Cademartori Trucking Co.
1833 PERALTA STREET
OAKLAND, CALIFORNIA 94607

91 JAN 32 PM 12:08

Paul M. Smith
Alameda County Department of Environmental Health
80 Swan Way, Room 200
Oakland CA 94621

30 January 1991

Notification of Intent to Backfill Excavations
Cademartori Trucking Facility
1833 Peralta Street
Oakland CA

Dear Mr. Smith:

In accordance with the the approved workplan (dated 15 October 1990) for our facility, additional excavation of contaminated soil has been completed and confirmation samples have been collected at the excavation limits. A summary of the work is presented in the attached data submittal. The data indicate that soil contamination was primarily confined to areas immediately surrounding the former tanks and our additional excavation has effectively removed the contamination. On the basis of the attached data, we intend to backfill the existing excavations. Your concurrence and/or comments are solicited.

Upon completion of backfilling, we will continue with the activities outlined in the approved workplan. Upon completion of well installation and sampling, we will submit a more comprehensive report detailing all activities.

Please contact me if you have any questions.

Sincerely,

Linda Cademartori

Attachment

Lowell
Douglas Stromberg

300 gal MnO_2 5%

N P K = 525-4734

ADDITIONAL EXCAVATION

Although some contaminated soil was excavated when the tanks were removed (10 July 1990), additional contamination (including contaminated backfill) remained. As described in our 15 October 1990 workplan, the purpose of additional excavation was to (1) remove visibly contaminated soil, (2) remove a potential continuing source of contamination to groundwater, and (3) aid in characterizing the extent of soil contamination.

Between the time of tank removal and additional excavation, the groundwater level in the excavations had stabilized and the sidewalls of the excavations had sloughed. At the time of additional excavation, the depth to water was approximately 3.7 feet below top of pavement in the waste oil tank excavation and approximately 4.0 feet below top of pavement in the gasoline/diesel tanks excavation. Although accurate measurements were not performed, we estimate that since July 1990, each sidewall of the waste oil tank excavation had sloughed (horizontally) approximately 1 to 2 feet and that each sidewall of the gasoline/diesel tanks excavation had sloughed (horizontally) approximately 2 to 5 feet.

Additional excavation was performed on 17 January 1991 by Diablo Tank and Equipment, with observation and sampling by Streamborn. Pavement surrounding each excavation was initially broken with a wrecking ball and subsequently removed. Pavement on the east side of the gasoline/diesel excavation was not removed because of an adjacent sewer line.

After pavement removal, several exploration trenches were cut in each excavation, perpendicular to the sidewalls. The trenches extended vertically from the base of pavement to the water table and approximately 3 feet horizontally. The freshly exposed soil in the trenches was examined for signs of contamination and field screening samples were collected and analyzed. Field screening samples were collected by placing approximately 50 grams of soil inside a sealed 4-ounce (fluid) jar. The partially-filled jar was placed in the sun and the headspace in the jar was allowed to equilibrate over a period of approximately 15 minutes, while shaking occasionally. The headspace was then analyzed using a field organic vapor analyzer (Thermo Environmental Instruments, Model 580B, 10.2 eV photoionization detector calibrated to 100 ppm v/v isobutylene). On the basis of the field screening measurements and our observations, we identified the need to enlarge the waste oil tank excavation to the northwest. Apart from this, our observations indicated that contamination had not spread horizontally in the unsaturated zone and further enlargement of either excavation was not necessary (beyond the enlargement due to sloughing).

The waste oil tank excavation was then partially dewatered using a vacuum tanker from H & H Environmental Services. Approximately 3,500 gallons of water were pumped, lowering the water within the excavation to a depth of approximately 5-1/2 feet (below subgrade elevation), or within approximately 1/2-foot of the excavation base. The sloughed material was then excavated, exposing fresh vertical sidewalls to a depth of approximately 5-1/2 to 6 feet (below subgrade elevation). The excavation was also enlarged to the northwest, another round of screening samples were collected in the northwest corner, and the excavation was further enlarged. In addition to removing the slough, the excavation was enlarged approximately 4 feet toward the northwest. Approximately 35 cubic yards were excavated on 17 January 1991. The final excavation dimensions are shown on Figure 1.

The gasoline/diesel excavation was then partially dewatered using a vacuum tanker from H & H Environmental Services. Approximately 5,000 gallons of water were pumped, lowering the water table within the excavation to a depth of approximately 5 feet (below top of pavement), or within approximately 2 feet of the excavation base. Sloughed material that was exposed during dewatering was then excavated. During dewatering and excavation, a concrete structure was encountered in the northwest corner (Figure 1). This structure appeared to be the remnants of an

abandoned building foundation. Approximately 50 cubic yards were excavated on 17 January 1991. The final excavation dimensions are shown on Figure 1.

Soil removed from both excavations was stockpiled onsite and covered with visqueen.

CONFIRMATION SAMPLING

After excavation, confirmation samples were collected from both excavations. Within the waste oil tank excavation, soil samples were collected from the 4 sidewalls, slightly above and slightly below the static water elevation. As well, samples were collected from the northwest corner, from the enlarged portion of the excavation. The resulting sample spacing was approximately 20 feet. The sampling locations are shown on Figure 1.

Within the gasoline/diesel tanks excavation, 5 sets of soil samples were collected from the sidewalls, resulting in sample spacing of approximately 20 feet around the excavation perimeter. Each set of soil samples consisted of 3 samples; collected slightly above, at, and slightly below the static water elevation. The sampling locations are shown on Figure 1.

The samples were collected by exposing fresh soil in the sidewalls of the excavation with a decontaminated trowel. A decontaminated liner was then driven into the exposed soil, retrieved, capped, labeled, logged on the chain-of-custody form, and placed on ice in a cooler. In addition, the holes produced in the sidewalls by liner removal were screened with the field organic vapor analyzer and the sampled soils were classified. Sampling observations are contained in the field notes (Appendix A) and are summarized in Tables 3 and 4.

ANALYSIS OF CONFIRMATION SAMPLES

Confirmation samples from the gasoline/diesel tanks excavation were analyzed for total petroleum hydrocarbons as diesel, and benzene, toluene, xylenes, and ethylbenzene. These were the compounds detected in soil samples collected during tank removal (total petroleum hydrocarbons as gasoline was analyzed during tank removal but was not detected). Samples collected at a depth of 4.5 feet (below top of pavement) were selected for analysis (static groundwater was measured at 4.0 feet below top of pavement), while the remaining samples collected at 4.0 and 3.5 feet (below top of pavement) were archived.

Confirmation samples from the waste oil tank excavation were analyzed for oil & grease, total petroleum hydrocarbons as diesel, total petroleum hydrocarbons as gasoline, and benzene, toluene, xylenes, and ethylbenzene. These were the compounds detected in soil samples collected during tank removal. Samples collected at a depth of 4.0 feet (below base of pavement) were chosen for analysis (static groundwater was measured at 3.7 feet below top of pavement or approximately 3.5 feet below base of pavement), while the remaining samples collected at 3.0 feet (below base of pavement) were archived. Suites of specific analyses were selected for different soil samples with the exception of the sample from the northwest corner (Oil-NW-4), which was tested for all of the aforementioned compounds. Oil-NW-4 was representative of the limits of the enlarged corner of the excavation, which was advanced approximately 4 feet on the basis of field screening.

Confirmation sampling analytical results are summarized in Tables 1 and 2. With the exception of one measurement for oil & grease, the results were below detection limits. The single measurement of 19 mg/kg oil & grease was from the east wall of the waste oil tank excavation. This low measured concentration represents a minimal threat to groundwater resources, particularly for such an immobile component as oil & grease.

Table 1

Soil Sample Results from Confirmation Sampling - Waste Oil Tank Excavation

Sample Location	Sample Designation	Sample Date	Sampled By	Sample Type	Sample Depth (feet)	Soil Classification	Field Screening (ppm v/v)	Oil & Grease (mg/kg)	Total Petroleum Hydrocarbons as Gasoline (mg/kg)	Total Petroleum Hydrocarbons as Diesel (mg/kg)	Benzene (mg/kg)	Toluene (mg/kg)	Ethyl-benzene (mg/kg)	Xylenes (mg/kg)
Oil-South	5	10 July 1990	DTE	Grab	NM			160	20	<10	<0.005	0.01	0.03	0.13
Oil-North	6	10 July 1990	DTE	Grab	NM			730	37	50	<0.005	0.01	0.05	0.15
Oil-East	Oil-East-4	17 January 1991	Streamborn	Liner	4.0	SC-sand with clay	2	19	<1	NM	<0.005	<0.005	<0.005	<0.005
Oil-South	Oil-South-4	17 January 1991	Streamborn	Liner	4.0	SM-sand with silt	<1	<10	NM	<1	NM	NM	NM	NM
Oil-West	Oil-West-4	17 January 1991	Streamborn	Liner	4.0	SM-sand with silt	<1	<10	<1	NM	<0.005	<0.005	<0.005	<0.005
Oil-North	Oil-North-4	17 January 1991	Streamborn	Liner	4.0	SM-sand with silt	<1	<10	NM	<1	NM	NM	NM	NM
Oil-NW	Oil-NW-4	17 January 1991	Streamborn	Liner	4.0	CH-clay	1	<10	<1	<1	<0.005	<0.005	<0.005	<0.005

General Notes

(a) On 17 January 1991, depths measured relative to base of pavement. Asphalt concrete pavement surrounding excavation was approximately 3 inches (0.2 feet) thick.

(b) On 17 January 1991, prior to dewatering and excavation, depth to water measured at 3.5 feet below base of pavement. Dewatering (±3,500-gallons) lowered water depth to approximately 5.5 feet below base of pavement. Approximately 0.5 feet of standing water remained in the excavation after dewatering and during excavation and sampling.

(c) NM = not measured

(d) DTE = Diablo Tank and Equipment, Martinez CA

Table 2

Soil Sample Results from Confirmation Sampling - Gasoline/Diesel Tanks Excavation

Sample Location	Sample Designation	Sample Date	Sampled By	Sample Type	Sample Depth (feet)	Soil Classification	Field Screening (ppm v/v)	Total Petroleum Hydrocarbons as Gasoline (mg/kg)	Total Petroleum Hydrocarbons as Diesel (mg/kg)	Benzene (mg/kg)	Toluene (mg/kg)	Ethyl-benzene (mg/kg)	Xylenes (mg/kg)
Gas-SE corner	3	10 July 1990	DTE	Grab			NM	NM	<10	<0.005	<0.005	<0.005	<0.015
Gas-SW corner	4	10 July 1990	DTE	Grab			NM	NM	4,800	0.17	<0.1	0.34	1
Gas-NW corner	7	10 July 1990	DTE	Grab			NM	<1	NM	0.03	<0.005	<0.005	<0.015
Gas-Center	8	10 July 1990	DTE	Grab			NM	<1	NM	0.04	<0.005	<0.005	<0.015
Gas-NE	Gas-NE-4.5	17 January 1991	Streamborn	Liner	4.5	SM-sand with silt	1	NM	<1	<0.005	<0.005	<0.005	<0.005
Gas-North	Gas-North-4.5	17 January 1991	Streamborn	Liner	4.5	SP-fine sand	3	NM	<1	<0.005	<0.005	<0.005	<0.005
Gas-West	Gas-West-4.5	17 January 1991	Streamborn	Liner	4.5	SM-sand with silt	1	NM	<1	<0.005	<0.005	<0.005	<0.005
Gas-South	Gas-South-4.5	17 January 1991	Streamborn	Liner	4.5	SM-sand with silt	<1	NM	<1	<0.005	<0.005	<0.005	<0.005
Gas-East	Gas-East-4.5	17 January 1991	Streamborn	Liner	4.5	SM-sand with silt	<1	NM	<1	<0.005	<0.005	<0.005	<0.005

General Notes

(a) On 17 January 1991, depths measured relative to top of concrete pavement.

(b) On 17 January 1991, prior to dewatering and excavation, depth to water measured at 4.0 feet below top of pavement. Dewatering (±5,000-gallons) lowered water depth to approximately 5.0 feet below top of pavement. Approximately 2.0 feet of standing water remained in the excavation after dewatering and during excavation and sampling.

(c) NM = not measured

(d) DTE = Diablo Tank and Equipment, Martinez CA

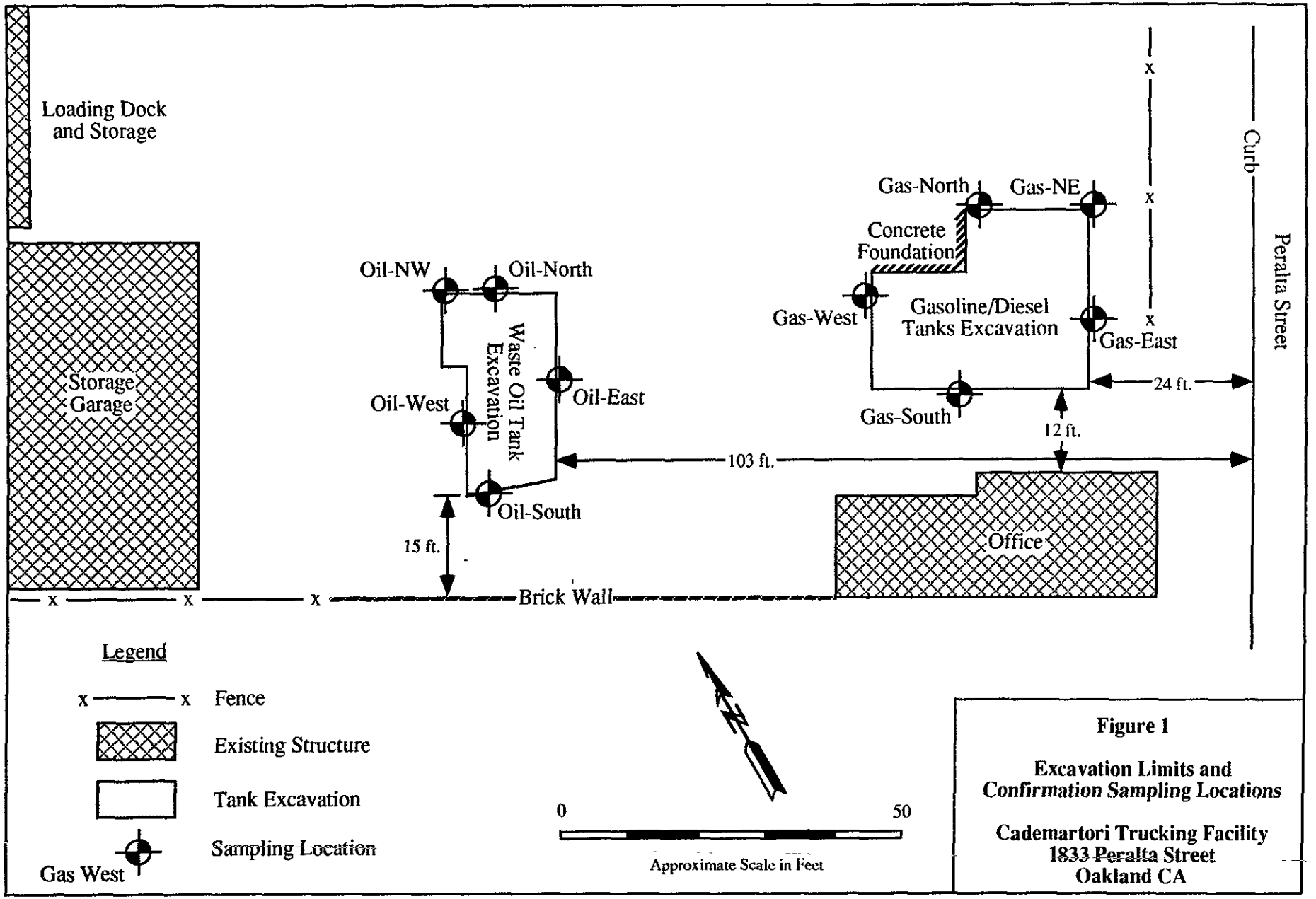


Figure 1

Excavation Limits and Confirmation Sampling Locations

Cademartori Trucking Facility
1833 Peralta Street
Oakland CA

STREAMBORN

CHROMALAB, INC.

Analytical Laboratory
Specializing in GC-GC/MS

- Environmental Analysis
- Hazardous Waste (#E694)
- Drinking Water (#955)
- Waste Water
- Consultation

January 25, 1991 ChromaLab File No.: 0191079

STREAMBORN ENGINEERING,INC.

Attn: Mark Buscheck

RE: Ten soil samples for Gasoline/BTEX, Diesel, and Oil & Grease analyses

Project Name: CADEMARTORI TRUCKING
Project Number: P15
Date Sampled: Jan. 17, 1991 Date Submitted: Jan. 18, 1991
Date Exracted: Jan. 22-25, 1991 Date Analyzed: Jan. 22-25,1991

RESULTS:

Sample No.	Gasoline (mg/Kg)	Diesel (mg/Kg)	Benzene (µg/Kg)	Toluene (µg/Kg)	Ethyl Benzene (µg/Kg)	Total Xylenes (µg/Kg)	Oil & Grease (mg/Kg)
OIL EAST-4.0'	N.D.	----	N.D.	N.D.	N.D.	N.D.	19
OIL SOUTH-4.0'	----	N.D.	----	----	----	----	N.D.
OIL WEST-4.0'	N.D.	----	N.D.	N.D.	N.D.	N.D.	N.D.
OIL NORTH-4.0'	----	N.D.	----	----	----	----	N.D.
OIL NW-4.0'	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.
GAS NE-4.5'	----	N.D.	N.D.	N.D.	N.D.	N.D.	----
GAS N-4.5'	----	N.D.	N.D.	N.D.	N.D.	N.D.	----
GAS W-4.5'	----	N.D.	N.D.	N.D.	N.D.	N.D.	----
GAS S-4.5'	----	N.D.	N.D.	N.D.	N.D.	N.D.	----
GAS E-4.5'	----	N.D.	N.D.	N.D.	N.D.	N.D.	----
BLANK	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.	N.D.
SPIKE RECOVERY	97.0%	88.8%	97.4%	92.2%	99.6%	90.3%	----
DUP SPIKE RECOVERY	93.9%	103.2%	84.8%	95.8%	101.8%	93.2%	----
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 E&F

ChromaLab, Inc.

David Duong
Chief Chemist

Eric Tam
Laboratory Director

2239 Omega Road, #1 • San Ramon, California 94583
415/831-1788 • Facsimile 415/831-8798
Federal ID #68-0140157

Soil Sampling Form - Waste Oil Tank Excavation

Sampler: M. Buscheck
Date: 17 January 1991
Project Number: P15
Contractor: Diablo Tank & Equipment
Project Name: Cademartori Soil Investigation/Remediation
Equipment: Backhoe - John Deere 510 B
Project Location: Cademartori Trucking Facility
1833 Peralta Street, Oakland CA

Sample Number	Sample Location	Sample Matrix	Field Organic Vapor Monitor Reading (ppm v/v)	Sample Time	Sample Depth (feet)	Sample Type	Analyses	Comments
Oil East 3.0	Oil East 3.0	Soil	1	12:30	3.0	Liner	—	Brown Med To Fine Sand Moist, No Silt
Oil East 4.0	Oil East 4.0	Soil	2	12:30	4.0	"	Oil & Grease TPH-Gasoline BTXE	Clayey Fine Sand (±40% Clay) Grey With Dark Grey Mottling
Oil South 3.0	Oil South 3.0	Soil	0	12:35	3.0	"	—	Light Brown, Fine Sand With Silt, Moist
Oil South 4.0	Oil South 4.0	Soil	0	12:40	4.0	"	Oil & Grease TPH Diesel	Grey Green Fine Sand With Silt, Moist
Oil West 3.0	Oil West 3.0	Soil	0	1245	3.0		—	Grey High Plastic Clay Moist, Med Consistency
Oil West 4.0	Oil West 4.0	Soil	0	12:50	4.0		Oil & Grease TPH-Diesel BTXE	Grey Silty Fine Sand (±15% Silt) Moist
Oil North 3.0	Oil North 3.0	Soil	2	12:55	3.0	"	—	Grey Silty Fine Sand (±15% Silt) Moist
Oil North 4.0	Oil North 4.0	Soil	0	1300	4.0	"	Oil & Grease TPH Diesel	Wet Dark Grey Fine Sand With Silt

2 of 4

Soil Sampling Form - WASTE OIL TANK EXCAVATION

Sampler: M. Buscheck
Date: 17 January 1991
Project Number: P15
Contractor: Diablo Tank & Equipment
Project Name: Cademartori Soil Investigation/Remediation
Equipment: BACKHOE - JOHN DEERE 510 B
Project Location: Cademartori Trucking Facility
1833 Peralta Street, Oakland CA

Sample Number	Sample Location	Sample Matrix	Field Organic Vapor Monitor Reading (ppm v/v)	Sample Time	Sample Depth (feet)	Sample Type	Analyses	Comments
OLNW 3.0	OIL NW 3.0	SOIL	288	1305	3.0	LINER	—	SAME AS 4.0' WITH SEAM OF DK GREY FINE SAND WITH SLIGHT PETROLEUM ODOR
OLNW 4.0	OIL NW 4.0	SOIL	1	1310	4.0	"	OIL & GREASE TPH-GASOLINE/DIESEL BTXE	GREY & DK GREY WET CLAY, HIGH PLASTICITY, MED CONSISTENCY

Soil Sampling Form - Gas/Diesel Tank Excavations

Sampler: M. Buscheck
Date: 17 January 1991
Project Number: P15
Contractor: Diablo Tank & Equipment
Project Name: Cademartori Soil Investigation/Remediation
Equipment: Backhoe - John Deere 510 B
Project Location: Cademartori Trucking Facility
1833 Peralta Street, Oakland CA

No Med Sand

Sample Number	Sample Location	Sample Matrix	Field Organic Vapor Monitor Reading (ppm v/v)	Sample Time	Sample Depth (feet)	Sample Type	Analyses	Comments
GasW 4.5	Gas W 4.5	Soil	1	15:32	4.5	Liner	TPH Diesel BTXE	Medium to Fine Sand, Some Silt Grey, Moist - Wet
GasS 3.5	Gas S 3.5	"	0	15:35	3.5	"	—	Fine Sand ± 5-15% Silt Dark Grey, Wet
GasS 4.0	Gas S 4.0	"	0	15:40	4.0	"	—	Medium to Fine Sand, Less Silt ± 5%, Wet
GasS 4.5	Gas S 4.5	"	0	15:45	4.5	"	TPH Diesel BTXE	Fine Sand ± 5-15% Silt Dark Grey Wet
GasE 3.5	Gas E 3.5	"	34	15:55	3.5	"	—	Fine Sand, Some Silt Moist, Dark Grey
GasE 4.0	Gas E 4.0	"	19	16:00	4.0	"	—	Dark Grey, Wet Fine Sand Little Silt
GasE 4.5	Gas E 4.5	"	0	16:05	4.5	"	TPH Diesel BTXE	Dark Grey, Wet Fine Sand Some Silt

Soil Sampling Form - Gas/Diesel Tank Excavation

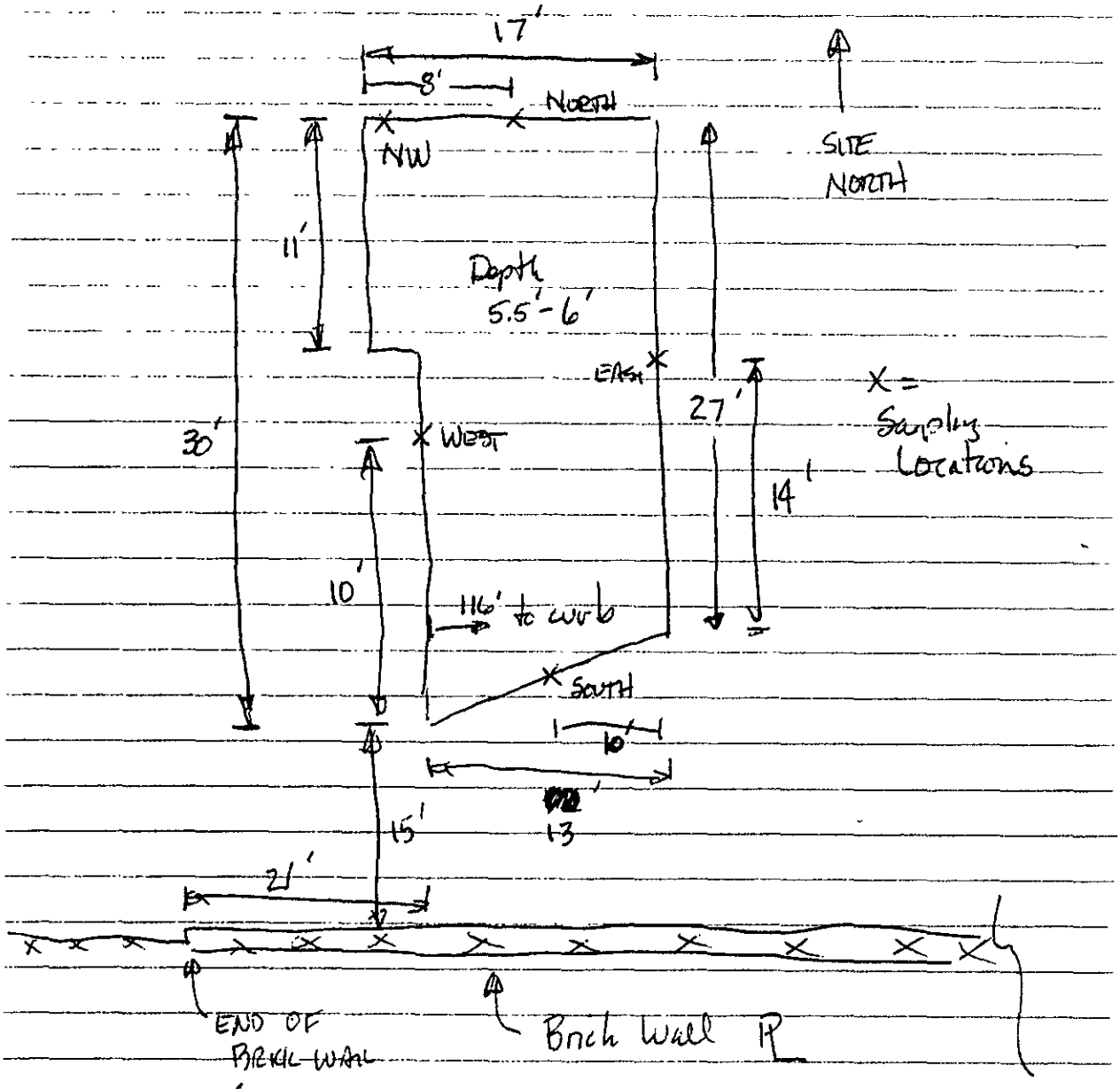
Sampler: M. Buscheck
Date: 17 January 1991
Project Number: P15
Contractor: Diablo Tank & Equipment
Project Name: Cademartori Soil Investigation/Remediation
Equipment: Backhoe - John Deere 510 B
Project Location: Cademartori Trucking Facility
1833 Peralta Street, Oakland CA

No Med Sand

Sample Number	Sample Location	Sample Matrix	Field Organic Vapor Monitor Reading (ppm v/v)	Sample Time	Sample Depth (feet)	Sample Type	Analyses	Comments
Gas NE 3.5	Gas NE 3.5	Soil	0	15:00	3.5	Liner	—	Med Sand With Silt (Very) Dark Grey, Moist
Gas NE 4.0	Gas NE 4.0	"	1	15:05	4.0	"	—	Med-Fine Sand With Silt Dark Grey, Moist-Wet
Gas NE 4.5	Gas NE 4.5	"	1	15:10	4.5	"	TPH Diesel BTXE	Med-Fine Sand With Silt Dark Grey Wet
Gas N 3.5	Gas N 3.5	"	17	15:12	3.5	"	—	Med To Fine Sand, Dk Grey With Silt (±10%) Moist
Gas N 4.0	Gas N 4.0	"	3	15:15	4.0	"	—	Grey Med To Fine Sand With Silt, Moist
Gas N 4.5	Gas N 4.5	"	3	15:20	4.5	"	TPH Diesel BTXE	Med To Fine Sand, Very Little Silt Dark Grey, Moist
Gas W 3.5	Gas W 3.5	"	0	15:25	3.5	"	—	Silty Sand ± 15% Silt Dark Grey, Moist
Gas W 4.0	Gas W 4.0	"	0	15:30	4.0	"	—	Med To Fine Sand With Silt (±10%) Dark Grey, Moist

OIL EXCAVATION

DWR
P15
17 JAN 91



Qual Ex = ± ~~75~~ 50 cyd Original Ex = ± 25 cyd Total = ± ~~100~~ 75 cyd

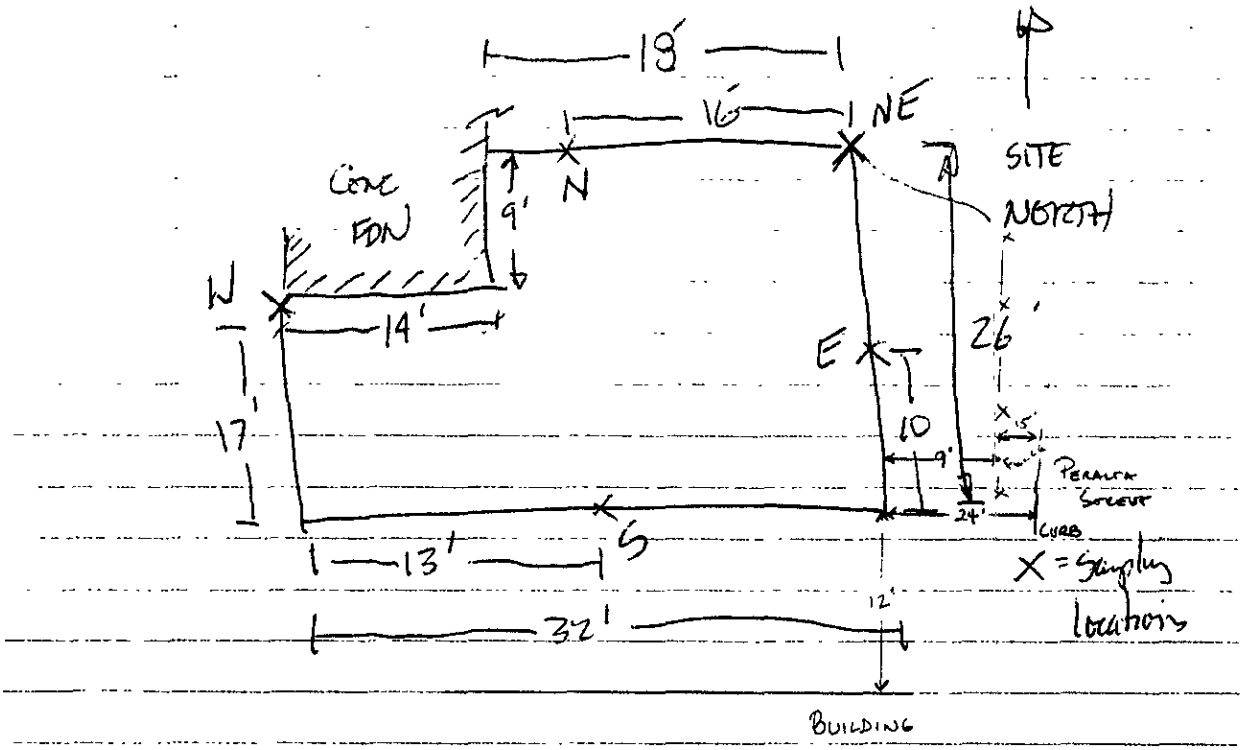
Original depth to H2O = 3'-8" from top of pavement (3'-6" from subgrade)

Dewatered by W&H, ± 3,500 gallons to 5.5'

Since tank removal – sidewalls caved back ± 2'

GAS/DIESEL

DLM
P15
17 JAN 91



Original depth to H_2O = 4'-1"

H&H Dewatered to 5', removed ± 5,000 gal

Spot measured residual H_2O ± 2' depth

Vol soil EX = ± 50cy + ± 75 pump ex = ± 125

Since tanks removed – sidewalls caved back 2'-5' (depending on location)

Some of the caved (contaminated) soil was not excavated because the excavation was not dewatered completely