Project No. S9955-05-02
September 18, 2017

Kemble Pope
Trackside Center LLC
2940 Spafford Street, Suite 202
Davis, California 95618

Subject: ENVIRONMENTAL DATA SUMMARY
TRACKSIDE CENTER
901 – 919 THIRD STREET
DAVIS, CALIFORNIA

Dear Mr. Pope:

This letter summarizes information regarding contaminant impacts in soil vapor and groundwater near your Trackside Center project at 901 – 919 Third Street (the Site) in Davis, California. We reviewed readily available information on the State Water Resources Control Board's GeoTracker online database (http://geotracker.waterboards.ca.gov) pertaining to various "release" cases near the Site to assess the potential presence of contaminants of concern in groundwater and soil vapor at the Site from offsite sources.

BACKGROUND

The Site consists of a 22,834-square-foot property that is currently developed with two multi-tenant commercial structures. The Site is planned to be redeveloped with a new four-story, mixed-use development with commercial (non-residential) use on the first floor and residential use above. Prior to development, the City of Davis, Department of Community Development and Sustainability, prepared a Sustainable Communities Environmental Assessment Initial Study (SCEA/IS) for the Site that was made available for public review and comment. The City of Davis received multiple comments regarding potential vapor intrusion and other environmental concerns such as encountering contaminated soil during construction activities. Comments were received from: Ezra Beeman, Marijean and Raymond Burdick, Richard C. Casias, Larry D. Guenther, and Rhonda Reed. This summary does not address every comment submitted to the City of Davis regarding the SCEA/IS, but is intended to address comments regarding potential contaminant impacts to groundwater and soil vapor beneath the Site.

OFFSITE FACILITIES/RELEASE CASES

We reviewed information available on GeoTracker for the following facilities with unauthorized release cases near (within 1/8 mile) the Site:

- I Street Development, 1920 I Street (SL185822944);
- Former Dry Cleaner, 302 G Street (SL185832945);
- Davis Center Project, Fifth and G Streets (SL0611328818).
- Cable Car Wash, 904 Third Street (T0611300226);
- Union Pacific Railroad – Davis Amtrak Station (SL185452916);
- JF Wilson, 203 J Street (SL161013797); and
- Davis Lumber, 240 G Street (T0611300093).

Selected figures from investigation and monitoring reports for these facilities are attached.

Site Vicinity Depth to Groundwater and Flow Direction

Site-specific information regarding groundwater occurrence and flow direction is not available, but is for several of the above-referenced facilities. The nearest facility with groundwater monitoring data is the I Street Development at 920 Third Street, located to the south across Third Street from the Site. Depth to groundwater measured in eleven groundwater monitoring wells associated with this facility averaged approximately 38 feet in February 2017 (Terraphase Engineering, 2017). The historical groundwater flow direction at this facility is reported as being south to southeast. However, groundwater monitoring data for other nearby facilities indicates that groundwater flow direction is variable, ranging from northeast to west.

I Street Development

Groundwater monitoring well MW-12 associated with the I Street Development facility is located on the southeastern boundary of the Site. Groundwater monitoring data for this well was reported in Terraphase Engineering's *First Semester 2017 Semiannual Groundwater Monitoring Report*, dated May 1, 2017. Trichloroethene (TCE) was detected in a groundwater sample from this well at a concentrations of 3 micrograms per liter (µg/L) in groundwater in September 2012. TCE was also detected in a sample from MW-11, located in Third Street south of the Site, at a concentration of 7.9 µg/L in March 2013. This concentration exceeds the current Tier 1 Environmental Screening Level[1] (ESL) for TCE in groundwater of 5.0 µg/L; however, it is less than the Tier 2 ESL for TCE for vapor intrusion risk of 170 µg/L in a conservative residential-use scenario. No other volatile organic compounds (VOCs) were detected in groundwater samples from these wells. The presence of TCE in groundwater samples from well MW-11 and MW-12 near the Site, suggests that TCE could be present in groundwater beneath the Site. However, the TCE concentrations reported for the samples from MW-11 and MW-12 suggest that if TCE is present in groundwater beneath the Site, that the concentrations would be too low for there to be a vapor intrusion to indoor air exposure risk for current or future site users.

Former Dry Cleaner – 302 G Street

A former dry cleaner at 302 G Street was approximately 225 feet west-southwest of the Site. The most recent groundwater monitoring report for this facility: *First Semi-Annual 2015 Ground-water Monitoring Report*, dated July 31, 2015, and prepared by Azure Environmental (Azure) shows that the groundwater flow direction was toward the east-southeast during the 2015 monitoring event; however, West Environmental Services & Technology, Inc. Inc. (WEST) prepared a *Remedial Action Plan*, dated December 30, 2016, that reported variations in the groundwater flow direction from northeast to west. The predominant groundwater flow direction has been reported to be towards the northeast and southeast.

WEST's *Report of Soil Gas Investigation*, dated June 28, 2007, reports historical tetrachloroethene (PCE) discharges from this facility to the sanitary sewer dating back to 1966. Passive soil gas survey results indicated that the sanitary sewer acted as a conduit for PCE along Third Street; however, the sanitary sewer flow direction is depicted in the report as westerly, away from the Site. In the same report, WEST depicts an "estimated extent of PCE in groundwater" as extending east of the former dry cleaners to near the western property boundary of the Site, but does not indicate what data this is based on.

Azure reported that PCE was detected at a concentration of 8.1 µg/L in a groundwater sample collected from MW-4 (approximately 230 feet west of the Site) in June 2013 (Azure Environmental, 2015), but that well hasn't been monitored since. Based on historical data from an offsite investigation conducted by

[1] San Francisco Bay Regional Water Quality Control Board ESLs, Rev. 3, Feb. 2016

Kennedy/Jenks Consultants in 1998 for the Cable Car Wash facility, the extent of PCE in groundwater originating from the former dry cleaner facility at 302 G Street was delineated by groundwater samples collected from borings advanced along the western boundary of the Site. Further details regarding the Cable Car Wash facility are summarized below.

Davis Center Project

The Davis Center Project is located approximately 470 feet northwest of the Site. Groundwater monitoring data for this facility indicates that this facility has historically been upgradient of the Site. TCE and PCE have been detected in groundwater samples from Davis Center Project wells upgradient of the Site. However, groundwater monitoring data from March 15, 2017 (City of Davis Public Works, 2017) shows that TCE and PCE were not detected in groundwater samples from the furthest downgradient groundwater monitoring well (MW-13) located approximately 180 feet northwest of the Site. This most recent groundwater monitoring data suggests that TCE and PCE associated with this facility do not extend to the Site.

Cable Car Wash

The Cable Car Wash facility, located approximately 200 feet south of the Site, received regulatory case closure in 2014 for a former leaking underground storage tank (UST) release. Kleinfelder, the former consultant for this project, reported gasoline and its constituents in groundwater in September 2012 (Kleinfelder, 2012). Isoconcentration maps depict total petroleum hydrocarbons as gasoline, benzene, and methyl tertiary butyl ether (MTBE) plumes in groundwater as not extending north to the Site. The groundwater flow direction at this facility was reported to be to the east, or cross-gradient relative to the Site. Available data suggests that petroleum hydrocarbons related to the Cable Car Wash UST release are most likely not present in groundwater beneath the Site.

We contacted the Regional Water Quality Control Board for additional data associated with an offsite investigation identified in reports reviewed in GeoTracker in which borings were advanced near the Site. In 1998, Kennedy/Jenks Consultants conducted an offsite soil vapor and groundwater investigation to identify possible offsite sources of contamination. Two borings (SV/GW-2 and SV/GW-3) were advanced along the western site boundary, one boring (SV-5) at the northeastern corner of the Site, and one boring (SV/GW-6) near the southeastern corner of the Site. Laboratory analysis of groundwater samples collected from these borings did not detect PCE and TCE at concentrations exceeding laboratory detection limits. Analysis of soil vapor samples collected from boring SV-5 detected PCE at concentrations of 1.7 µg/L in a sample from a depth of 7 feet and 1.3 µg/L in a sample from a depth of 20 feet. The reported soil vapor concentrations do not exceed the current commercial/industrial ESL for PCE in soil vapor of 2.1 µg/L. PCE and TCE were not detected in samples collected from the three other borings along the site boundary. In addition, PCE and TCE were not detected in groundwater samples collected from borings along the western and southeastern site boundaries. A groundwater sample was not collected from the boring (SV-5) located near the northeastern corner of the Site.

Union Pacific Railroad

This facility is located approximately 250 feet south of the Site. During the most recent monitoring event a maximum TCE concentration of 0.26 µg/L was reported for a groundwater sample collected from well DAS-07 approximately 350 feet south of the Site and a maximum PCE concentration of 2.5 µg/L was reported for a sample from well DAS-06 (adjacent to DAS-07) (Antea Group, 2017). Groundwater flow direction at this facility is reported as being to the southwest. Based on the groundwater flow direction, it is unlikely that TCE or PCE related to this facility are impacting groundwater beneath the Site.

In 1995, a soil vapor boring (VP-3) was advanced between the Site and the UPRR facility along the south side of Third Street. TCE was detected in a soil vapor sample from a depth of 38 feet from this boring at a concentration of 12.30 µg/L and was not detected in a sample from a depth of 11 feet, indicating that soil vapor below the Site is likely not being impacted by TCE.

JF Wilson – 203 J Street

The former JF Wilson facility is located approximately 600 feet southeast of the Site. Limited data is available on GeoTracker and the facility's potential impact to the Site could not be determined. A work plan prepared in September 2006 for the facility reported that VOCs including TCE were present in soil and groundwater beneath the facility at elevated concentrations (EnviroForensics, 2006). The work plan also contains a rose diagram figure depicting the predominant groundwater gradient direction as being to the northwest at the facility. Based on the location of this facility relative to the Site, contaminants migrating from the facility may be commingling with contaminants in groundwater from the I Street Development and Union Pacific Railroad facilities to the northwest of the former JF Wilson facility, but there is no data indicating that this contamination would extend to the Site.

Davis Lumber – 240 G Street

The Davis Lumber leaking underground storage tank facility located at 240 G Street is approximately 150 feet southwest of the Site. No data for this facility is available on GeoTracker as this facility's regulatory case was closed in 1989.

Conclusion

Available information on GeoTracker for facilities surrounding the Site suggests that TCE from the nearby I Street Development may be present in groundwater near or beneath the Site. However, the available data suggests if these contaminants are present in groundwater beneath the Site, that their concentrations would likely not be high enough to cause an unacceptable health risk to current or future site users from potential soil vapor intrusion to indoor air. Additionally, PCE concentrations reported for soil vapor samples collected in 1998 near the northeastern site boundary do not exceed the current commercial/industrial ESL for PCE in soil vapor of 2.1 µg/L. The source of the PCE reported for that soil vapor sample is unknown as available groundwater data do not indicate PCE in groundwater extending beneath the Site.

Public comments on the SCEA/IS expressed concern for petroleum odors in near-surface fill material recorded in a geotechnical boring log from a boring advanced by Geocon in 2014. Geocon recommends preparing a Soil Management Plan describing procedures to assess and handle contaminant-impacted soil in the event that it is encountered during construction.

We appreciate the opportunity to assist you on this project. Please let us know if you have questions regarding this review summary or if we can be of further service.

Sincerely,

GEOCON CONSULTANTS, INC.

Trevor Hartwell, PG
Project Geologist

Jim Brake, PG
Senior Geologist

Attachment: Offsite Facility Figures

REFERENCES

Antea Group, *Annual Monitoring Report – 2017, Union Pacific Railroad, Wye VOC Site, Davis, California, Central Valley Regional Water Quality Control Board Case No. SL18542916,* June 15, 2017.

Azure Environmental, *First Semi-Annual 2015 Ground-Water Monitoring Report, Davis Enterprise Facility, 302 G Street, Davis, California,* July 31, 2015.

California State Water Resources Board. GeoTracker, August 2017. <http://geotracker.swrcb.ca.gov/>.

City of Davis Public Works, email to Regional Water Quality Control Board, June 1, 2017, accessed on GeoTracker, August 2017.

EnviroForensics, *Revised Workplan for Additional Groundwater and Soil Gas Investigation, 203 "J" Street, Davis, California 95616, (CVRWQCB SLIC No. 1096),* September 29, 2006.

Kennedy/Jenks Consultants, *Additional Investigation Report, Cable Car Wash Site, 904 Third Street, Davis, California*, June 25, 1998.

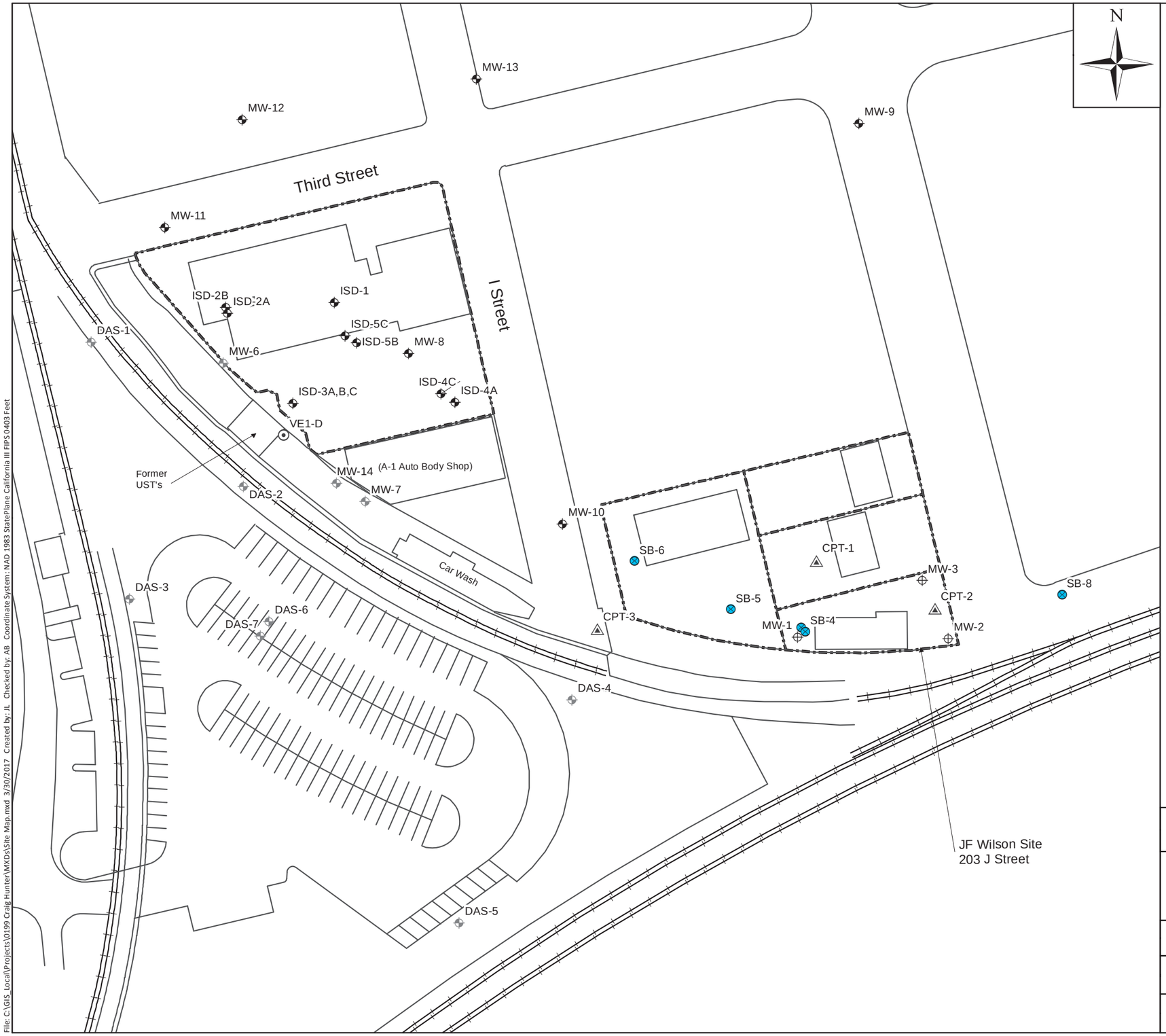
Kennedy/Jenks Consultants, *Fourth Quarter 2006 Groundwater Monitoring Report*, Fifth and G Streets, Davis, California, November 17, 2006.

Kleinfelder, *Second Semi-Annual 2012 Groundwater Monitoring Report, Cable Car Wash, 904 Third Street, Davis, California*, November 6, 2012.

Terraphase Engineering, Inc., *First Semester Semiannual Groundwater Monitoring Report, I Street Development Site, 920 3rd Street, Davis, California,* May 1, 2017.

West Environmental Services & Technology, Inc, *Report of Soil Gas Investigation, 302 G Street, Davis, California*, June 28, 2007.

West Environmental Services & Technology, Inc, *Remedial Action Plan, 302 G Street, Davis, California, Water Board Case #SL185832945*, December 28, 2016.



Legend

I Street Development Site:

- MRP Groundwater Monitoring Well Location
- Vapor Well Location

Union Pacific Railroad Site:

- Additional Groundwater Monitoring Well Location

Former JF Wilson Site:

- CPT Boring Location. Groundwater Collected 12/28/07
- Soil Boring Location. Groundwater Collected 6/27/2007
- Monitoring Well Location. Groundwater Collected 7/2/03

Approximate Site Boundary

DRAFT

SAFETY FIRST

terraphase engineering

0 40 80 120 160 Feet

1 inch = 80 feet

CLIENT: Craig Hunter	**Site Layout**
PROJECT: I Street Development Site 920 3rd Street, Davis, CA	
PROJECT NUMBER: 0199.001.003	**FIGURE 2**

File: C:\GIS_Local\Projects\0199 Craig Hunter\MXDs\Site Map.mxd 3/30/2017 Created by: JL Checked by: AB Coordinate System: NAD 1983 StatePlane California III FIPS 0403 Feet

F STREET

G STREET

3RD STREET

DAVIS ENTERPRISE
(Administrative)

Alley

RESTAURANT

RETAIL
SHOP

RETAIL
SHOP

DAVIS
LUMBER

ACE
HARDWARE

Parking

Railroad Tracks

302

Former
Dry Cleaner
Building

Sanitary
Sewer Line

Nitrates iso-contour (mg/l)

PCE iso-contour (µg/sampler)

Estimated Extent of PCE in Groundwater (0.5 µg/l)
(Azure, 2007)

P-1 11/10/06 <0.02	P-2 11/10/06 <0.02	P-3 11/10/06 <0.02	P-4 11/10/06 <0.02	P-5 11/10/06 <0.02	P-6 11/10/06 0.108	P-7 11/10/06 0.669	P-8 11/10/06 0.722	P-9 11/10/06 2.982	P-10 11/10/06 0.702	P-11 11/10/06 14.736	P-12 11/10/06 2.052	P-13 11/10/06 0.676	P-14 11/10/06 0.436	P-15 11/10/06 0.573	P-16 11/10/06 0.028	P-17 11/10/06 0.042	P-18 11/10/06 <0.02	P-19 11/10/06 0.047	P-19 11/10/06 0.367	P-20	P-21 11/10/06 0.401	P-22 11/10/06 0.391	P-23 11/10/06 0.32	P-24 11/10/06 0.111

MW-1 9/02 94	MW-2 9/02 130	MW-3 9/02 110	DAS-01 9/02 14.1	DAS-06 9/02 0.986	SV/GW-11	SV/GW-12	MW-1D	MW-1	MW-4	CPT-3,4,6	CPT-2	CPT-4	CPT-5	HP-1	HP-2	HP-3	HP-4	HP-5	HP-6	HP-7	HP-8	SB-1	SB-2	1:0

1:0 (By purge water)

0.1

100

0 FEET 50

EXPLANATION

P-1 Sample ID
11/10/06 Date
<0.02 PCE (µg/sampler)

MW-3 Sample ID
9/02 Date
110 Nitrates (mg/l)

- Passive soil gas sample location (11/06)
- 0.1 PCE iso-contour (µg/sampler) (Soil gas)
- 100 Nitrates iso-contour (mg/l) (Groundwater)
- Shallow-zone monitoring well (sampled 3/06)
- Deep-zone monitoring well (sampled 3/06)
- Soil sample location (4/00)
- Soil/groundwater grab sample location (4/99 & 4/00)
- Monitoring well (ERM, 2002)
- CPT deep groundwater grab sample location
- Groundwater grab sample location (4/98)
- Sewer line, manhole and flow direction

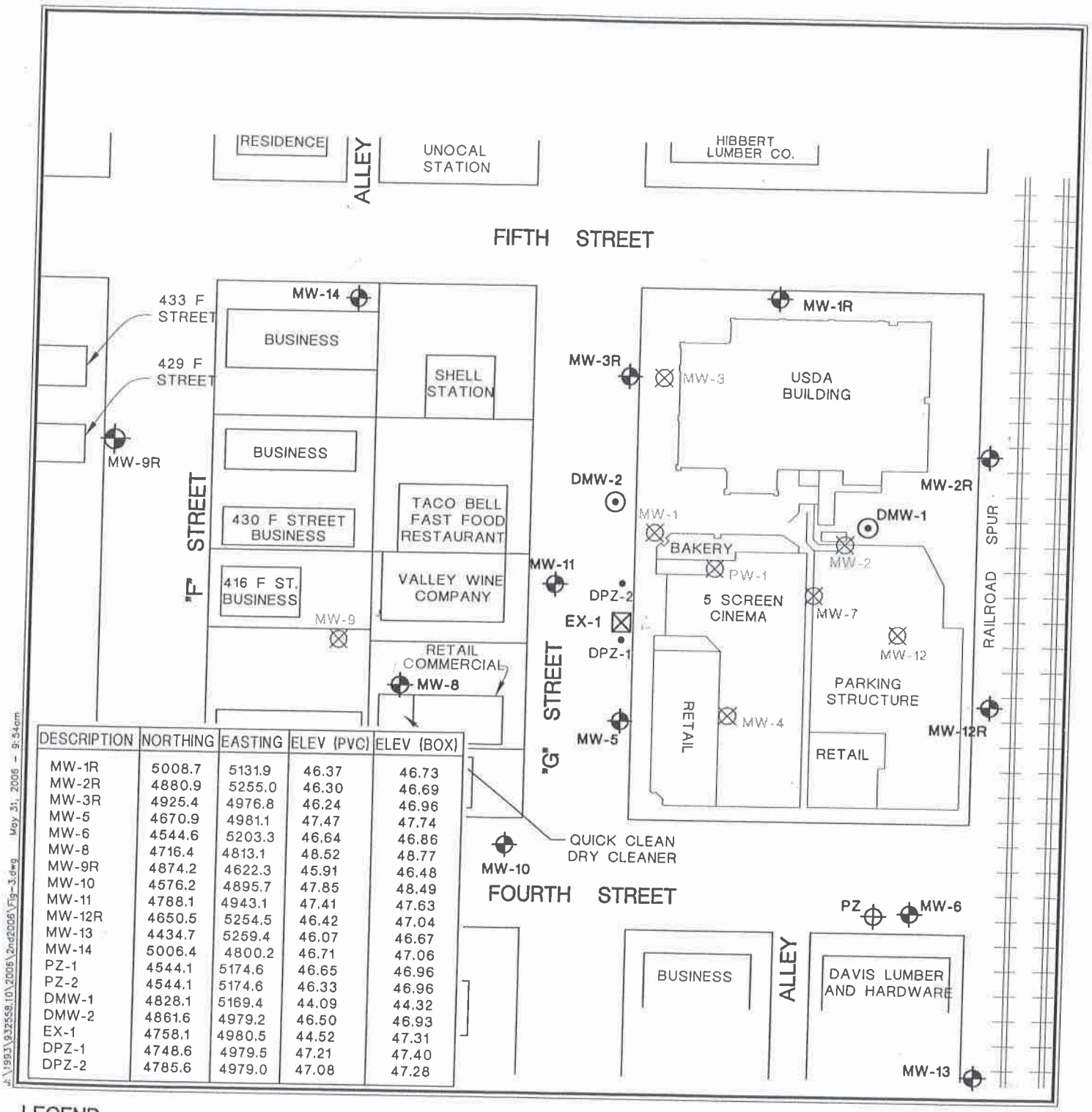
SUMMARY OF PASSIVE SOIL GAS ANALYTICAL RESULTS

302 G Street - Davis, California

WEST Environmental Services & Technology

Figure 3-1

June 2007



DESCRIPTION	NORTHING	EASTING	ELEV (PVC)	ELEV (BOX)
MW-1R	5008.7	5131.9	46.37	46.73
MW-2R	4880.9	5255.0	46.30	46.69
MW-3R	4925.4	4976.8	46.24	46.96
MW-5	4670.9	4981.1	47.47	47.74
MW-6	4544.6	5203.3	46.64	46.86
MW-8	4716.4	4813.1	48.52	48.77
MW-9R	4874.2	4622.3	45.91	46.48
MW-10	4576.2	4895.7	47.85	48.49
MW-11	4788.1	4943.1	47.41	47.63
MW-12R	4650.5	5254.5	46.42	47.04
MW-13	4434.7	5259.4	46.07	46.67
MW-14	5006.4	4800.2	46.71	47.06
PZ-1	4544.1	5174.6	46.65	46.96
PZ-2	4544.1	5174.6	46.33	46.96
DMW-1	4828.1	5169.4	44.09	44.32
DMW-2	4861.6	4979.2	46.50	46.93
EX-1	4758.1	4980.5	44.52	47.31
DPZ-1	4748.6	4979.5	47.21	47.40
DPZ-2	4785.6	4979.0	47.08	47.28

J:\1993\932558.10\2006\2nd2006\Fig-3.dwg May 31, 2006 - 9:54am

LEGEND

- EX1 ⊠ SHALLOW EXTRACTION WELL LOCATION
- DPZ-1 • DRAWDOWN PIEZOMETER LOCATION
- MW-5 ⊕ SHALLOW MONITORING WELL LOCATION
- DMW-1 ⊙ DEEP MONITORING WELL LOCATION
- PZ ⊕ NESTED PIEZOMETER LOCATION (PZ-1/PZ-2)
- ⊗ PREVIOUS SHALLOW MONITORING WELL LOCATION (ABANDONED JULY 1997 AND JUNE 2002)

NOTE: LOCATIONS ARE APPROXIMATE

N

0 50 100

APPROX. SCALE IN FEET

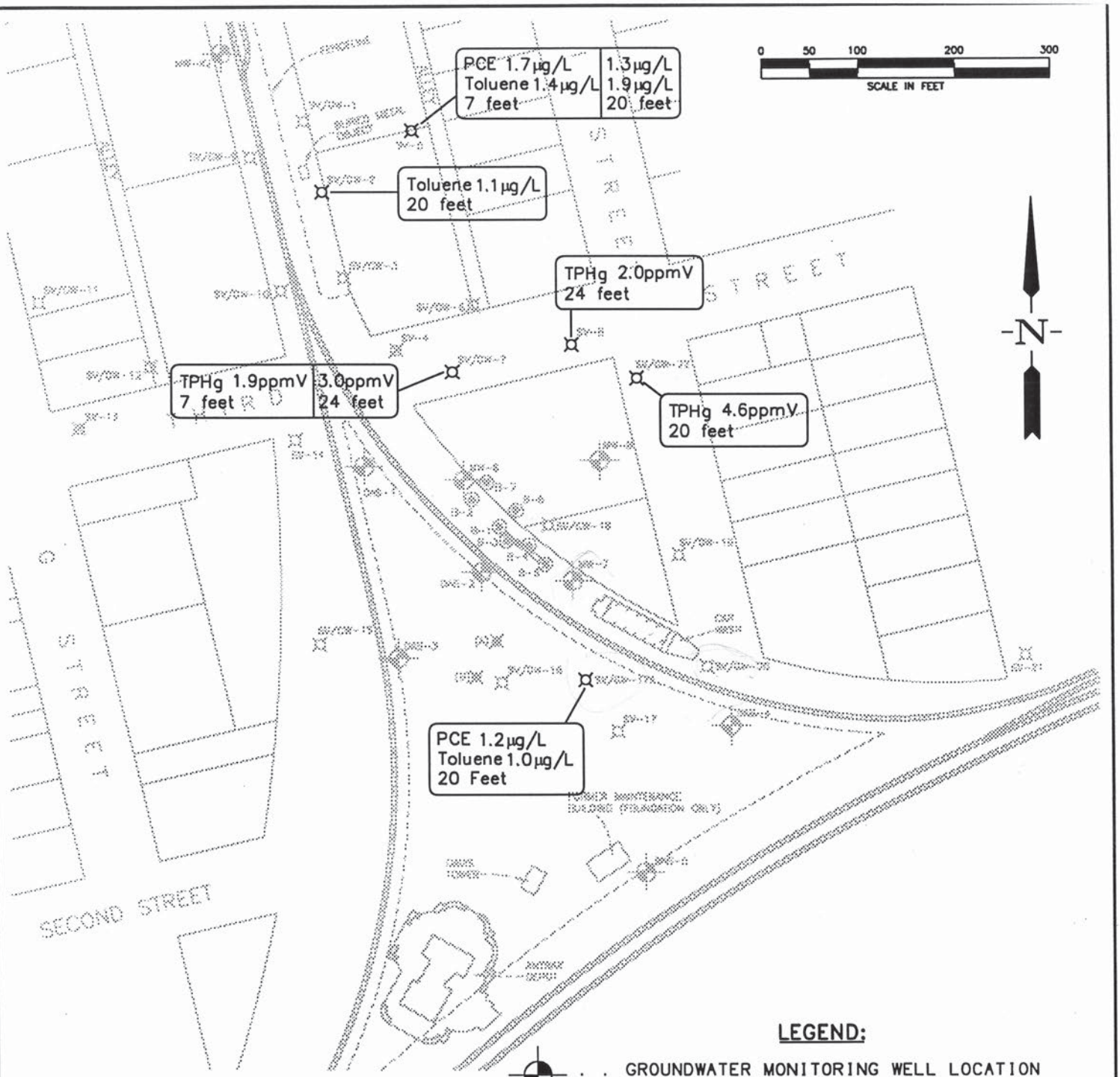
Kennedy/Jenks Consultants

CITY OF DAVIS
QUARTERLY GROUNDWATER MONITORING REPORT

GROUNDWATER WELL LOCATIONS

K/J 932558.10

FIGURE 3



LEGEND:

MW-3 . . GROUNDWATER MONITORING WELL LOCATION AND NUMBER. MW PREFIX INDICATES A CABLE CAR WASH WELL; DAS PREFIX INDICATES A UPRR-INSTALLED CITY WELL.

SV-8 . . SOIL VAPOR BORING LOCATION AND NUMBER SV PREFIX INDICATES ONLY A SOIL VAPOR SAMPLE WAS TAKEN; SV/GW PREFIX INDICATES A SOIL VAPOR AND GROUNDWATER SAMPLE WAS TAKEN. SAMPLE DATE APRIL, 1988.

B-5 . . SECOR PSA-SOIL BORING

. . RAILROAD TRACKS

. . APPROXIMATE CITY PARCEL PROPERTY BOUNDARY

. . ABANDONED MUNICIPAL WELL (A)(1997)

SV-4 . . SOIL VAPOR BORING NOT INSTALLED

LABORATORY ANALYTICAL RESULTS

PCE Tetrachloroethene (µg/L)

TPHg Total Petroleum Hydrocarbons as gasoline (ppmV)

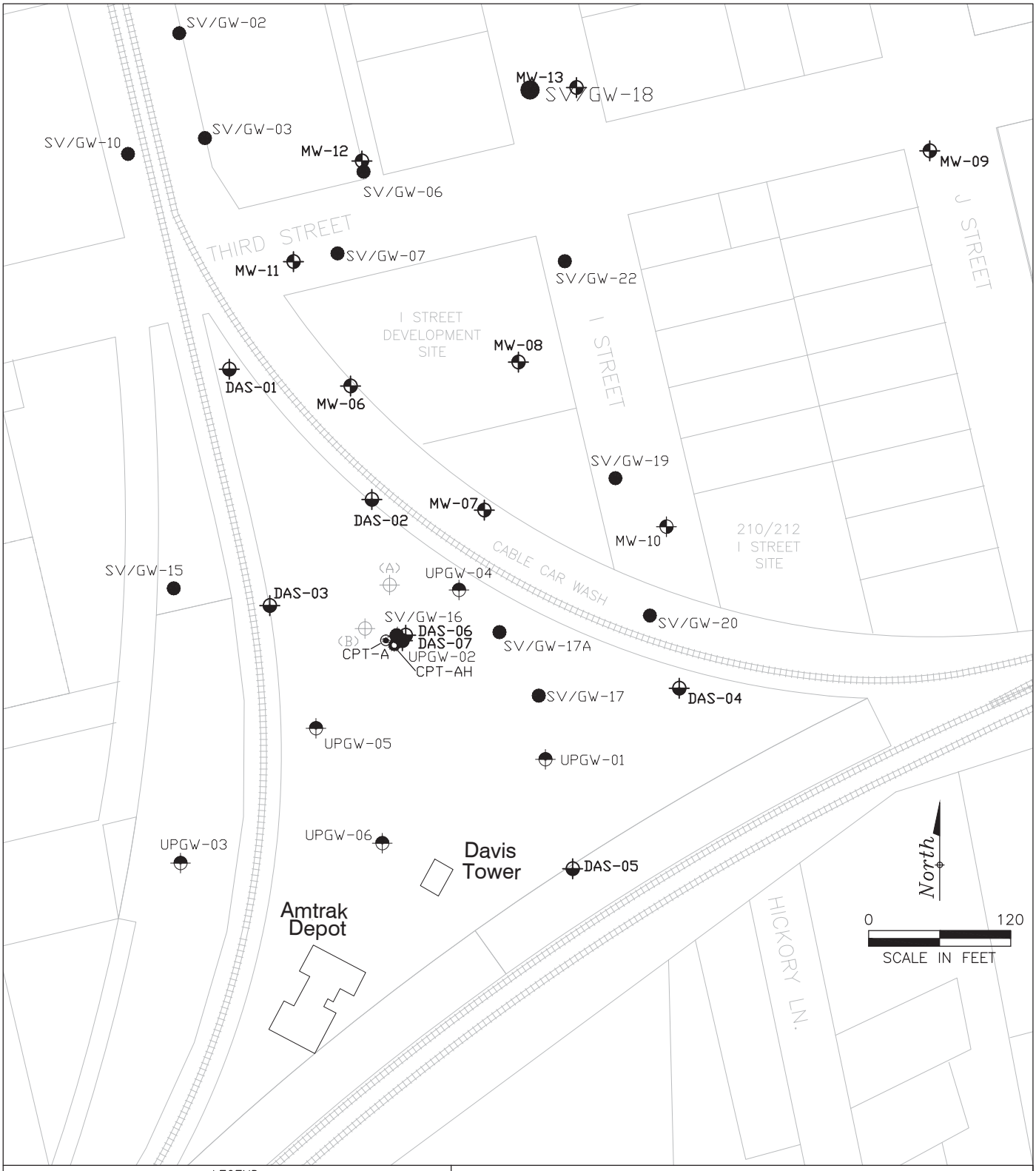
PCE 1.7µg/L
7 feet

Reported Soil Vapor Result

Measured Depth of Vapor Sample Collected in April 1998

Only Detected Chemicals of Concern are Illustrated. All Results are Provided in Table 2.

Chaney, Walton & McCall (LLC)	REPORTED SOIL VAPOR SURVEY LABORATORY ANALYTICAL RESULTS, APRIL 1998, CABLE CAR WASH SITE	FIGURE 6



LEGEND

DAS-1	MONITORING WELL, UNION PACIFIC
MW-7	MONITORING WELL, NON-UNION PACIFIC
UPGW-04	DECEMBER 1999, UNION PACIFIC SOIL BORING LOCATION
SV/GW-22	GROUNDWATER SAMPLING LOCATION, NON-UNION PACIFIC BORING
(A)	MUNICIPAL WELL, ABANDONED
CPT-A	CPT BORING
CPT-AH	HYDROPUNCH BORING

FIGURE 2
SITE PLAN

DAVIS WYE TRACK SITE

DAVIS, CALIFORNIA

PROJECT NO.	PREPARED BY	DRAWN BY
UPR8209	NP	JH
DATE	REVIEWED BY	FILE NAME
5/7/12	LH	UPR8209CA

anteagroup