LOP 6588

ENVIRONMENTAL
PROTECTION

geo - logic *geotechnical and environmental consulting services*
1140 - 5th Avenue, Crockett, CA 94525 510) 787-6867 - Fax (510) 787-1457

98 AUG 26 PM 12:10

August 28, 1998

Alameda County Department of Environmental Health
1131 Harbor Bay Parkway, 2nd Floor
Alameda, CA 94502

Attention: Ms. Susan Hugo

RE: Former Berkeley Farms Truck Repair Shop and Yard
4575 San Pablo Avenue
Emeryville, California

Dear Ms. Hugo:

Thank you again for meeting with myself, Mr. Norm Alberts, and the other representatives of Berkeley Farms earlier this week regarding the referenced site. As we discussed at that time, and in response to your letter to Berkeley Farms dated July 16, 1998, I have compiled a summary of the analytical results collected at the site to date, and, based on those results, proposed analyses to be performed on the groundwater samples collected from the wells in future sampling events.

Chlorinated solvents were previously analyzed for in all (a total of 12) of the soil samples and in the groundwater grab sample obtained during the waste oil tank excavation at the northern portion of the property. All of the analyses yielded nondetectable results for chlorinated solvents. In addition, the first quarter water samples from the three existing wells were analyzed for chlorinated solvents, again yielding nondetectable results.

The previous waste oil tank usage at the northern portion of the site, and the previous service station tank pit at the southern end of the site predate and did not involve MTBE usage. In the first two quarterly samplings of the three wells, MTBE was nondetectable. In addition, MTBE was nondetectable in the soil samples obtained from MW1 and MW3.

All of the soil samples taken during the waste oil tank excavation (total of 12), and the grab groundwater sample, were analyzed for the metals cadmium, chromium, lead, nickel, and zinc. All of the metal occurrences in these samples were below regulatory standards. In addition, total lead was nondetectable in the groundwater samples obtained from the three monitoring wells on the June 2, 1998 sampling event. Per your request, analyses for the five metals listed above was performed for the most recent sampling event (August 21, 1998). All of the metals analyses yielded

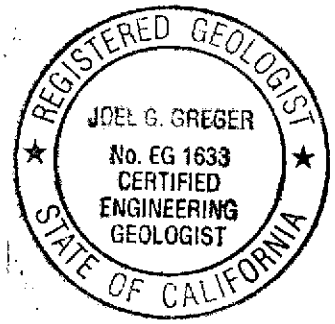
nondetectable results, except for 0.078 parts per million of nickel detected in the groundwater sample from MW1.

The wells are currently monitored and sampled quarterly. Additional delineation work is proposed in the attached workplan. Based on the analytical results summarized above, Geo-Logic proposes that analyses for TPH as gasoline, TPH as diesel, and BTEX be conducted on the monitoring wells and any soil or groundwater samples taken during additional investigation work. Also, it is our understanding from the meeting that if the groundwater samples collected from MW3 during the next quarter again yield nondetectable results, that sampling of MW3 can cease.

I understand that following your review of the attached workplan, a letter will be forthcoming which will also respond to this request for modification to the laboratory analysis program. Should you have any questions regarding this letter or the attached workplan, please do not hesitate to call me at (510) 787-6867.

Sincerely,

Geo-Logic



Joel G. Greger, C.E.G.
Engineering Geologist

License No. EG 1633
Exp. Date 8/31/2000

Attachments: Quarterly Monitoring and Sampling Report
Workplan/Proposal

cc: Mr. Norm Alberts, Berkeley Farms
Mr. Rick Montesano, Paradiso Mechanical

geo - logic *geotechnical and environmental consulting services*
1140 - 5th Avenue, Crockett, CA 94525 (510) 787-6867 - Fax (510) 787-1457

GL-97-110.R5
Paradiso Job No. 1095
April 25, 1998

Paradiso Mechanical, Inc.
P. O. Box 1836
2600 Williams Street
San Leandro, California

Attention: Mr. Rick Montesano

RE: Quarterly Monitoring and Sampling Report for
Former Berkeley Farms Truck Repair Shop and Yard
4575 San Pablo Avenue
Emeryville, California 94608

Dear Mr. Montesano:

This report presents the results of the third monitoring and sampling of the monitoring wells at the subject site. The wells are currently monitored and sampled quarterly. During this quarter, the wells were monitored and sampled on August 21, 1998. The work was performed in compliance with the guidelines established Regional Water Quality Control Board (RWQCB), and the Alameda County Department of Environmental Health (ACDEH).

SITE DESCRIPTION AND BACKGROUND

The subject site is located on the western side of San Pablo Avenue between 45th and 47th Streets in Emeryville, California, and formerly contained a service station facility at the southern portion of the property. Until recently, the site operated as a truck repair shop and yard for Berkeley Farms. A Site Plan (Figure 1) is attached to this report.

GEO-LOGIC's previous work at the site includes sampling during overexcavation of a waste oil tank at the northern end of the property. This work is summarized in GEO-LOGIC's reports (GL-97-110.R1 and GL-97-110.R2), both dated February 10, 1998.

Following this work, installation of three monitoring wells was proposed (workplan/proposal GL-98-110, dated November 15, 1997). The wells were installed in February, 1998. This work was documented in GEO-LOGIC's report (GL-97-110.R3) dated March 7, 1998.

In April and May, 1998, a former service station fuel tank pit at the southern portion of the site was extensively overexcavated. This work was documented in GEO-LOGIC's report (GL-97-110.R4) dated June 9, 1998.

RECENT FIELD ACTIVITIES

The three wells (MW1 through MW3) were monitored and sampled on August 21, 1998. Prior to sampling, the wells were checked for depth to water, and the presence of free product and sheen. No free product or sheen was noted in any of the wells. The monitoring data collected this quarter is summarized in Table 1.

After recording the monitoring data, the wells were each purged of approximately seven gallons of water. Once a minimum of approximately three to four casing volumes had been removed from each well and the groundwater level was observed to have stabilized, water samples were then collected by the use of a clean Teflon bailer. The samples were decanted into clean VOA vials and/or one-liter amber bottles, as appropriate, which were then sealed with Teflon-lined screw caps, labeled, and stored in a cooler, on ice, until delivery to a state-certified laboratory.

HYDROLOGY

On August 21, 1998, the measured depth to ground water in the monitoring wells ranged from 6.27 to 8.61 feet below the tops of the well casings. The ground water flow direction appeared to be to the west, as shown on the attached Potentiometric Surface Map, Figure 1. The hydraulic gradient at the site on August 21, 1998, was approximately 0.028.

ANALYTICAL RESULTS

Water samples from wells MW1 through MW3 were analyzed at Calcoast Analytical, Inc., in Emeryville, California. All samples analyzed were accompanied by properly executed Chain of Custody documentation. The samples were analyzed for TPH as gasoline and TPH as diesel by EPA method 8015, and benzene, toluene, ethylbenzene, and xylenes (BTEX). In addition, the samples collected from MW1 and MW3 were analyzed for cadmium, chromium, lead, nickel, and zinc.

The concentrations of TPH as gasoline, benzene, and TPH as diesel detected in the ground water samples collected on August 21, 1998, are shown on the attached Figure 2. The results of the water analyses are summarized in Table 2. Copies of the laboratory analyses and the Chain of Custody documentation are attached to this report.

DISTRIBUTION

A copy of this report should be sent to Ms. Susan Hugo of the ACDEH.

LIMITATIONS

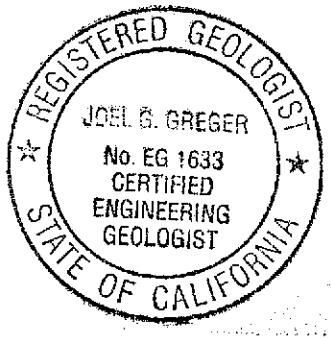
Environmental changes, either naturally-occurring or artificially-induced, may cause changes in ground water levels and flow paths, thereby changing the extent and concentration of any contaminants. Our studies assume that the field and laboratory data are reasonably representative of the site as a whole, and assume that subsurface conditions are reasonably conducive to interpolation and extrapolation.

The results of this work are based on the data obtained from the field and laboratory analyses obtained from a state-certified laboratory. We have analyzed these data using what we believe to be currently applicable engineering techniques and principles in the Northern California region. We make no warranty, either expressed or implied, regarding the above, including laboratory analyses, except that our services have been performed in accordance with generally accepted professional principles and practices existing for such work.

If you have any questions regarding this report, please do not hesitate to call me at (510) 787-6867.

Sincerely,

GEO-LOGIC



Joel G. Greger, C.E.G.
Engineering Geologist

License No. EG 1633
Exp. Date 8/31/2000

Attachments: Tables 1 and 2
Figures 1 & 2
Laboratory Analyses and
Chain of Custody documentation

Geo-Logic
GL-97-110.R5
August 25, 1998

TABLE 1

SUMMARY OF GROUND WATER MONITORING AND PURGING DATA

Well #	Ground Water Elevation (feet)	Depth to Water (feet)♦	Total Well Depth (feet)♦	Product Thickness (feet)	Sheen	Water Purged (gallons)
(Monitored and Sampled on August 21, 1998)						
MW1	35.51	7.84	16.60	0	No	7
MW2	34.17	8.61	16.56	0	No	7
MW3	35.42	6.27	16.61	0	No	7*
(Monitored and Sampled on June 3, 1998)						
MW1	35.51	6.50	16.60	0	No	8
MW2	34.17	6.61	16.57	0	No	8
MW3	35.42	5.66	16.62	0	No	8
(Monitored and Sampled on February 27, 1998)						
MW1	37.51	4.50	16.61	0	No	8
MW2	35.61	5.17	16.58	0	No	8
MW3	37.28	3.80	16.63	0	No	8
(Monitored and Developed on February 24, 1998)						
MW1	37.57	4.44	16.59	0	No	24
MW2	35.69	5.09	16.58	0	No	21
MW3	37.38	3.70	16.62	0	No	25

Well #	Top of Casing Elevation* (feet)
MW1	42.01
MW2	40.78
MW3	41.08

♦ Depth to water and total well depth measurements are taken from the top of the well casings.

* The elevation of the tops of the well casings have been surveyed relative to City of Oakland Benchmark No. 241.

Geo-Logic
GL-97-110.R5
August 25, 1998

TABLE 2

SUMMARY OF LABORATORY ANALYSES
WATER

Date	Sample Number	TPH as Diesel	TPH as Gasoline	Benzene	Toluene	Ethyl-benzene	Xylenes
8/21/98	MW1+	96,000	38,000	1,700	1,000	2,400	3,300
6/2/98	MW1	105,000	34,000	1,900	1,600	2,400	3,500
2/27/98	MW1	81,000	27,000	2,200	910	1,700	2,700
8/21/98	MW2+	1,900	<5.0	<0.5	<0.5	220	400
6/2/98	MW2	7,600	60	220	510	800	1,100
2/27/98	MW2	14,000	<5.0	<0.5	120	460	730
8/21/98	MW3+	<5.0	<5.0	<0.5	<0.5	<0.5	<0.5
6/2/98	MW3	<5.0	<5.0	<0.5	<0.5	<0.5	<0.5
2/27/98	MW3	--	<5.0	<0.5	<0.5	<0.5	<0.5
Detection Limit		<5.0	<5.0	<0.5	<0.5	<0.5	<0.5

Date	Sample Number	TEPH	MTBE	TOTAL LEAD
6/2/98	MW1*	80,000	<0.5	<5.0
2/27/98	MW1	--	<0.5	--
6/2/98	MW2*	3,800	<0.5	<5.0
2/27/98	MW2	20,000**	<0.5	--
6/2/98	MW3*	<5.0	<0.5	<5.0
2/27/98	MW3	--	<0.5	--
Detection Limit		<500	<0.5	<5.0

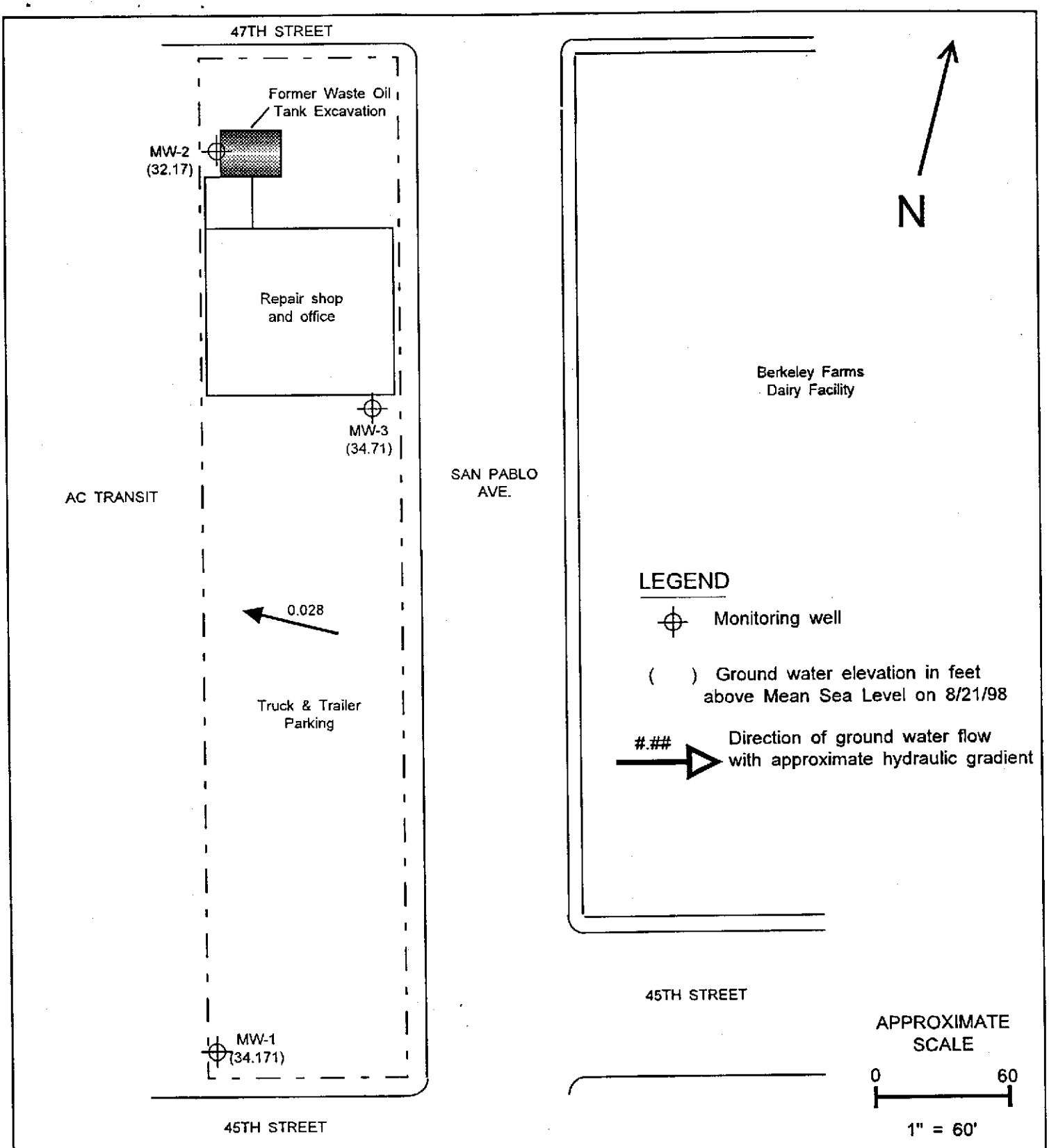
\+ Cadmium, chromium, lead, nickel, and zinc were nondetectable, except for 0.078 mg/l of nickel detected in MW1.

* All EPA Method 8010 constituents were nondetectable.

** 20,000 ppb of Total Recoverable Petroleum Hydrocarbons by EPA Method 418.1.

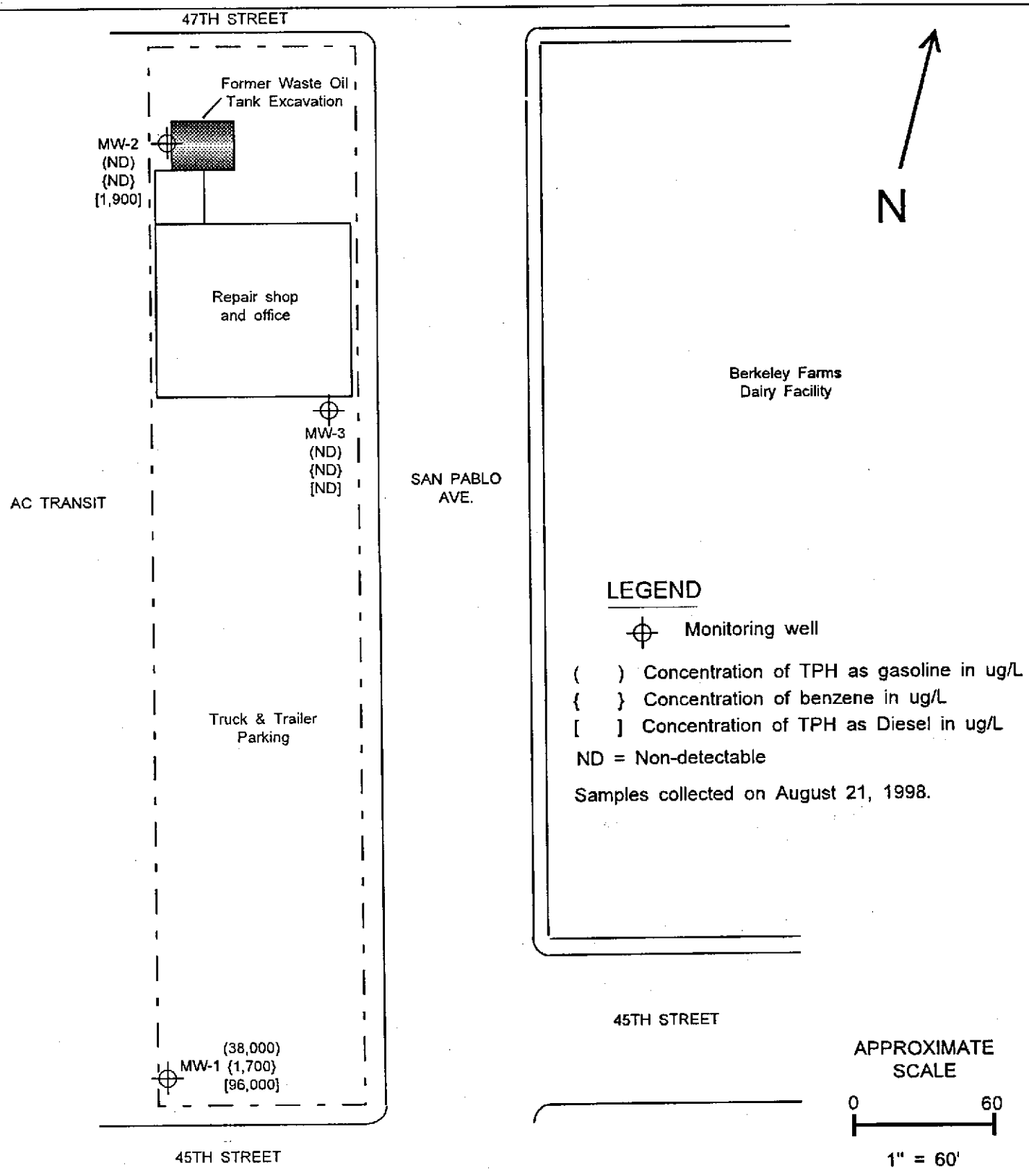
-- analyses not performed

Results are in micrograms per liter (μg/L), unless otherwise indicated.



Berkeley Farms Truck Repair Shop & Yard 4575 San Pablo Avenue Emeryville, California	Figure No: 1	Date: August 21, 1998 Drawn By: JG/Geo-Logic

Site Plan showing Potentiometric Surface



Berkeley Farms Truck Repair Shop & Yard 4575 San Pablo Avenue Emeryville, California	Figure No: 2	Date: August 25, 1998 Drawn By: JG/Geo-Logic

Petroleum Hydrocarbons in Groundwater

CALCOAST ANALYTICAL

Materials Chemistry

Certified by
California Department of Health Services
City of Los Angeles, Dept. of Building & Safety

August 25, 1998

Geo -Logic
1140-5th Street
Crockett, CA 94525

Attn: Mr. Joel Greger

Ref: Lab File 0821-4A/C-98

1. SAMPLE(s):

Three (3) water samples, each contained in two (2) VOA's and one (1) liter bottle. From Berkeley Farms, San Pablo Avenue, Emeryville.

A. MW1
B. MW2
C. MW3

Collected: August 21, 1998
Received: August 21, 1998

2. ANALYSIS PERFORMED:

A. Total Petroleum Hydrocarbons-gasoline (TPH-g) by Gas Chromatography

B. Total Petroleum Hydrocarbons-diesel (TPH-d) by GC.

C. Benzene, Toluene, Ethylbenzene and Xylene (BTEX) by GC.

D. Total cadium (Cd), chromium (Cr), lead (Pb), nickel (Ni) and zinc (Zn) content by Atomic Absorption Spectroscopy (AAS)

TELEPHONE (510) 652-2979
FAX (510) 652-3085

P.O. BOX 8702 • EMERYVILLE, CA 94662
4072 WATTS STREET • EMERYVILLE, CA 94608

3. METHODS OF ANALYSIS:

A. EPA Method 8015;SW-846

B. EPA Method 8015; SW-846

C. EPA Method 8020; SW-846

D. Sample Digestion-EPA Method 3005; SW-846
AAS Analysis-EPA 7000 Series Methods; SW-846

4. RESULTS:

A. TPH - gasoline

Sample	TPH - gasoline (µg/l)
A. MW1	38,000
B. MW2	<5.0 (ND)
C. MW3	<5.0 (ND)

Method Blank / Detection Limit = < 0.1 mg/kg (none detected)
Mean Spike Recovery = 107%

B. TPH - diesel

Sample	TPH - diesel (µg/l)
A. MW1	96,000
B. MW2	1,900
C. MW3	<5.0 (ND)

Method Blank / Detection Limit = < 0.1 mg/kg (none detected)
Mean Spike Recovery = 104%

C. BTEX

Sample	Concentration (µg/kg)			
	Benzene	Toluene	Ethylbenzene	Xylene
A. MW1	1,700	1,000	2,400	3,300
B. MW2	< 0.5 (ND)	< 0.5 (ND)	220	400
C. MW3	< 0.5 (ND)	< 0.5 (ND)	< 0.5 (ND)	< 0.5 (ND)
Method Blank / Detection Limit	< 0.5 (ND)	< 0.5 (ND)	< 0.5 (ND)	< 0.5 (ND)
Mean Spike Recovery	103%	109%	107%	110%

D. Metals

Sample A. MW1

Element	Regulatory Limit (mg/l)	Detected Level (mg/l)	Method Detection Limit (mg/l)	Method Blank (mg/l)	Mean Percent Recovery
Cadmium	1.0	<MDL (ND)	0.005	< MDL (ND)	102%
Chromium	5.0	<MDL (ND)	0.05	< MDL (ND)	107%
Lead	5.0	<MDL (ND)	0.05	< MDL (ND)	104%
Nickel	20	0.078	0.01	< MDL (ND)	108%
Zinc	250	<MDL (ND)	0.005	< MDL (ND)	104%

(ND) = None Detected

Sample B. MW2

Element	Regulatory Limit (mg/l)	Detected Level (mg/l)	Method Detection Limit (mg/l)	Method Blank (mg/l)	Mean Percent Recovery
Cadmium	1.0	<MDL (ND)	0.005	< MDL (ND)	102%
Chromium	5.0	<MDL (ND)	0.05	< MDL (ND)	107%
Lead	5.0	<MDL (ND)	0.05	< MDL (ND)	104%
Nickel	20	< MDL(ND)	0.01	< MDL (ND)	108%
Zinc	250	<MDL (ND)	0.005	< MDL (ND)	104%

(ND) = None Detected

Sample C. MW3

Element	Regulatory Limit (mg/l)	Detected Level (mg/l)	Method Detection Limit (mg/l)	Method Blank (mg/l)	Mean Percent Recovery
Cadmium	1.0	<MDL (ND)	0.005	< MDL (ND)	102%
Chromium	5.0	<MDL (ND)	0.05	< MDL (ND)	107%
Lead	5.0	<MDL (ND)	0.05	< MDL (ND)	104%
Nickel	20	<MDL (ND)	0.01	< MDL (ND)	108%
Zinc	250	<MDL (ND)	0.005	< MDL (ND)	104%

(ND) = None Detected

Ronald W. Shrewsbury
Analytical Chemist

RS/ki(1)

ALL SAMPLES SUBMITTED FOR TESTING WILL BE HELD 30 DAYS FROM REPORT DATE AT WHICH TIME THEY WILL BE RETURNED TO CLIENT OR DESTROYED. CLIENT WILL BE RESPONSIBLE FOR ALL SHIPPING, HANDLING, AND DISPOSAL CHARGES. SAMPLES WILL BE STORED UPON WRITTEN INSTRUCTIONS AND FEE ARRANGEMENTS.

AUG-21-98 11:40 AM JOEL GREGER 510 7871457 P.01

Date 8/21/98 **Chain of Cus** Page 1 of

Calcoast Analytical, Inc.

Proj. Mgr.: Joel Greger - Geo-Logic
Company: Paradise Mechanical, Inc
Address: 2600 Williams St.
PO 3 1836
San Leandro, CA

Samples (signature) (Phone No.) 510 7876867
(Fax No.) 510 7871457

Analysis Report

Sample ID	Type	Date	Time	Matrix	Preserve	TPH - Gasoline (EPA 5030, 8015)	TPH - Gasoline (5030, 8015) w/ BTEX (EPA 602, 8020)	TPH - Diesel, TEPH (EPA 3510/3550, 8015)	PURGEABLE AROMATICS BTEX (EPA 602, 8020)	PURGEABLE HALOCARBONS (EPA 601, 8010)	VOLATILE ORGANICS (EPA 624, 8240, 8260)	BASE/NEUTRALS, ACIDS (EPA 625/527, 8270)	TOTAL OIL & GREASE (EPA 5520, E+F, B+F)	PCB (EPA 608, 8080)	PESTICIDES (EPA 608, 8080)	TOTAL RECOVERABLE HYDROCARBONS (EPA 418.1)		LUFT METALS Cd, Cr, Pb, Zn, Ni	CAM METALS (17)	PRIORITY POLLUTANT METALS (13)	TOTAL LEAD	EXTRACTION (TCLP, STLC)
MW1		8/21/98	AM				X	X										X				
MW2		↓	↓				X	X														
MW3							X	X										X				

Project Information

Project Name: Rickel/Paradise Mechanical, 2654 San Pablo Ave, Emeryville
Project No.
PO #
TAT: (Standard 5-Day) 24 48 72 Other

Sample Receipt

Total No. of Containers	9
Head Space	
Rec'd Good Condition/Cold	
Conforms To Record	

Special Instructions / Comments:

~~See fax analyses to be performed~~

Relinquished By: Joel G. Greger 1.
(Signature) Joel
(Printed Name)
8/21/98 (Date) 10:12 AM (Time)

Received By: 1.
(Signature)
(Printed Name) Ronald Shrewsbury
(Date) 8/21/98 (Time) 11:15 AM

Relinquished By:
(Signature)
(Printed Name) (Date)
(Date) (Time)

2. Relinquished By:
(Printed Name)
(Date)

Post-it® Fax Note 7671 | Date 8/21/98 | # of pages ▶ 1
To Ron Shrewsbury | From Joel Greger
Co./Dept. CalCoast | Co. Geo Logic
Phone # | Phone # 510 7876
Fax # 510 652 3085 | Fax # 145

geo - logic *geotechnical and environmental consulting services*
1140 - 5th Avenue, Crockett, CA 94525 510) 787-6867 - Fax (510) 787-1457

GL-97-110.P4
August 28, 1998

Paradiso Mechanical, Inc.
P.O. Box 1836
2600 Williams Street
San Leandro, California 94577

Attention: Mr. Rick Montesano

RE: Work Plan/Proposal
Further Assessment of Groundwater in the vicinity of
Berkeley Farms Truck Repair Shop and Yard
4575 San Pablo Avenue
Emeryville, California 94608

Dear Mr. Montesano:

Per the request of the Alameda County Department of Environmental Health (ACDEH), in their letter to Berkeley Farms dated July 16, 1998, Geo-Logic is pleased to provide this workplan/proposal for further assessment of groundwater conditions in the downgradient vicinity of the subject site.

This work plan/proposal for the installation of exploratory borings is based on the soil and groundwater analytical results from the previous investigations and remedial work completed at the subject site. This work is summarized in a number of technical reports by Geo-Logic which are listed in the above-mentioned letter from ACDEH. The three existing wells have been monitored and sampled on a quarterly basis since the initial sampling in February, 1998 (two quarters). Documentation of the most recent monitoring and sampling data, and a summary of historical groundwater analytical results are presented in Geo-Logic's report *Overexcavation of Former Fuel Storage Tank Pit, and Second Quarter Monitoring and Sampling*, dated June 9, 1998.

INTRODUCTION

The proposed scope of work includes: obtaining offsite access permission for boring installation from AC Transit, obtaining the necessary soil boring permits from Alameda County Public Works Agency (ACPWA) - Water Resources Section; preparing a site specific health and safety plan; advancing soil borings using a GeoProbe® or similar direct-push technology; collecting soil and grab groundwater samples from the borings;

submitting selected soil samples and groundwater samples for chemical analysis; and preparing a report which presents the findings of the investigation.

The scope of work described in this Work Plan is intended to comply with the State of California Water Resources Control Board's *Leaking Underground Fuel Tanks (LUFT) Manual* and *California Underground Storage Tank Regulations, 1994*, the California Regional Water Quality Control Board (CRWQCB) *Tri-Regional Board Staff Recommendations for Preliminary Investigation and Evaluation of Underground Tank Sites*, and ACDEH guidelines. The analytical results of the samples obtained from this work will be used to determine the best locations for additional monitoring wells, if warranted.

SCOPE OF WORK

To evaluate whether petroleum hydrocarbons have impacted groundwater downgradient of the former tank locations at the northern and southern portions of the site, Geo-Logic proposes to advance six exploratory soil borings, as shown on the attached Site Plan, Figure 1. Grab groundwater samples will be collected from all of the borings. In addition, soil samples will be obtained and screened with a photo-ionization detector (PID). Should significant soil contamination be encountered above the capillary fringe, soil samples will also be retained and submitted for analyses.

To implement the proposed scope of work, the following tasks are proposed:

Task 1. Pre-field Activities

Following review and approval of the workplan by the ACDEH, a site specific health and safety plan will be prepared and soil boring permits will be obtained from the ACDPW. As required by law, the boring locations will be marked in white paint, and Underground Service Alert (USA) will be notified 48 hours in advance of the scheduled work.

Task 2. Exploratory Borings

The uppermost five feet of each boring location will be hand-augered as a precaution for underground utility conflicts. The exploratory borings will be completed using a GeoProbe® or similar direct-push technology at the locations shown on Figure 2. Drilling will be performed by a California-licensed well driller. A California-registered geologist will monitor the drilling activities and prepare a log of the boring. The exploratory soil boring will be advanced 2 feet into groundwater, which is anticipated at approximately 7 to 9 feet below grade.

Soil samples for description and possible chemical analysis will be obtained from the boring at five-foot intervals, at a minimum. Soil samples will be collected in a split-spoon sampler lined with stainless steel liners. Soil from each sampled interval will be screened in the field for the presence of volatile organic compounds using a PID. The actual number of soil samples submitted for chemical analysis (as described in Task 3) if any, will depend on site conditions and field screening data.

Soil samples to be submitted for analyses will be removed from the sampler and retained in the stainless steel liners. The liners will be sealed with Teflon-lined plastic caps and placed in individually sealed plastic bags. They will then be labeled and stored in a cooler, on crushed ice or "blue ice," for delivery to a state-certified laboratory. Properly executed Chain of Custody documentation will accompany all soil samples.

A grab groundwater sample will be collected from each boring using a clean teflon or stainless steel bailer. If water is slow to come in the boreholes, small-diameter PVC casings may be installed to facilitate sample collection.

The water samples will be decanted into 40 ml VOA vials or one-liter amber bottles, as appropiate. The vials and/or bottles will be sealed with Teflon-lined screw caps, labeled, and stored, on ice, for delivery to a state-certified laboratory. Properly executed Chain of Custody documentation will accompany all water samples.

The sampling bailer will be cleaned with non-phosphate soap and clean water rinses between uses.

Following sample collection, the borings will be backfilled with neat cement to 5 feet bgs. Bentonite will be used to seal the portion of the boring within the saturated zone. Cuttings generated during hand-augering will be placed in the upper five feet of the boring and compacted. The boring will be completed at the surface with concrete.

Task 3. Laboratory Analyses

Soil and groundwater samples will be submitted for chemical analysis by a California state-certified Hazardous Material Testing Laboratory. Selected soil samples and all groundwater samples will be analyzed for Total Petroleum Hydrocarbons (TPH) as gasoline and TPH as diesel by EPA Method 8015 (Modified), and for gasoline constituents benzene, toluene, ethylbenzene, total xylenes (BTEX) by EPA Method 8020.

Task 4. Report Preparation

Following receipt and analysis of all data, a report will be prepared which summarizes the procedures and findings associated with this investigation, and makes additional recommendations, as appropriate. Finalized Boring Logs will be prepared from the field logs and included in this report. The report will be submitted to Paradiso Mechanical, Inc. (agent for Berkeley Farms), for their use and distribution to the ACDEH.

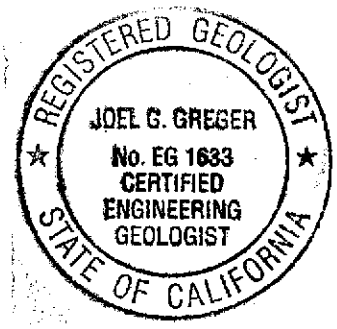
LIMITATIONS

Soil deposits and rock formations may vary in thickness, lithology, saturation, strength and other properties across any site. In addition, environmental changes, either naturally-occurring or artificially-induced, may cause changes in the extent and concentration of any contaminants. Our studies assume that the field and laboratory data are reasonably representative of the site as a whole, and assume that subsurface conditions are reasonably conducive to interpolation and extrapolation.

The results of this study will be based on the data obtained from the field and laboratory analyses obtained from a state-certified laboratory. We will analyze this data using what we believe to be currently applicable engineering techniques and principles in the Northern California region. We make no warranty, either expressed or implied, regarding the above, including laboratory analyses, except that our services have been performed in accordance with generally accepted professional principles and practices existing for such work.

If you have any questions regarding this work plan/proposal, please do not hesitate to call me at (510) 787-6867.

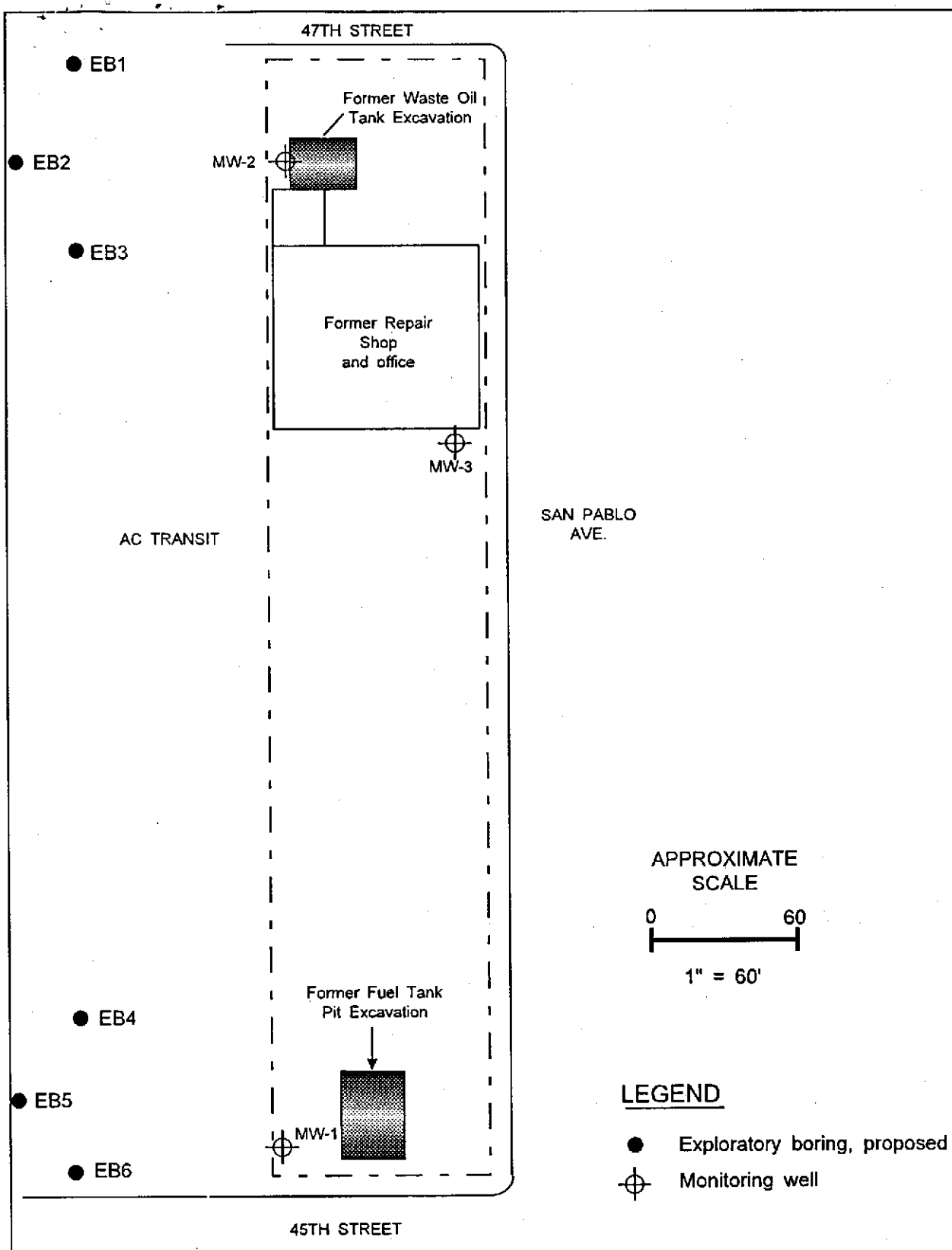
Sincerely,



Joel G. Greger, C.E.G.
Certified Engineering Geologist
Geo-Logic

License No. EG 1633
Exp. Date 8/31/2000

Attachments: Site Plan - Figure 1



Former Berkeley Farms Truck Repair Shop & Yard 4575 San Pablo Avenue Emeryville, California	Figure No: 1	Date: August 6, 1998 Drawn By: JG/GEO-LOGIC

Site Plan