D.	-----
2-Chloroethylvinylether	N.D.	-----
Trans-1,3-Dichloropropene	N.D.	-----
Cis-1,3-Dichloropropene	N.D.	-----
1,1,2-Trichloroethane	N.D.	-----
Tetrachloroethene	N.D.	88.5
Dibromochloromethane	N.D.	-----
Chlorobenzene	N.D.	-----
Bromoform	N.D.	-----
1,1,2,2-Tetrachloroethane	N.D.	-----
1,3-Dichlorobenzene	N.D.	-----
1,4-Dichlorobenzene	N.D.	-----
1,2-Dichlorobenzene	N.D.	-----

David Duong
Laboratory Director

1764 Houret Court Milpitas, CA. 95035 Tel: 408-946-9636 Fax: 408-946-9663

P[redacted] # [redacted]210

Aqua Science Engineers, Inc.
2411 Old Crow Canyon Road, #4,
San Ramon, CA 94583
(510) 820-9391 - FAX (510) 837-4853

Chain of

INV # 23141

DATE 10/20/92 PAGE 1 OF 1

SAMPLERS (SIGNATURE) David Allen (PHONE NO.) 820-9391

PROJECT NAME GOODMAN PROPERTY NO. 258C

ADDRESS 2561 SANTA CLARA AVE, ALAMEDA

ANALYSIS REQUEST

SPECIAL INSTRUCTIONS:

SAMPLE ID.	DATE	TIME	MATRIX	NO. OF SAMPLES	TPH- GASOLINE (EPA 5030/8015)	TPH- GASOLINE/BTEX (EPA 5030/8015-8020)	TPH- DIESEL (EPA 3510/8015)	PURGABLE AROMATICS (EPA 602/8020)	PURGABLE HALOCARBONS (EPA 601/8010)	VOLATILE ORGANICS (EPA 624/8240)	BASE/NUETRALS, ACIDS (EPA 625/8270)	OIL & GREASE (EPA 5520 E&F or B&F)	LUFT METALS (5) (EPA 6010+7000)	TITLE 22 (CAM 17) (EPA 6010+7000)	TCLP (EPA 1311/1310)	STLC- CAM WET (EPA 1311/1310)	REACTIVITY CORROSIVITY IGNITABILITY
MW1-5'	10/20	11a.m	SOIL	1		X	X		X			X					
MW1-10'	10/20	11a.m	SOIL	1		X	X		X			X					
MW2-5'	10/20	12noon	SOIL	1		X											
MW2-10'	10/20	12noon	SOIL	1		X											
MW3-5'	10/20	1pm	SOIL	1		X											
MW3-11'	10/20	1pm	SOIL	1		X											
SB1-9.5'	10/20	2pm	SOIL	1		X											

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY LABORATORY:	COMMENTS:
David Allen 8:00pm			8:00AM	REGULAR TURNAROUND TIMES
(signature) (time)	(signature) (time)	(signature) (time)	(signature) (time)	
DAVID ALLEN 10/21			DAVID DUONG 10/21/92	
(printed name) (date)	(printed name) (date)	(printed name) (date)	(printed name) (date)	
Company- ASE, INC.	Company-	Company-	Company- PEL	

APPENDIX D

California EPA Certified Laboratory
Report of Groundwater Samples

PRIORITY ENVIRONMENTAL LABS

Environmental Analytical Laboratory

October 27, 1992 PEL # 9210056

AQUA SCIENCE ENGINEERS, INC.

Attn: Steve DeHope
Re: Three water samples for Gasoline/BTEX, Diesel, and Oil & Grease analyses.

Project name: Goodman
Project location: 2001 Santa Clara Ave.

Date sampled: Oct 26 1992 Date submitted: Oct 27, 1992
Date extracted: Oct 27, 1992 Date analyzed: Oct 27, 1992

RESULTS:

SAMPLE I.D.	Gasoline (ug/L)	Diesel (ug/L)	Benzene (ug/L)	Toluene (ug/L)	Ethyl Benzene (ug/L)	Total Xylenes (ug/L)	Oil & Grease (mg/L)
MW-1	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.
MW-2	32000	---	76	100	77	220	---
MW-3	320	---	2.2	1.7	1.3	9.5	---
Blank	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.
Spiked Recovery	101.6%	93.4%	97.6%	102.4%	98.2%	103.5%	---
Duplicate Spiked Recovery	92.0%	88.2%	86.0%	80.3%	89.0%	93.5%	---
Detection limit	50	50	0.5	0.5	0.5	0.5	0.5
Method of Analysis	5030 / 8015	3510 / 8015	602	602	602	602	5520 C & F

David Duong
Laboratory Director

RECEIVED
OCT 3 0 1992
AQUA SCIENCE ENG.

1764 Houret Court Milpitas, CA. 95035 Tel: 408-946-9636 Fax: 408-946-9663

PRIORITY ENVIRONMENTAL LABS

Environmental Analytical Laboratory

October 27, 1992

PEL #: 9210056

AQUA SCIENCE ENGINEERS, INC.
Project name: Goodman
Sample I.D.: MW-1

Attn: Steve DeHope
Project location: 2001 Santa Clara Ave

Date Sampled: Oct 26, 1992
Date Analyzed: Oct 27, 1992

Date Submitted: Oct 27, 1992

Method of Analysis: EPA 601

Detection limit: 0.5 ug/L

COMPOUND NAME	CONCENTRATION (ug/L)	SPIKE RECOVERY (%)
Chloromethane	N.D.	-----
Vinyl Chloride	N.D.	82.1
Bromomethane	N.D.	-----
Chloroethane	N.D.	-----
Trichlorofluoromethane	N.D.	-----
1,1-Dichloroethene	N.D.	-----
Methylene Chloride	N.D.	87.8
1,2-Dichloroethene (TOTAL)	N.D.	-----
1,1-Dichloroethane	N.D.	-----
Chloroform	N.D.	95.2
1,1,1-Trichloroethane	N.D.	-----
Carbon Tetrachloride	N.D.	-----
1,2-Dichloroethane	N.D.	-----
Trichloroethene	N.D.	90.3
1,2-Dichloropropane	N.D.	-----
Bromodichloromethane	N.D.	-----
2-Chloroethylvinylether	N.D.	-----
Trans-1,3-Dichloropropene	N.D.	-----
Cis-1,3-Dichloropropene	N.D.	-----
1,1,2-Trichloroethane	N.D.	-----
Tetrachloroethene	N.D.	94.8
Dibromochloromethane	N.D.	-----
Chlorobenzene	N.D.	-----
Bromoform	N.D.	-----
1,1,2,2-Tetrachloroethane	N.D.	-----
1,3-Dichlorobenzene	N.D.	-----
1,4-Dichlorobenzene	N.D.	-----
1,2-Dichlorobenzene	N.D.	-----

David Duong
Laboratory Director

1764 Houret Court Milpitas, CA. 95035 Tel: 408-946-9636 Fax: 408-946-9663

PRIORITY ENVIRONMENTAL LABS

Environmental Analytical Laboratory

October 28, 1992 PEL # 9210056

AQUA SCIENCE ENGINEERS, INC.

Attn: Steve DeHope
Re: Three water samples for pH and Conductivity analyses.

Project name: Goodman
Project location: 2001 Santa Clara Ave.

Date sampled: Oct 26 1992
Date extracted: Oct 28, 1992
Date submitted: Oct 27, 1992
Date analyzed: Oct 28, 1992

RESULTS:

SAMPLE I.D.	pH	Conductivity (uS)
MW-1	6.9	620
MW-2	6.7	660
MW-3	6.7	670
Blank	7.0	0.0
Detection limit	0.05	10
Method of Analysis	9045	120.1

David Duong
Laboratory Director

RECEIVED
OCT 30 1992
AQUA SCIENCE ENG.

1764 Houret Court Milpitas, CA. 95035 Tel: 408-946-9636 Fax: 408-946-9663

PEL # 9210056

Chain of

INV # 23157

Aqua Science Engineers, Inc.
2411 Old Crow Canyon Road, #4,
San Ramon, CA 94583
(510) 820-9391 - FAX (510) 837-4853

DATE 10/27 92 PAGE 1 OF 1

SAMPLERS (SIGNATURE) (PHONE NO.) (510) 820-9391

PROJECT NAME Goodman NO.

ADDRESS 201 Santa Clara Ave.

ANALYSIS REQUEST

SPECIAL INSTRUCTIONS:
Standard turnaround

SAMPLE ID.	DATE	TIME	MATRIX	NO. OF SAMPLES	TPH- GASOLINE (EPA 5030/8015)	TPH- GASOLINE/BTEX (EPA 5030/8015-8020)	TPH- DIESEL (EPA 3510/8015)	PURGABLE AROMATICS (EPA 602/8020)	PURGABLE HALOCARBONS (EPA 601/8010)	VOLATILE ORGANICS (EPA 624/8240)	BASE/NUETRALS, ACIDS (EPA 625/8270)	OIL & GREASE (EPA 5520 E&F or B&F)	LUFT METALS (5) (EPA 6010+7000)	TITLE 22 (CAM 17) (EPA 6010+7000)	TCLP (EPA 1311/1310)	STLC- CAM WET (EPA 1311/1310)	REACTIVITY CORROSIVITY IGNITABILITY
MW-1	10-26	3:00	W	6		X	X		X			X					
MW-2	10 26	3:15	W	2		X											
MW-3	10 26	3:30	W	2		X											

RELINQUISHED BY:	RECEIVED BY:	RELINQUISHED BY:	RECEIVED BY LABORATORY:	COMMENTS:
(signature) (time)	(signature) (time)	(signature) (time)	(signature) (time)	
STEVE DeHope 9:30			VICTOR Dodoz 9 30	
(printed name) (date)	(printed name) (date)	(printed name) (date)	(printed name) (date)	
Company A.S.E. 10-27-92	Company-	Company-	Company- PEL 10/27/92	

APPENDIX E

Permits

ZONE 7 WATER AGENCY

5997 PARKSIDE DRIVE PLEASANTON, CALIFORNIA 94588 VOICE (510) 484-2600
FAX (510) 462-3914

DRILLING PERMIT APPLICATION

FOR APPLICANT TO COMPLETE

CATION OF PROJECT 2501 Santa Clara Avenue
Alameda, CA

IENT
me Ms. Helen Goodman
dress 3239 Thompson Ave. Phone
y Alameda Zip 94501

PPLICANT
me Aqua Science Engineers, Inc
2411 Old Crow Canyon Road, #4
dress Phone 820-9391
y San Ramon Zip 94583

PE OF PROJECT
Well Construction Geotechnical Investigation
Cathodic Protection General
Water Supply Contamination X
Monitoring X Well Destruction

PROPOSED WATER SUPPLY WELL USE
Domestic Industrial Other
Municipal Irrigation

DRILLING METHOD:
Mud Rotary Air Rotary Auger X
Cable Other

DRILLER'S LICENSE NO. 487000

WELL PROJECTS
Drill Hole Diameter 8.5 in. Maximum
Casing Diameter 2 in. Depth 30 ft.
Surface Seal Depth 5 ft. Number 3

GEOTECHNICAL PROJECTS
Number of Borings Maximum
Hole Diameter in. Depth ft.

ESTIMATED STARTING DATE 10-19-92
ESTIMATED COMPLETION DATE 10-19-92

I hereby agree to comply with all requirements of this permit and Alameda County Ordinance No. 73-68.

APPLICANT'S SIGNATURE Daniel Ale Date 10/14/92

FOR OFFICE USE

PERMIT NUMBER 92512
LOCATION NUMBER

PERMIT CONDITIONS

Circled Permit Requirements Apply

(A.) GENERAL
1. A permit application should be submitted so as to arrive at the Zone 7 office five days prior to proposed starting date.
2. Submit to Zone 7 within 60 days after completion of permitted work the original Department of Water Resources Water Well Drillers Report or equivalent for well Projects, or drilling logs and location sketch for geotechnical projects.
3. Permit is void if project not begun within 90 days of approval date.

(B.) WATER WELLS, INCLUDING PIEZOMETERS
1. Minimum surface seal thickness is two inches of cement grout placed by tremie.
2. Minimum seal depth is 50 feet for municipal and industrial wells or 20 feet for domestic and irrigation wells unless a lesser depth is specially approved. Minimum seal depth for monitoring wells is the maximum depth practicable or 20 feet.

C. GEOTECHNICAL. Backfill bore hole with compacted cuttings or heavy bentonite and upper two feet with compacted material. In areas of known or suspected contamination, tremied cement grout shall be used in place of compacted cuttings.

D. CATHODIC. Fill hole above anode zone with concrete placed by tremie.

E. WELL DESTRUCTION. See attached.

Approved Wyman Hong Date 14 Oct 92
Wyman Hong

31992

APPENDIX F

Well Sampling Field Logs

aqua science engineers inc.

WELL SAMPLING FIELD LOG

Aqua Science Engineers, Inc. San Ramon, CA 94583

Project Name: Goodman
Project Address: 2501 Santa Clara Avenue
Job # 2580 **Date of sampling:** 10/26/92
Completed by: Dave Allen
Well Number / Designation: MW-1
Top of casing elevation: 24.46'
Total depth of well casing: 25' **Well diameter:** 2"
Depth to water (before sampling): 8.4'
Thickness of floating product if any: 16'
Depth of well casing in water: None
Req'd volume of groundwater to be purged before sampling: 15 Gallons
Approximate volume of groundwater purged: 15 Gallons
Type of seal at grade: Portland
Type of cap on the casing: Expandable, Locking
Is the seal water tight? Yes **Is the cap water tight?** Yes
Number of samples (containers) collected 4-40 ml.,2-1 liters
Did 40 ml VOA vials have headspace: No
Were sample containers chilled after sampling & for delivery ? Yes
Are Chain of Custody documents accompanying the samples: Yes
Sample temperature: 19° C
Sample pH: _____ **Test method:** _____

Physical description of water during initial bailing period:
Turbid grey
Physical description of water sample: Clear

Type of analysis requested:
- TPH as Gasoline
- TPH as Diesel
- BTEX
- Oil & Grease
- Purgeable hydrocarbons

PH Conductivity

Type of bailer/sampling equipment used: 2" PVC Bailer
Disposable, sterile, polydthylene sampling bailer.
Equipment decontamination procedures: TSP & H2O

Disposition of bailed water volume:
Drummed and left on site.

aqua science engineers inc.

WELL SAMPLING FIELD LOG

Aqua Science Engineers, Inc. San Ramon, CA 94583

Project Name: Goodman
Project Address: 2501 Santa Clara Avenue
Job # 2580 Date of sampling: 10/26/92
Completed by: Dave Allen
Well Number / Designation: MW-2
Top of casing elevation: 24.42'
Total depth of well casing: 25' Well diameter: 2"
Depth to water (before sampling): 8.6'
Thickness of floating product if any: None
Depth of well casing in water: 16'
Req'd volume of groundwater to be purged before sampling: 15 Gallons
Approximate volume of groundwater purged: 15 Gallons
Type of seal at grade: Portland
Type of cap on the casing: Expandable, Locking
Is the seal water tight? Yes Is the cap water tight? Yes
Number of samples (containers) collected 2-40 ml.
Did 40 ml VOA vials have headspace: No
Were sample containers chilled after sampling & for delivery ? Yes
Are Chain of Custody documents accompanying the samples: Yes
Sample temperature: 19° C
Sample pH: _____ Test method: _____

Physical description of water during initial bailing period:
Turbid grey
Physical description of water sample: Clear

Type of analysis requested: TPH as Gasoline
BTEX
pH
Conductivity

Type of bailer/sampling equipment used: 2" PVC Bailer
Disposable, sterile, Polythylene sampling bailer
Equipment decontamination procedures: TSP & H2O

Disposition of bailed water volume:
Drummed and left on site.

aqua science engineers inc.

WELL SAMPLING FIELD LOG

Aqua Science Engineers, Inc. San Ramon, CA 94583

Project Name: Goodman
Project Address: 2501 Santa Clara Avenue
Job # 2580 Date of sampling: 10/26/92
Completed by: Dave Allen
Well Number / Designation: MW-3
Top of casing elevation: 25.00'
Total depth of well casing: 25' Well diameter: 2"
Depth to water (before sampling): 9.65
Thickness of floating product if any: None
Depth of well casing in water: 15.45'
Req'd volume of groundwater to be purged before sampling: 15 Gallons
Approximate volume of groundwater purged: 15 Gallons
Type of seal at grade: Portland
Type of cap on the casing: Expandable, Locking
Is the seal water tight? Yes Is the cap water tight? Yes
Number of samples (containers) collected 2-40 ml.
Did 40 ml VOA vials have headspace: No
Were sample containers chilled after sampling & for delivery ? Yes
Are Chain of Custody documents accompanying the samples: Yes
Sample temperature: 19° C
Sample pH: _____ Test method: _____

Physical description of water during initial bailing period:
Turbid grey
Physical description of water sample: Clear, petroleum odor

Type of analysis requested: TPH as Gasoline
BTEX
pH
Conductivity

Type of bailer/sampling equipment used: 2" PVC Bailer
Disposable, sterile, polyethylene sampling bailer.
Equipment decontamination procedures: TSP & H2O

Disposition of bailed water volume: Drummed and left on site.