

Chan, Barney, Env. Health

02733

From: Dai Watkins [daiw@sanjoco.com]
Sent: Sunday, November 21, 2004 12:07 PM
To: Chan, Barney, Env. Health; xinggang_tong@urscorp.com
Cc: Peter Schellinger; Brooke SJC
Subject: Oak Walk Site Emeryville - Environmental Data Update
Attachments: OakWalkSiteCharData.xls; Fig 0X Bor & MW Loc 11_04.pdf

Attached is the updated environmental data spreadsheet workbook for the Oak Walk project site in Emeryville together with an updated site plan. Please replace your earlier editions with these

Xinggang:

The changes are new wells MWT-11 through 14. These were installed at the behest of Emeryville City Council some of whose members must have just obtained State of California Registrations as Professional Engineers. It must be so since they now are making engineering decisions about our Oak Walk Site Characterization program and it would of course be illegal for them to practice engineering without a license. Wouldn't it? ;)

The results from MWT-11 through MWT-14 add nothing useful, except to give me a warm feeling that even at the ripe old age of nearly 60 years (but having practiced geotechnical for only 45 years) that I may by now have some limited understanding of hydrogeology and contaminant transport. They add little to our understanding of site conditions because they simply confirm what was obvious from the data from 18 wells, 8 borings and 8 exploratory trenches that we already had we on the site from our extensive site characterization program, for which you already have our data spreadsheets, i.e. that soil and groundwater in the subsurface beneath residential lots that front onto 41st. Street is affected by petroleum hydrocarbons (solvents with the characteristics of paint thinners) that were released to the east beyond Adeline St at one or both of the paint manufacturing facilities formerly located there. As was also self evident from the previously available data, the concentrations of solvents beneath those residential sites exceeds the Environmental Screening Levels (ESLs) established for residential sites by the RWQCB.

(Oops - I called myself a geotechnical engineer. I understand that since I got my REA II license a few years ago I am now supposed to call myself an Environmental Scientist - except on Wednesdays when I am a hydrogeologist. May be before that day comes when I forget to oil my slide rule and pass from this realm I, will be able to call myself once again, what I am, a Civil Engineer and guys like you and I can practice engineering because we have a license to do so without being second guessed by clerks and politicians, all of whom seem to be convinced that water runs up hill. ;-(

Barney:

The well logs for MW-11 through MW-14 exhibit the soils sands and gravelly sands that are typical of areas down gradient from the Frank Dunn site that are affected by high concentrations of volatile petroleum hydrocarbons (not containing BTEX compounds) and Mineral Spirits range semi-volatile compounds.

Do you have a log and any chemical data from Clayton's Boring OB-9? If so that would help us with development of "net sand" maps that might yield a better understanding of the distribution of high permeability channels in the neighborhood.

Please feel free to let Clayton, or anyone else the data would help, have any or all of the attached information as you see fit.

Dai

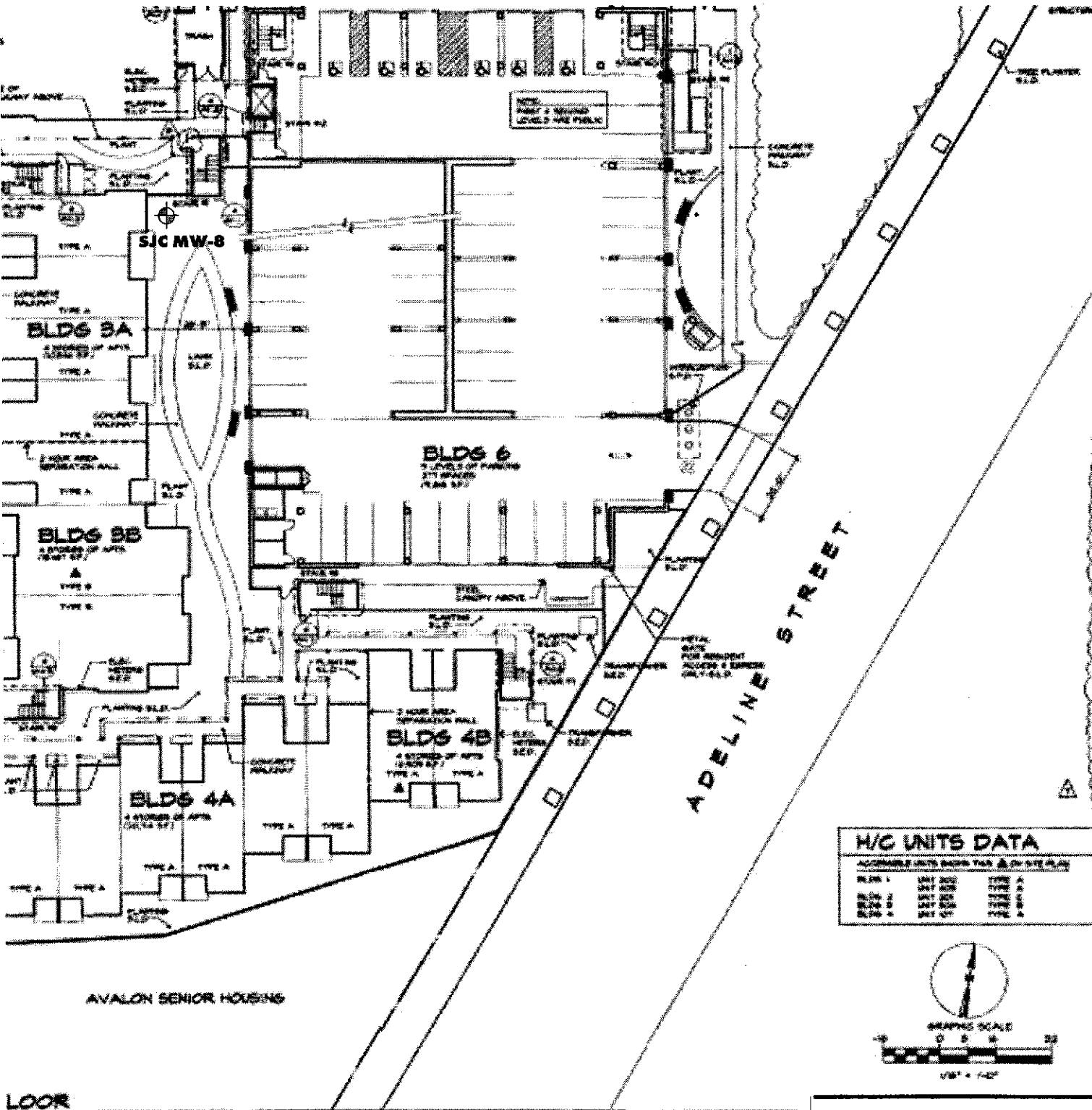
4/22/2005



**ANDANTE
EMERYVILLE**
102 UNIT MIXED USE COMMUNITY



SITE PLAN
FIRST FL.



SITE DATA

TOTAL SITE AREA: 102 AC ±
 BUILDING FOOTPRINTS: 48,000 SF ±
 SITE COVERAGE: 47% ±

UNIT DATA

UNIT TYPE	REQUIREMENTS	AREA	QUANTITY	TOTAL AREA
A	2 BDR, 2 BA, 2 ST	1,200 SF	20	24,000 SF
B	2 BDR, 2 BA, 1.5 ST	1,000 SF	20	20,000 SF
B1	2 BDR, 2 BA, 1.5 ST	1,000 SF	5	5,000 SF
B2	2 BDR, 2 BA, 1.5 ST	1,000 SF	5	5,000 SF
B3	2 BDR, 2 BA, 1.5 ST	1,000 SF	5	5,000 SF
TOTALS			70	64,000 SF

PARKING DATA

REQUIRED PARKING:	SPACES
RESIDENTIAL PARKING:	48 SPACES
VISITOR SPACES:	20 SPACES
OFFICE SPACES:	20 SPACES
RESTAURANT SPACES:	20 SPACES
PUBLIC REQUIRED:	20 SPACES
TOTAL REQUIRED:	128 SPACES (12 AC)
SPACES PROVIDED:	128 SPACES
RESIDENTIAL SPACES:	48 SPACES
PUBLIC SPACES:	20 SPACES
OFFICE PROVIDED:	20 SPACES (2 AC)
BICYCLE PARKING:	40 PER CITY REQUIREMENTS
ELECTRIC CAR CHARGES:	20

H/C UNITS DATA

ACCESSIBLE UNITS SHOWN IN PLAN & ON SITE PLAN

PLAN	UNIT	TYPE	TYPE
BLDG 1	UNIT 202	TYPE A	
BLDG 1	UNIT 205	TYPE A	
BLDG 2	UNIT 201	TYPE B	
BLDG 4	UNIT 101	TYPE A	

- PAVEMENT REQUIREMENTS**
- REFER TO LANDSCAPE ARCHITECTURE PLAN SHEET C-10 FOR EXISTING ELEVATIONS & APPROPRIATE
- PAVEMENT SHALL CONFORM TO THE FOLLOWING
 - PAVEMENT SHALL BE 4" THICK
 - PAVEMENT SHALL BE 6" THICK
 - GRADES SHALL NOT EXCEED 2% GRADE
 - PAVEMENT SHALL BE 4" THICK
 - CONCRETE SHALL BE 4000 PSI
 - CONCRETE SHALL BE 4000 PSI
 - CONCRETE SHALL BE 4000 PSI

NOTES

REFER TO CIVIL, SHADING PLAN SHEET C-10 AND LANDSCAPE ARCHITECTURE PLAN SHEET C-10 FOR ALL FLOOR AND SITE ELEVATIONS

AVALON SENIOR HOUSING

LOOR

TABLE 1
GROUNDWATER ELEVATION DATA for well **SJC-MW-8**

Date Measured	Casing Elevation ft. MSL	Depth to GW ft.	GW Elevation ft.
09/08/04	42.58	5.69	36.89
12/09/04		3.90	38.68

Note: All elevations in feet relative to mean sea level (MSL).

TABLE 2
RESULTS OF ANALYSES OF SOIL SAMPLES for well **SJC-MW-8**

Sample ID	Sample Location	Date Sampled	Depth BGS ft.	Gasoline mg/Kg	Diesel mg/Kg	Mineral Spirits mg/Kg	Benzene mg/Kg	Toluene mg/Kg	Ethyl benzene mg/Kg	Total Xylenes mg/Kg	TBA mg/Kg	MTBE mg/Kg	DIPE mg/Kg	ETBE mg/Kg	TAME mg/Kg
SJCMW8-6.5	SJC-MW8	08-20-04	6.5	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
SJCMW8-11.0		08-20-04	11.0	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
SJCMW8-16.0		08-20-04	16.0	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
SJCMW8-20.5		08-20-04	20.5	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
SJCMW8-24.0		08-20-04	24.0	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND

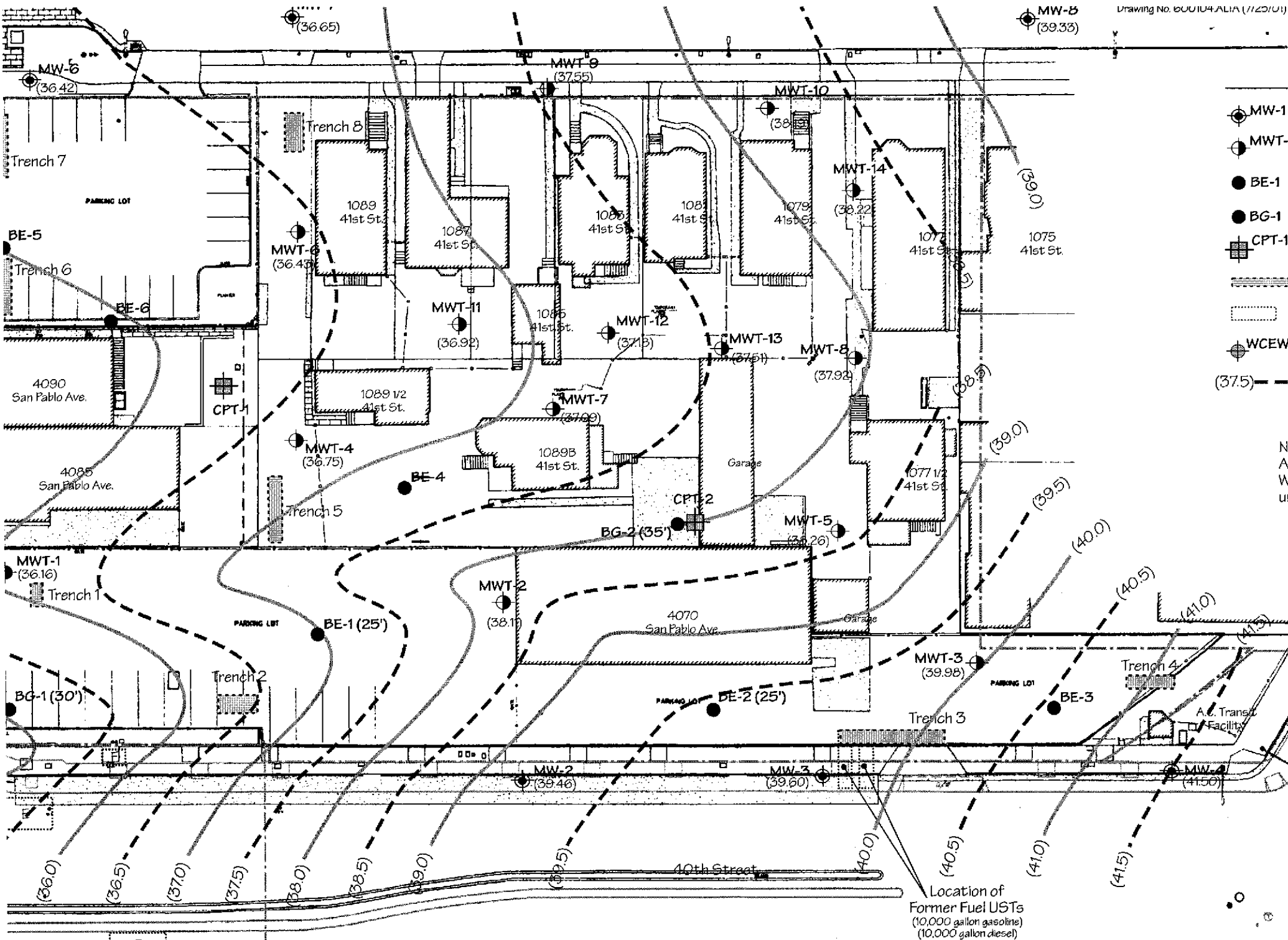
Note: ND = Not Detected above the Method Detection Limit (MDL).

TABLE 3
GROUNDWATER QUALITY DATA for well **SJC-MW-8**

Date	Gasoline $\mu\text{g/L}$	Diesel $\mu\text{g/L}$	Mineral Spirits $\mu\text{g/L}$	Benzene $\mu\text{g/L}$	Toluene $\mu\text{g/L}$	Ethyl benzene $\mu\text{g/L}$	Total Xylenes $\mu\text{g/L}$	TBA $\mu\text{g/L}$	MTBE $\mu\text{g/L}$	DIPE $\mu\text{g/L}$	ETBE $\mu\text{g/L}$	TAME $\mu\text{g/L}$
09/08/04	60	ND	ND	ND	ND	ND	ND	ND	26	ND	ND	n/a
12/09/04	100	53*	ND	2.8	ND	ND	ND	0.91	26	ND	ND	n/a

* Laboratory reports that hydrocarbon in sample is an unknown hydrocarbon in the diesel range.

Note: ND = Not Detected above the Method Detection Limit (MDL).



- MW-1
- MWT-
- BE-1
- BG-1
- CPT-1
- (37.5) ---
- ⊕ WCEW

N
A
W
U

Location of
Former Fuel USTs
(10,000 gallon gasoline)
(10,000 gallon diesel)

TABLE 5

DEPTHS TO GROUNDWATER AT OAK WALK DEVELOPMENT SITE

Well No.	Date Measured	Casing Elevation ft. MSL	Groundwater Depth ft.	Groundwater Elevation ft. MSL
WCEW-1	05/19/04	41.73	7.88	33.85
	11/08/04		7.13	34.60
MW-2	05/19/04	44.40	5.98	38.42
	11/08/04		4.94	39.46
MW-3	05/19/04	45.49	5.66	39.83
	11/08/04		5.89	39.60
MW-4	05/19/04	47.31	6.19	41.12
	11/08/04		5.81	41.50
MW-5	05/19/04	42.51	7.39	35.12
	11/08/04		7.09	35.42
MW-6	05/19/04	43.35	7.16	36.19
	11/08/04		6.93	36.42
MW-7	05/19/04	44.75	8.40	36.35
	11/08/04		8.10	36.65
MW-8	05/19/04	48.38	9.65	38.73
	11/08/04		9.05	39.33
MWT-1	05/19/04	42.98	8.43	34.55
	11/08/04		6.82	36.16
MWT-2	05/19/04	45.28	7.69	37.59
	11/08/04		7.17	38.11
MWT-3	05/19/04	47.64	7.64	40.00
	11/08/04		7.66	39.98

Well No.	Date Measured	Casing Elevation ft. MSL	Groundwater Depth ft.	Groundwater Elevation ft. MSL
MWT-4	05/19/04	44.74	8.43	36.31
	11/08/04		7.99	36.75
MWT-5	05/19/04	47.10	9.07	38.03
	11/08/04		8.84	38.26
MWT-6	05/19/04	45.21	9.05	36.16
	11/08/04		8.73	36.48
MWT-7 ¹	05/19/04	46.61	9.90	36.71
	11/08/04	45.69	8.60	37.09
MWT-8	05/19/04	47.23	9.65	37.58
	11/08/04		9.31	37.92
MWT-9	05/19/04	45.78	8.70	37.08
	11/08/04		8.23	37.55
MWT-10	05/19/04	47.22	9.53	37.69
	11/08/04		9.03	38.19
MWT-11	11/08/04	46.63	9.71	36.92
MWT-12	11/08/04	47.97	10.79	37.18
MWT-13	11/08/04	48.16	10.65	37.51
MWT-14	11/08/04	47.85	9.63	38.22

Notes:

1) MWT-7 casing truncated by vandals. Elevation resurveyed on 11/10/04