Stantec Consulting Services, Inc.
12034 134th Court NE, Suite 102
Redmond, Washington 98052
Tel: (425) 298-1000
Fax: (425) 298-1019

DATE: June 7, 2013

7-ELEVEN, INC. ANNUAL REPORT

Store No.: 25983 Address:	3541 Martin Way East, Olympia, WA
7-Eleven Environmental Manager:	Mr. Jose Rios
Consultant/Contact Person:	Stantec Consulting Services, Inc. (Stantec)/Mr. Paul Fairbairn
Stantec Project Number:	185750040
Primary Agency/ Cleanup Site ID.:	Washington State Department of Ecology, SWRO/5366
Contact:	Ms. Patty Martin
Facility Site ID:	5465157

WORK PERFORMED THIS YEAR [Annual Event - 2013]:
Conducted the annual 2013 groundwater monitoring event and prepared this status report. Groundwater monitoring activities were conducted on January 18, 2013. Groundwater samples were collected from wells MW-1, MW-2, MW-4 and MW-5. Well MW-3 was damaged and therefore not sampled.

WORK PROPOSED NEXT YEAR [Annual Event - 2014]:
Perform the annual groundwater monitoring event for 2014 and prepare a status report.

Current phase of project:	Groundwater Assessment
Frequency of sampling:	Annual
Frequency of monitoring:	Annual
Are liquid phase hydrocarbons (LPH) present on-site:	No
Cumulative LPH recovered to date:	None
LPH recovered this quarter:	None
Bulk soil removed to date:	None
Bulk soil removed this quarter:	None
Water wells or surface waters w/in a 2000 foot radius and their respective direction:	Woodard Creek, approximately 2,000 feet west of site
Current remediation techniques:	None
Permits for discharge:	None
Approximate depth to groundwater	24.32 to 26.00 feet below top of casing (TOC)
Groundwater gradient:	West-northwest
	0.019 vertical feet per horizontal foot (ft/ft)

DISCUSSION: The depth to groundwater measured on January 18, 2013 ranged between 24.32 feet below top of casing (TOC) in MW-4 to 26.00 feet below TOC in MW-5. For this monitoring event, groundwater beneath the site flowed to the northwest at an average hydraulic gradient of approximately 0.019 ft/ft. Historical monitoring data indicates variable flow directions and gradients beneath the site. For this sampling event, monitoring wells MW-1, MW-2, MW-4 and MW-5 were purged and sampled in accordance with the attached procedures.

Analytical results for this groundwater monitoring event include the following:

- Dissolved petroleum hydrocarbons were not detected exceeding laboratory practical quantitation limits (PQLs) or their respective Washington Department of Ecology, Model Toxics Control Act (MTCA) Method A Cleanup Levels (CULs) in all wells sampled.

As shown in Graphs 1 and 2, dissolved petroleum hydrocarbon concentrations in source-area well MW-4 have attenuated to levels below laboratory PQLs. Petroleum hydrocarbon concentrations have not been detected above their respective MTCA Method A CULs in historically impacted and down-gradient wells MW-4 and MW-5 for the past eight consecutive sampling events. However, results of a 2009 subsurface investigation indicated petroleum hydrocarbon concentrations exceeded MTCA Method A CULs in the soils west of the underground storage tanks. Based on these results, Stantec recommends continuing annual groundwater sampling.

LIMITATIONS AND CERTIFICATIONS

This report was prepared in accordance with the scope of work outlined in Stantec's contract and with generally accepted professional engineering and environmental consulting practices existing at the time this report was prepared and applicable to the location of the site. It was prepared for the exclusive use of 7-Eleven for the express purpose stated above. Any re-use of this report for a different purpose or by others not identified above shall be at the user's sole risk without liability to Stantec. To the extent that this report is based on information provided to Stantec by third parties, Stantec may have made efforts to verify this third party information, but Stantec cannot guarantee the completeness or accuracy of this information. The opinions expressed and data collected are based on the conditions of the site existing at the time of the field investigations. No other warranties, expressed or implied, are made by Stantec.

Prepared by:

Deitrie Hanson
Geologic Project Specialist

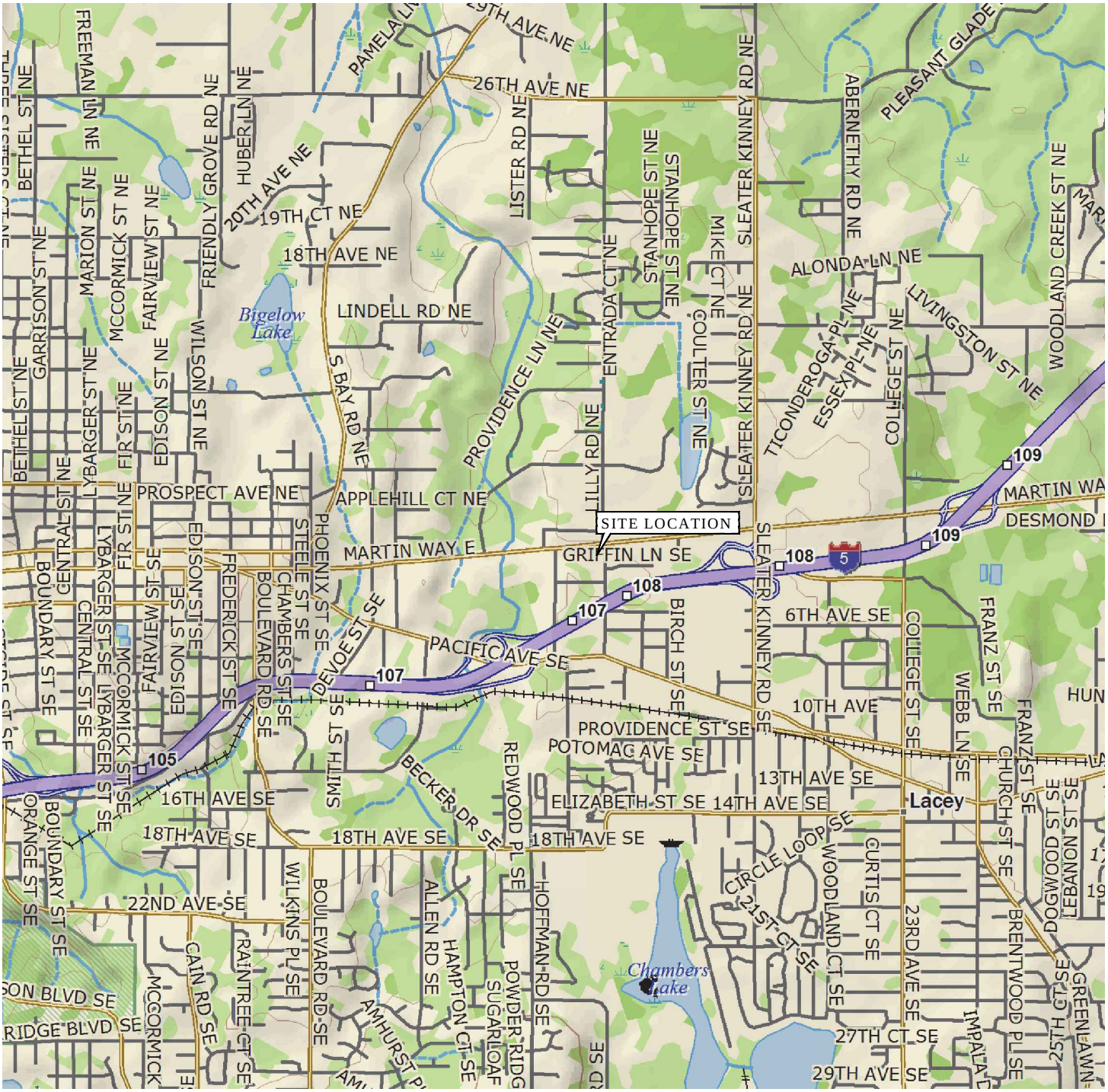
Reviewed by:

Paul Fairbairn
Project Manager

Phil Haberman, L.G., L.E.G.
Senior Geologist

ATTACHED:

- Site Location Map (Figure 1)
- Site Vicinity Map (Figure 2)
- Groundwater Elevation Contour Map – January 18, 2013 (Figure 3)
- Groundwater Analytical Results– January 18, 2013 (Figure 4)
- Groundwater Monitoring and Analytical Results (Table 1)
- Graph 1: MW-4 Dissolved Benzene Concentration vs. Time
- Graph 2: MW-4 Dissolved TPH-G Concentration vs. Time
- Graph 3: Groundwater Flow Direction Rose Diagram
- Laboratory Reports and Chain-of-Custody Documentation
- Field Notes
- Stantec Monitoring Well Purging and Sampling Procedures



North

WASHINGTON

1 1/2 0 1

SCALE (MILES)

1000 0 1000 2000 3000 4000 5000 6000 7000

SCALE (FEET)

REFERENCE: USGS 7.5 MINUTE QUADRANGLE, LACEY, WASHINGTON

Stantec
12034 134th COURT NORTHEAST, SUITE102
REDMOND, WASHINGTON
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FOR: 7-ELEVEN
STORE NO. 25983
3541 MARTIN WAY EAST
OLYMPIA, WASHINGTON

SITE LOCATION MAP

FIGURE: **1**

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
185750040	MDR	EWB	PF	JUNE 2013

FILEPATH:M:_00 OTHER OFFICES\01-REDMOND\7-11_CURRENT SITES\25983\FIG-1 SITE LOC.dwg | Layout Tab: Layout1 | Drafter: miramirez | May 30, 2013 at 14:43

LEGEND:

SUBJECT PROPERTY

0 100 200

APPROXIMATE SCALE (FEET)

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FOR: 7-ELEVEN

STORE NO. 25983
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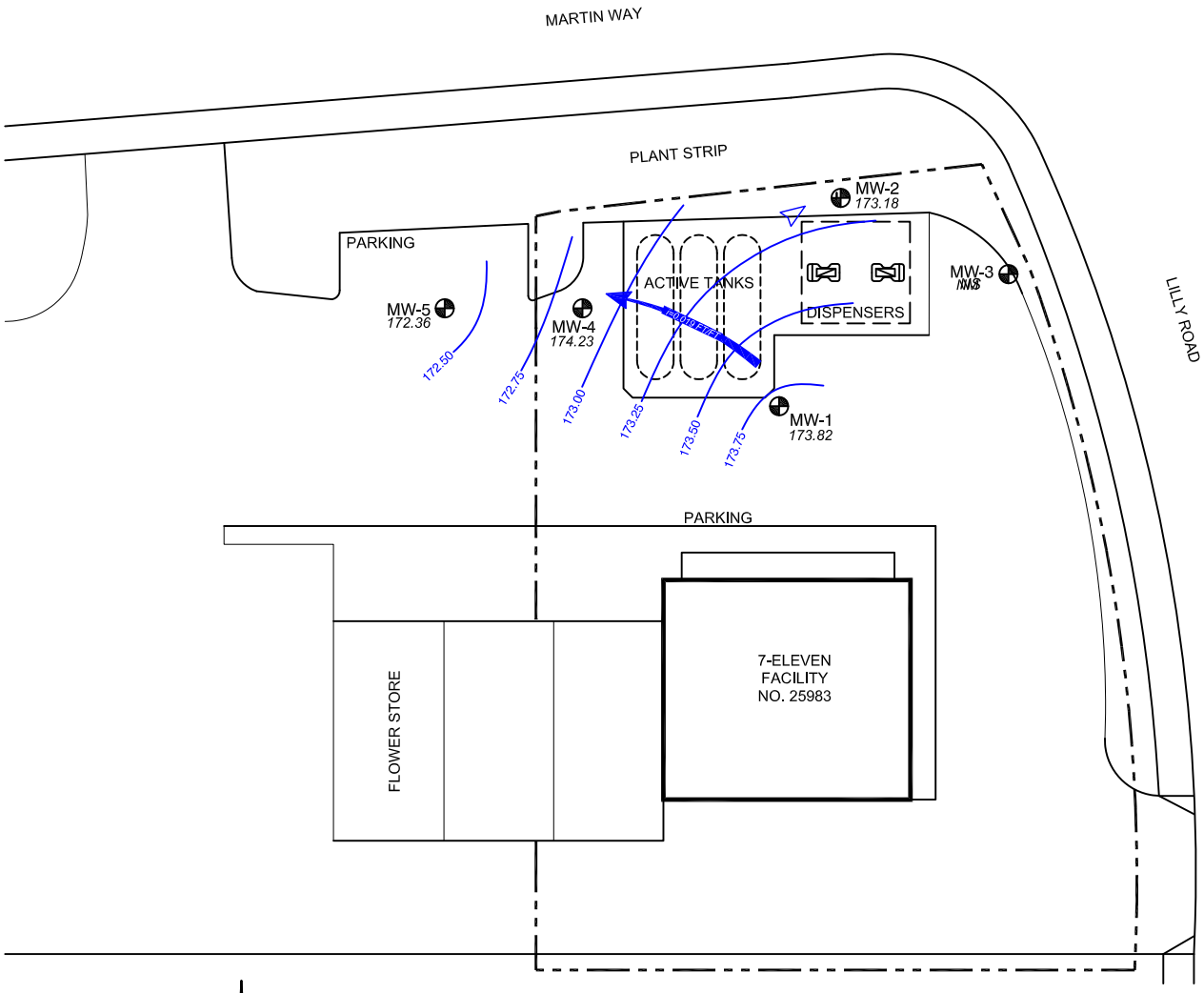
SITE VICINITY MAP

FIGURE: 2

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
185750040	MDR	EWB	PF	JUNE 2013

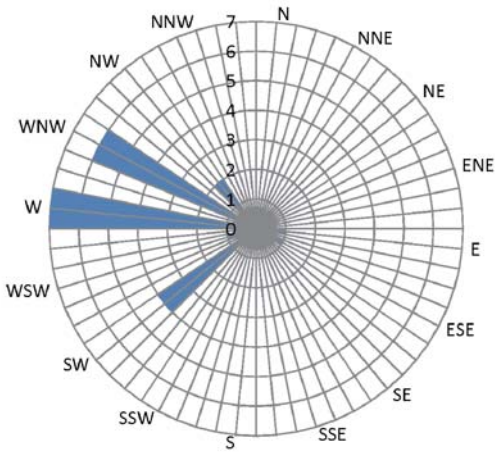
FILEPATH: M:_00 OTHER OFFICES\01-REDMOND\7-11_CURRENT SITES\25983\7-11_25983-2012.DWG MODIFIED BY MIRAMIREZ ON MAY 30, 2013 - 15:14



LEGEND:

- SUBJECT PROPERTY LINE BOUNDARY
- MW-1 — GROUNDWATER MONITORING WELL LOCATION
- INFERRED GROUNDWATER FLOW DIRECTION
- 173.5 — ELEVATION CONTOUR (FEET) INFERRED GROUNDWATER
- CONTOUR INTERVAL = 0.25 FT
- 173.18 — RELATIVE GROUNDWATER ELEVATION (FEET)
- NM — NOT MEASURED
- * — NOT USED IN CONTOURING

ROSE DIAGRAM
CUMULATIVE GROUNDWATER FLOW DIRECTION



N

0 40 80

APPROXIMATE SCALE (FEET)

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FOR: 7-ELEVEN
STORE NO. 25983
3541 MARTIN WAY EAST
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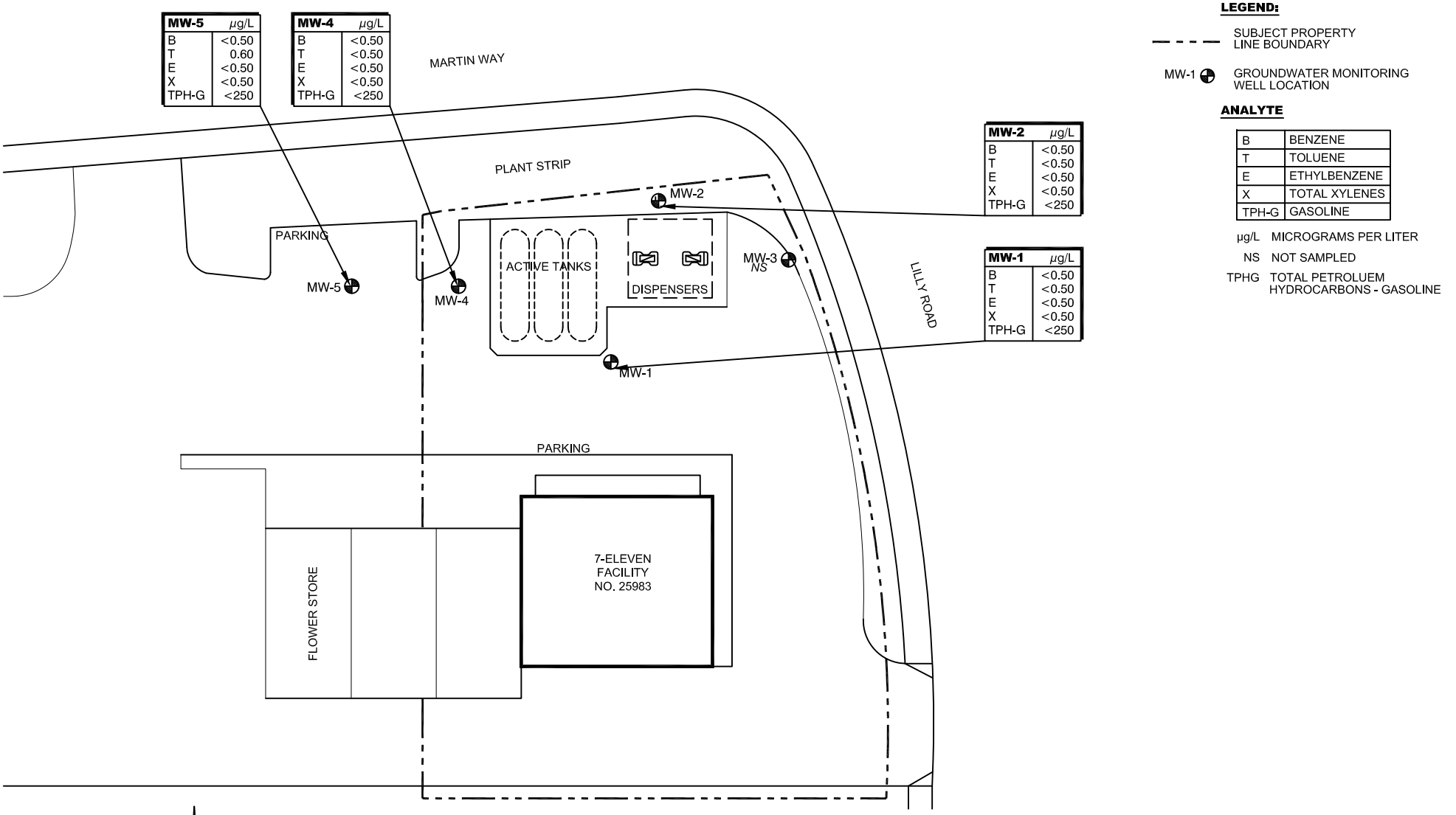
GROUNDWATER ELEVATION CONTOUR MAP JANUARY 18, 2013

FIGURE: 3

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
185750040	MDR	EWB	PF	JUNE 2013

FILEPATH: M:_00 OTHER OFFICES\01-REDMOND\7-11_CURRENT SITES\25983\7-11_25983-2012.DWG MODIFIED BY MIRAMIREZ ON JUN 05, 2013 - 11:04



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FOR:
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3541 MARTIN WAY EAST
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GROUNDWATER ANALYTICAL RESULTS JANUARY 18, 2013

FIGURE: 4

JOB NUMBER:	DRAWN BY:	CHECKED BY:	APPROVED BY:	DATE:
185750040	MDR	EWB	PF	JUNE 2013

FILEPATH: M:_00 OTHER OFFICES\01-REDMOND\7-11_CURRENT SITES\25983\7-11_25983-2012.DWG MODIFIED BY MIRAMIREZ ON JUN 04, 2013 - 9:05

TABLE 1
GROUNDWATER MONITORING AND ANALYTICAL RESULTS
7-Eleven Store No. 25983
3541 Martin Way East, Olympia, Washington
All results in micrograms per liter (µg/L), except where noted

Well ID (TOC)	Sample Date	MtBE	Benzene	Toluene	Ethyl-benzene	Total Xylenes	TPH-G	EDC	EDB	Total Lead	Depth To Groundwater	Groundwater Elevation (feet)
MW-1	07/08/99	--	--	--	--	--	--	--	--	--	26.00	172.33
198.33	07/15/99	--	<0.3	<0.3	<0.5	<0.6	<100	--	--	<5	26.02	172.31
	03/14/00	--	<0.3	<0.3	<0.5	<0.6	<100	--	--	--	25.38	172.95
	06/27/00	--	<0.5	<0.5	<0.5	<1.0	<100	--	--	--	25.97	172.36
	09/25/00	--	<0.5	2.90	0.56	2.8	100	--	--	--	26.52	171.81
	11/13/00	--	<0.5	<0.5	<0.5	<1.5	<100	--	--	--	26.30	172.03
	02/14/01	--	<0.5	<0.5	0.56 [a]	<1.0	<100	--	--	--	26.09	172.24
	06/07/01	--	<0.5	<0.5	<0.5	<1.0	<100	--	--	--	26.13	172.20
	08/01/01	--	<0.5	<0.5	<0.5	<1.0	<50	--	--	--	26.29	172.04
	11/15/01	--	<0.5	<0.5	<0.5	<1.0	<100	--	--	--	26.36	171.97
	03/25/02	--	<0.5	<1.0	<1.0	<3.0	<100	--	--	--	25.34	172.99
	06/21/02	--	--	--	--	--	--	--	--	--	--	--
	09/23/02	--	<0.5	<1.0	<1.0	1.01	<100	--	--	--	26.20	172.13
	12/10/02	--	--	--	--	--	--	--	--	--	26.37	171.96
	04/02/03	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	25.41	172.92
	06/11/03	--	--	--	--	--	--	--	--	--	26.05	172.28
	09/15/03	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	27.34	170.99
	12/04/03	--	--	--	--	--	--	--	--	--	25.51	172.82
	03/04/04	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.64	171.69
	05/10/04	--	--	--	--	--	--	--	--	--	27.02	171.31
	08/11/04	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	27.27	171.06
	11/17/04	--	--	--	--	--	--	--	--	--	27.16	171.17
	02/21/05	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.94	171.39
	05/16/05	--	--	--	--	--	--	--	--	--	28.96	169.37
	08/19/05	--	--	--	--	--	--	--	--	--	27.03	171.30
	10/26/05	--	--	--	--	--	--	--	--	--	27.16	171.17
	01/26/06	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	25.79	172.54
	05/11/06	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	--	--
	07/26/06	--	--	--	--	--	--	--	--	--	--	--
	11/09/06	--	--	--	--	--	--	--	--	--	24.18	174.15
	04/11/07	--	--	--	--	--	--	--	--	--	25.36	172.97
	08/27/07	--	--	--	--	--	--	--	--	--	26.15	172.18
	02/06/08	--	--	--	--	--	--	--	--	--	26.35	171.98
	08/18/08	--	--	--	--	--	--	--	--	--	25.05	173.28
	11/12/08	--	--	--	--	--	--	--	--	--	24.28	174.05
	02/05/09	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	25.56	172.77
	01/12/10	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	25.30	173.03
	02/14/11	--	<0.5	<0.5	<0.5	<0.5	<250	--	--	--	25.48	172.85
	02/09/12	--	<0.50	<0.50	<0.50	<0.50	<250	--	--	--	25.23	173.10
	01/18/13	--	<0.50	<0.50	<0.50	<0.50	<250	--	--	--	24.51	173.82
MTCA Method A Cleanup Level		**20**	**5**	**1,000**	**700**	**1,000**	**800/1,000 [b]**	**5**	**0.01**	**15**		

TABLE 1
GROUNDWATER MONITORING AND ANALYTICAL RESULTS
7-Eleven Store No. 25983
3541 Martin Way East, Olympia, Washington
All results in micrograms per liter (µg/L), except where noted

Well ID (TOC)	Sample Date	MtBE	Benzene	Toluene	Ethyl-benzene	Total Xylenes	TPH-G	EDC	EDB	Total Lead	Depth To Groundwater	Groundwater Elevation (feet)
MW-2	07/08/99	--	--	--	--	--	--	--	--	--	25.89	172.42
198.31	07/15/99	--	<0.3	<0.3	<0.5	44	725	--	--	<5	26.00	172.31
	03/14/00	--	<0.3	<0.3	0.78	1.12	104	--	--	--	25.34	172.97
	06/27/00	--	<0.5	<0.5	<0.5	<1.0	<100	--	--	--	25.94	172.37
	09/25/00	--	<0.5	2.70	0.58	2.3	<100	--	--	--	26.33	171.98
	11/13/00	--	<0.5	<0.5	<0.5	2.2	<100	--	--	--	26.32	171.99
	02/14/01	--	<0.5	<0.5	0.58 [a]	<1.0	<100	--	--	--	26.33	171.98
	06/07/01	--	<0.5	<0.5	<0.5	<1.0	<100	--	--	--	26.21	172.10
	08/01/01	--	<0.5	<0.5	<0.5	<1.0	<50	--	--	--	26.37	171.94
	11/15/01	--	<0.5	5.7 [a]	12 [a]	43 [a]	**1,900**	--	--	--	26.50	171.81
	03/25/02	--	<0.5	<1.0	<1.0	1.66	<100	--	--	--	25.29	173.02
	06/21/02	--	--	--	--	--	--	--	--	--	--	--
	09/23/02	--	0.317	<1.0	<1.0	1.01	<100	--	--	--	26.25	172.06
	12/10/02	--	--	--	--	--	--	--	--	--	26.41	171.90
	04/02/03	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	25.40	172.91
	06/11/03	--	--	--	--	--	--	--	--	--	26.05	172.26
	09/15/03	--	<1.0	<1.0	<1.0	<1.0	<100	--	--	--	27.40	170.91
	12/04/03	--	--	--	--	--	--	--	--	--	25.51	172.80
	03/04/04	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.64	171.67
	05/10/04	--	--	--	--	--	--	--	--	--	27.05	171.26
	08/11/04	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	27.34	170.97
	11/17/04	--	--	--	--	--	--	--	--	--	27.23	171.08
	02/21/05	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.95	171.36
	05/17/05	--	--	--	--	--	--	--	--	--	29.21	169.10
	08/19/05	--	--	--	--	--	--	--	--	--	28.91	169.40
	10/26/05	--	--	--	--	--	--	--	--	--	29.68	168.63
	01/26/06	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	25.72	172.59
	05/11/06	--	--	--	--	--	--	--	--	--	25.90	172.41
	07/26/06	--	--	--	--	--	--	--	--	--	--	--
	11/09/06	--	--	--	--	--	--	--	--	--	22.96	175.35
	04/11/07	--	--	--	--	--	--	--	--	--	23.35	174.96
	08/27/07	--	--	--	--	--	--	--	--	--	26.22	172.09
	02/06/08	--	--	--	--	--	--	--	--	--	26.38	171.93
	08/18/08	--	--	--	--	--	--	--	--	--	25.12	173.19
	11/12/08	--	--	--	--	--	--	--	--	--	23.06	175.25
	02/05/09	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	24.98	173.33
	01/12/10	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	25.23	173.08
	02/14/11	--	<0.5	<0.5	<0.5	<0.5	<250	--	--	--	25.45	172.86
	02/09/12	--	<0.50	<0.50	<0.50	<0.50	<250	--	--	--	25.18	173.13
	01/18/13	--	<0.50	<0.50	<0.50	<0.50	<250	--	--	--	25.13	173.18
MTCA Method A Cleanup Level		**20**	**5**	**1,000**	**700**	**1,000**	**800/1,000 [b]**	**5**	**0.01**	**15**		

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7-Eleven Store No. 25983
3541 Martin Way East, Olympia, Washington
All results in micrograms per liter (µg/L), except where noted

Well ID (TOC)	Sample Date	MtBE	Benzene	Toluene	Ethyl-benzene	Total Xylenes	TPH-G	EDC	EDB	Total Lead	Depth To Groundwater	Groundwater Elevation (feet)
MW-3	07/08/99	--	--	--	--	--	--	--	--	--	25.60	172.59
198.19	07/15/99	--	<0.3	<0.3	<0.5	<0.6	<100	--	--	<5	26.10	172.09
	03/14/00	--	<0.3	<0.3	<0.5	<0.6	<100	--	--	--	24.89	173.30
	06/27/00	--	<0.5	<0.5	<0.5	<1.0	<100	--	--	--	25.56	172.63
	09/25/00	--	<0.5	2.10	<0.5	1.7	<100	--	--	--	25.98	172.21
	11/13/00	--	<0.5	<0.5	<0.5	<1.5	<100	--	--	--	25.94	172.25
	02/14/01	--	<0.5	<0.5	<0.57 [a]	<1.0	<100	--	--	--	26.15	172.04
	06/07/01	--	<0.5	<0.5	<0.5	<1.0	<100	--	--	--	25.87	172.32
	08/01/01	--	<0.5	<0.5	<0.5	<1.0	<50	--	--	--	26.01	172.18
	11/15/01	--	<0.5	<0.5	<0.5	<1.0	<100	--	--	--	26.20	171.99
	03/25/02	--	<0.5	<1.0	<1.0	<3.0	<100	--	--	--	23.89	174.30
	06/21/02	--	<0.5	<1.0	<1.0	<3.0	<100	--	--	--	25.59	172.60
	09/23/02	--	0.299	<1.0	<1.0	<1.0	<100	--	--	--	25.88	172.31
	12/10/02	--	<0.5	<1.0	<1.0	<3.0	<100	--	--	--	26.00	172.19
	04/02/03	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	25.98	172.21
	06/11/03	--	<1.0	<1.0	<1.0	<2.0	<100	--	--		25.68	172.51
	09/15/03	--	<1.0	<1.0	<1.0	<2.0	<100	--	--		27.05	171.14
	12/04/03	--	--	--	--	--	--	--	--	--	25.09	173.10
	03/04/04	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.23	171.96
	05/10/04	--	--	--	--	--	--	--	--	--	26.68	171.51
	08/11/04	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.97	171.22
	11/17/04	--	--	--	--	--	--	--	--	--	26.84	171.35
	02/21/05	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.61	171.58
	05/17/05	--	--	--	--	--	--	--	--	--	28.46	169.73
	08/19/05	--	--	--	--	--	--	--	--	--	27.68	170.51
	10/26/05	--	--	--	--	--	--	--	--	--	24.68	173.51
	01/26/06	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	25.27	172.92
	05/11/06	--	--	--	--	--	--	--	--	--	25.40	172.79
	07/26/06	--	--	--	--	--	--	--	--	--	--	--
	11/09/06	--	--	--	--	--	--	--	--	--	21.14	177.05
	04/11/07	--	--	--	--	--	--	--	--	--	24.92	173.27
	08/27/07	--	--	--	--	--	--	--	--	--	25.83	172.36
	02/06/08	--	--	--	--	--	--	--	--	--	--	--
	08/18/08	--	--	--	--	--	--	--	--	--	24.73	173.46
	02/05/09	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	25.14	173.05
	01/12/10	Unable to access well									--	--
	02/14/11	Unable to access well									--	--
	02/09/12	Unable to access well									--	--
	01/18/13	Unable to access well									--	--
MTCA Method A Cleanup Level		**20**	**5**	**1,000**	**700**	**1,000**	**800/1,000[b]**	**5**	**0.01**	**15**		

TABLE 1
GROUNDWATER MONITORING AND ANALYTICAL RESULTS
7-Eleven Store No. 25983
3541 Martin Way East, Olympia, Washington
All results in micrograms per liter (µg/L), except where noted

Well ID (TOC)	Sample Date	MtBE	Benzene	Toluene	Ethyl-benzene	Total Xylenes	TPH-G	EDC	EDB	Total Lead	Depth To Groundwater	Groundwater Elevation (feet)
MW-4	07/08/99	--	--	--	--	--	--	--	--	--	26.12	172.43
198.55	07/15/99	--	**<30**	**5,150**	<50	**23,900**	**90,800**	--	--	<5	26.10	172.45
	03/14/00	--	**<30**	**1,870**	**3,030**	**27,500**	**67,000**	--	--	--	25.41	173.14
	06/27/00	--	**100**	**2,500**	**3,400**	**27,000**	**91,000**	--	--	--	26.81	171.74
	09/25/00	--	**10,000**	**4,800**	**4,200**	**4,200**	**68,000**	--	--	--	26.70	171.85
	11/13/00	--	**<120**	780	**1,800**	**17,000**	**70,000**	--	--	--	26.77	171.78
	02/14/01	--	**<120**	660	**1,300** [a]	**21,000**	**99,000**	--	--	--	25.74	172.81
	06/07/01	--	**<25**	97	360	**4,800**	**23,000**	--	--	--	26.34	172.21
	08/01/01	--	**20.5**	329	300	**12,100**	**39,900**	--	--	--	26.53	172.02
	11/15/01	--	**<10**	97 [a]	350 [a]	**4,700** [a]	**30,000**	--	--	--	27.37	171.18
	03/25/02	--	1.7	74.8	143	**1,489**	**34,100**	--	--	--	25.45	173.10
	06/21/02	--	<0.5	5.28	349	**1,867**	**22,600**	--	--	--	26.54	172.01
	09/23/02	--	1.0	7.97	77.3	438	**6,090**	--	--	--	26.65	171.90
	12/10/02	--	**<5.0**	7.38	225.0	**1,788**	**14,500**	--	--	--	26.67	171.88
	04/02/03	--	**7.7**	7.9	350	**1,950**	**30,000**	--	--	--	26.44	172.11
	06/11/03	--	**5.9**	6.5	160	580	**7,600**	--	--	--	26.54	172.01
	09/15/03	--	**<5.0**	<5.0	76.0	460	**5,800**	--	--	--	27.67	170.88
	12/04/03	--	4.9	2.1	140	332	**5,200**	--	--	--	26.41	172.14
	03/04/04	--	4.5	3.2	75	259	**3,800**	--	--	--	27.11	171.44
	05/10/04	--	1.6	<1.0	24	100	**2,300**	--	--	--	27.65	170.90
	08/11/04	--	1.7	<1.0	10	38	**1,100**	--	--	--	27.76	170.79
	11/17/04	--	**5.3**	15	580	**4,500**	**43,000**	--	--	--	27.12	171.43
	02/21/05	--	3.8	1.8	93	630	**16,000**	--	--	--	27.61	170.94
	05/17/05	--	2.2	<1.0	49	190	**6,600**	--	--	--	27.51	171.04
	08/19/05	--	**1,100**	580	**1,600**	**5,330**	**30,000**	--	--	--	29.99	168.56
	10/26/05	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.10	172.45
	01/26/06	--	1.9	<1.0	120	139	**3,400**	--	--		26.65	171.90
	05/11/06	--	<1.0	<1.0	75	37	**2,400**	--	--	--	27.40	171.15
	07/26/06	--	**350**	**2,900**	**750**	**2,740**	**24,000**	--	--	--	28.56	169.99
	11/09/06	--	**170**	<4.0	91	55	**3,300**	--	--		26.68	171.87
	04/11/07	--	<4.0	<4.0	59	50	**3,100**	--	--	--	26.11	172.44
	08/27/07	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	27.05	171.50
	02/06/08	--	<1.0	<1.0	6.9	<2.0	160	--	--	--	26.28	172.27
	08/18/08	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.95	171.60
	11/12/08	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.78	171.77
	02/05/09	<0.20	<1.0	<1.0	<1.0	<2.0	<100	<0.20	<0.0095	--	26.28	172.27
	01/12/10	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	24.95	173.60
	02/14/11	--	<0.5	<0.5	<0.5	<0.5	<250	--	--	--	26.13	172.42
	02/09/12	--	<0.50	<0.50	<0.50	<0.50	<250	--	--	--	25.79	172.76
	01/18/13	--	<0.50	<0.50	<0.50	<0.50	<250	--	--	--	24.32	174.23
MTCA Method A Cleanup Level		**20**	**5**	**1,000**	**700**	**1,000**	**800/1,000** [b]	**5**	**0.01**	**15**		

TABLE 1
GROUNDWATER MONITORING AND ANALYTICAL RESULTS
7-Eleven Store No. 25983
3541 Martin Way East, Olympia, Washington
All results in micrograms per liter (µg/L), except where noted

Well ID (TOC)	Sample Date	MtBE	Benzene	Toluene	Ethyl-benzene	Total Xylenes	TPH-G	EDC	EDB	Total Lead	Depth To Groundwater	Groundwater Elevation (feet)
MW-5	06/07/01	--	<0.5	<0.5	2.1	26	950	--	--	--	26.48	171.88
198.36	08/01/01	--	1.4	<0.5	3.0	4.3	**899**	--	--	--	26.76	171.60
	11/15/01	--	<0.5	<0.5	6.5 [a]	20 [a]	**1,500**	--	--	--	27.08	171.28
	03/25/02	--	<0.5	<1.0	0.6	1.6	188	--	--	--	26.10	172.26
	06/21/02	--	<0.5	<1.0	<1.0	<3.0	<100	--	--	--	26.59	171.77
	09/23/02	--	0.304	<1.0	<1.0	1.6	<100	--	--	--	26.65	171.71
	12/10/02	--	<0.5	<1.0	<1.0	<3.0	<100	--	--	--	26.70	171.66
	04/02/03	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.24	172.12
	06/11/03	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.70	171.66
	09/15/03	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	27.67	170.69
	12/04/03	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.32	172.04
	03/04/04	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	27.48	170.88
	05/10/04	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	27.58	170.78
	08/11/04	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	27.71	170.65
	11/17/04	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	27.68	170.68
	02/21/05	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	27.31	171.05
	05/17/05	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	31.26	167.10
	08/19/05	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	28.46	169.90
	10/26/05	--	**7.50**	<1.0	<1.0	1.1	410	--	--	--	24.25	174.11
	01/26/06	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.55	171.81
	05/11/06	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.60	171.76
	07/26/06	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	31.68	166.68
	11/09/06	--	--	--	--	--	--	--	--	--	22.90	175.46
	04/11/07	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.17	172.19
	08/27/07	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.70	171.66
	02/06/08	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.12	172.24
	08/18/08	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	25.65	172.71
	11/12/08	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.65	171.71
	02/05/09	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	26.37	171.99
	01/12/10	--	<1.0	<1.0	<1.0	<2.0	<100	--	--	--	24.90	173.46
	02/14/11	--	<0.5	<0.5	<0.5	<0.5	<250	--	--	--	26.25	172.11
	02/09/12	--	<0.50	<0.50	<0.50	<0.50	<250	--	--	--	26.00	172.36
	01/18/13	--	<0.50	0.60	<0.50	<0.50	<250	--	--	--	26.00	172.36
MTCA Method A Cleanup Level		**20**	**5**	**1,000**	**700**	**1,000**	**800/1,000 [b]**	**5**	**0.01**	**15**		

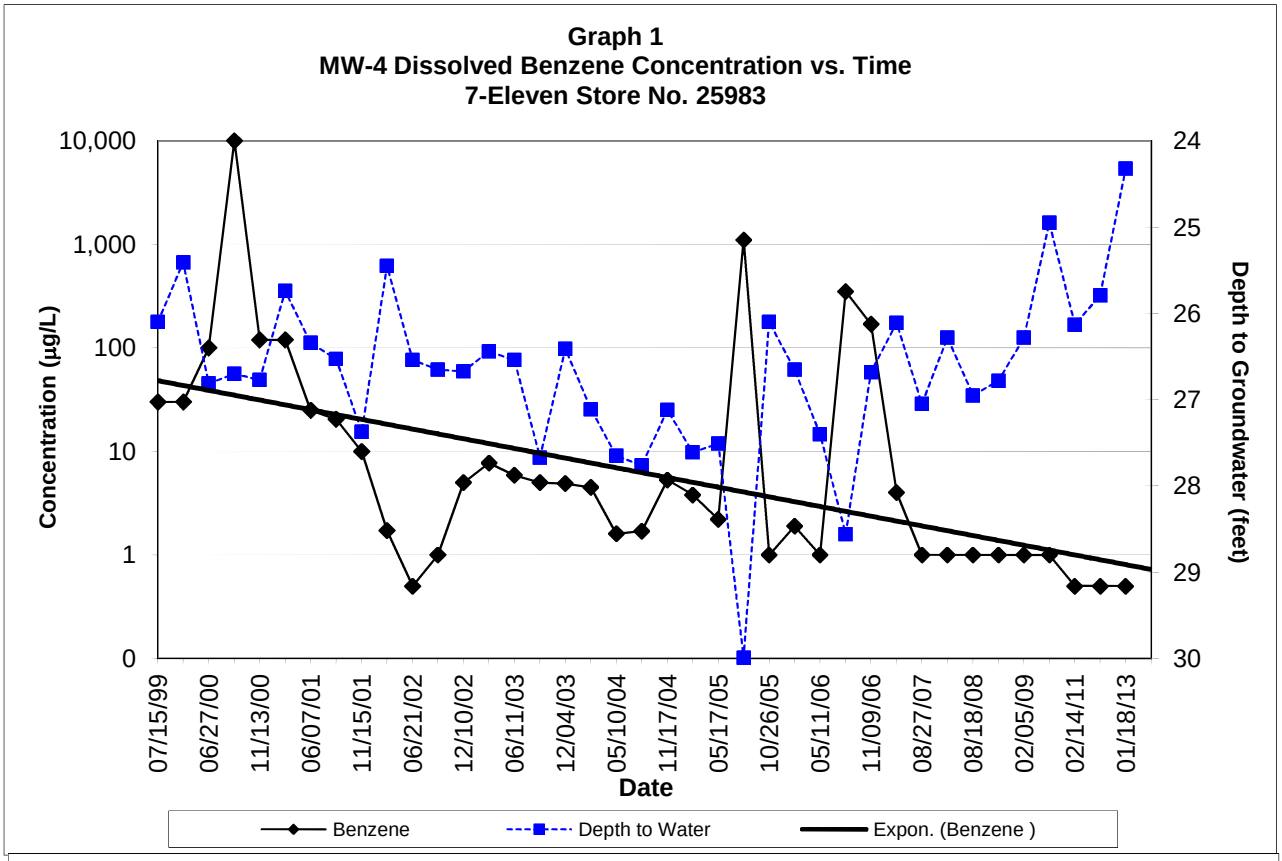
Explanation of Abbreviations:

TOC = top of casing elevation
MtBE = methyl tertiary butyl ether
TPH-G = total petroleum hydrocarbons as gasoline
EDC = 1,2-Dichloroethane
EDB = 1,2-Dibromoethane
-- = not sampled, not measured or not available
< = less than the reporting limit
MTCA = Model Toxics Control Act

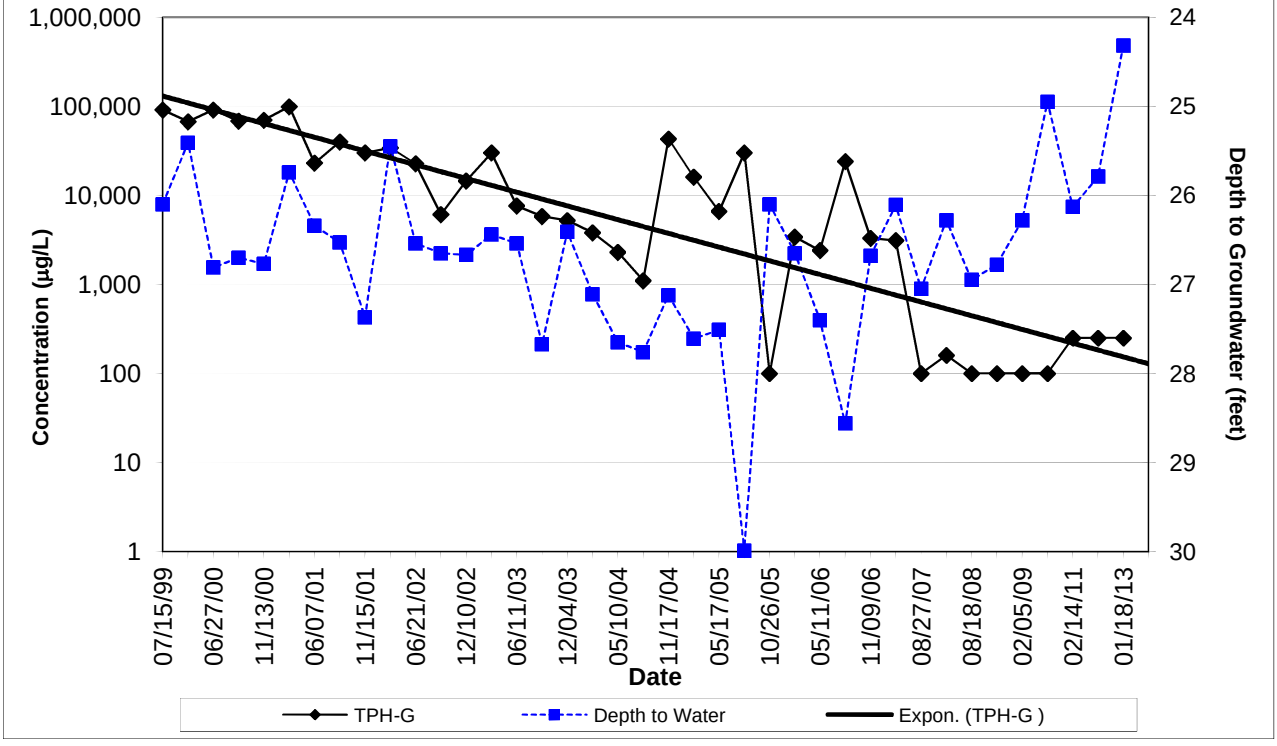
Notes:

[a] Method blank contamination
[b] The TPH-G cleanup level is reduced from 1,000 µg/L to 800 µg/L if benzene is present in the sample
Bold values exceed the MTCA Method A Cleanup Level

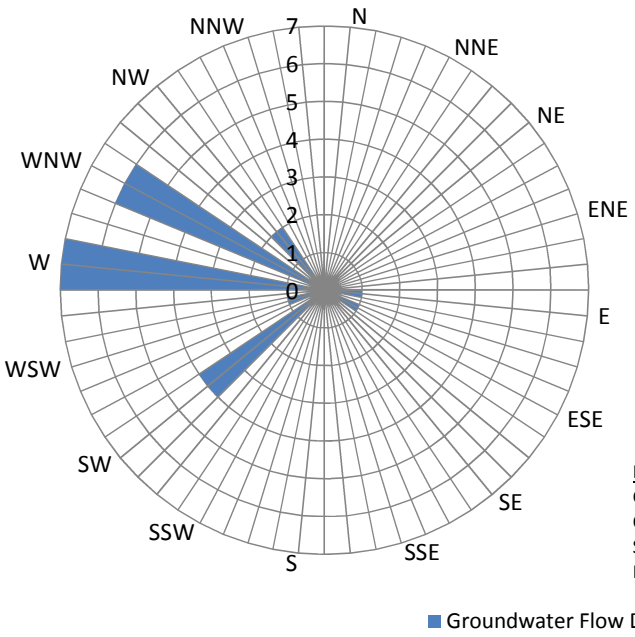
Graph 1
MW-4 Dissolved Benzene Concentration vs. Time
7-Eleven Store No. 25983



Graph 2
MW-4 Dissolved TPH-G Concentration vs. Time
7-Eleven Store No. 25983



Graph 3
Groundwater Flow Direction Rose Diagram
7-Eleven Store No. 25983
3541 Martin Way East
Olympia, Washington



KIFF Analytical LLC

Report Number : 83842
Date : 01/28/2013

Laboratory Results

Paul Fairbairn
Stantec Consulting Corporation - Redmond, WA
12034 134th Court Northeast Suite 102
Redmond, WA 98052

Subject : 4 Water Samples
Project Name : #25983 1Q13 GWM
Project Number : 185750040.230.0400

Dear Mr. Fairbairn,

Chemical analysis of the samples referenced above has been completed. Summaries of the data are contained on the following pages. Sample(s) were received under documented chain-of-custody. US EPA protocols for sample storage and preservation were followed. Testing procedures comply with the 2003 NELAC and TNI 2009 standards. Laboratory results relate only to the samples tested. This report may be freely reproduced in full, but may only be reproduced in part with the express permission of Kiff Analytical, LLC. Kiff Analytical, LLC is certified by the State of California under the National Environmental Laboratory Accreditation Program (NELAP), lab # 08263CA. If you have any questions regarding procedures or results, please call me at 530-297-4800.

Sincerely,

Troy G. Turpen

Troy Turpen

KIFF Analytical LLC

Report Number : 83842
Date : 01/28/2013

Subject : 4 Water Samples
Project Name : #25983 1Q13 GWM
Project Number : 185750040.230.0400

Case Narrative

Matrix Spike/Matrix Spike Duplicate results associated with sample MW-1 for the analyte P + M Xylene were outside of control limits. This may indicate a bias for the sample that was spiked. Since the LCS recoveries were within control limits, no data are flagged.

KIFF Analytical LLC

Report Number : 83842
Date : 01/28/2013

Project Name : **#25983 1Q13 GWM**
Project Number : **185750040.230.0400**

Sample : **MW-1** Matrix : Water Lab Number : 83842-01

Sample Date :01/18/2013

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date/Time Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 09:45
Toluene	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 09:45
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 09:45
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 09:45
Gasoline Range Organics	< 250	250	ug/L	NWTPH-Gx	01/25/13 00:21
4-Bromofluorobenzene (Surr)	92.9		% Recovery	NWTPH-Gx	01/25/13 00:21
1,2-Dichloroethane-d4 (Surr)	104		% Recovery	EPA 8260B	01/25/13 09:45
Toluene - d8 (Surr)	92.2		% Recovery	EPA 8260B	01/25/13 09:45

Sample : **MW-2** Matrix : Water Lab Number : 83842-02

Sample Date :01/18/2013

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date/Time Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 09:08
Toluene	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 09:08
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 09:08
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 09:08
Gasoline Range Organics	< 250	250	ug/L	NWTPH-Gx	01/25/13 00:58
4-Bromofluorobenzene (Surr)	93.9		% Recovery	NWTPH-Gx	01/25/13 00:58
1,2-Dichloroethane-d4 (Surr)	101		% Recovery	EPA 8260B	01/25/13 09:08
Toluene - d8 (Surr)	99.5		% Recovery	EPA 8260B	01/25/13 09:08

KIFF Analytical LLC

Report Number : 83842
Date : 01/28/2013

Project Name : **#25983 1Q13 GWM**
Project Number : **185750040.230.0400**

Sample : **MW-4** Matrix : Water Lab Number : 83842-03
Sample Date :01/18/2013

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date/Time Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 09:20
Toluene	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 09:20
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 09:20
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 09:20
Gasoline Range Organics	< 250	250	ug/L	NWTPH-Gx	01/25/13 01:34
4-Bromofluorobenzene (Surr)	96.6		% Recovery	NWTPH-Gx	01/25/13 01:34
1,2-Dichloroethane-d4 (Surr)	101		% Recovery	EPA 8260B	01/25/13 09:20
Toluene - d8 (Surr)	100		% Recovery	EPA 8260B	01/25/13 09:20

Sample : **MW-5** Matrix : Water Lab Number : 83842-04
Sample Date :01/18/2013

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date/Time Analyzed
Benzene	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 12:13
Toluene	**0.60**	0.50	ug/L	EPA 8260B	01/25/13 12:13
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 12:13
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	01/25/13 12:13
Gasoline Range Organics	< 250	250	ug/L	NWTPH-Gx	01/25/13 02:11
4-Bromofluorobenzene (Surr)	91.7		% Recovery	NWTPH-Gx	01/25/13 02:11
1,2-Dichloroethane-d4 (Surr)	101		% Recovery	EPA 8260B	01/25/13 12:13
Toluene - d8 (Surr)	101		% Recovery	EPA 8260B	01/25/13 12:13

Report Number : 83842

Date : 01/28/2013

QC Report : Method Blank Data

Project Name : **#25983 1Q13 GWM**

Project Number : **185750040.230.0400**

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed
Gasoline Range Organics	< 250	250	ug/L	NWTPH-Gx	01/24/2013
4-Bromofluorobenzene (Surr)	97.7		%	NWTPH-Gx	01/24/2013
Benzene	< 0.50	0.50	ug/L	EPA 8260B	01/25/2013
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	01/25/2013
Toluene	< 0.50	0.50	ug/L	EPA 8260B	01/25/2013
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	01/25/2013
1,2-Dichloroethane-d4 (Surr)	102		%	EPA 8260B	01/25/2013
Toluene - d8 (Surr)	98.2		%	EPA 8260B	01/25/2013
Benzene	< 0.50	0.50	ug/L	EPA 8260B	01/25/2013
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	01/25/2013
Toluene	< 0.50	0.50	ug/L	EPA 8260B	01/25/2013
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	01/25/2013
1,2-Dichloroethane-d4 (Surr)	100		%	EPA 8260B	01/25/2013
Toluene - d8 (Surr)	99.9		%	EPA 8260B	01/25/2013
Benzene	< 0.50	0.50	ug/L	EPA 8260B	01/25/2013
Ethylbenzene	< 0.50	0.50	ug/L	EPA 8260B	01/25/2013
Toluene	< 0.50	0.50	ug/L	EPA 8260B	01/25/2013
Total Xylenes	< 0.50	0.50	ug/L	EPA 8260B	01/25/2013
1,2-Dichloroethane-d4 (Surr)	100		%	EPA 8260B	01/25/2013
Toluene - d8 (Surr)	100		%	EPA 8260B	01/25/2013

Parameter	Measured Value	Method Reporting Limit	Units	Analysis Method	Date Analyzed

KIFF ANALYTICAL, LLC

2795 2nd Street, Suite 300 Davis, CA 95618 530-297-4800

Report Number : 83842

QC Report : Matrix Spike/ Matrix Spike Duplicate

Date : 01/28/2013

Project Name : **#25983 1Q13 GWM**

Project Number : **185750040.230.0400**

Parameter	Spiked Sample	Sample Value	Spike Level	Spike Dup. Level	Spiked Sample Value	Duplicate Spiked Sample Value	Units	Analysis Method	Date Analyzed	Spiked Sample Percent Recov.	Duplicate Spiked Sample Percent Recov.	Relative Percent Diff.	Spiked Sample Percent Recov. Limit	Relative Percent Diff. Limit
Benzene														
	83842-01	<0.50	40.0	40.0	41.2	40.2	ug/L	EPA 8260B	1/25/13	103	100	2.48	80-120	25
Ethylbenzene														
	83842-01	<0.50	40.0	40.0	38.9	38.0	ug/L	EPA 8260B	1/25/13	97.3	95.0	2.42	80-120	25
P + M Xylene														
	83842-01	<0.50	40.0	40.0	27.5	28.5	ug/L	EPA 8260B	1/25/13	**68.8**	**71.3**	3.57	76.8-120	25
Toluene														
	83842-01	<0.50	40.0	40.0	37.2	36.8	ug/L	EPA 8260B	1/25/13	92.9	92.0	0.998	80-120	25
Benzene														
	83842-02	<0.50	40.0	40.0	41.2	40.5	ug/L	EPA 8260B	1/25/13	103	101	1.83	80-120	25
Ethylbenzene														
	83842-02	<0.50	40.0	40.0	41.8	41.2	ug/L	EPA 8260B	1/25/13	105	103	1.45	80-120	25
P + M Xylene														
	83842-02	<0.50	40.0	40.0	40.9	40.5	ug/L	EPA 8260B	1/25/13	102	101	1.13	76.8-120	25
Toluene														
	83842-02	<0.50	40.0	40.0	41.5	40.6	ug/L	EPA 8260B	1/25/13	104	101	2.26	80-120	25
Benzene														
	83842-03	<0.50	40.0	40.0	41.0	40.0	ug/L	EPA 8260B	1/25/13	102	100	2.56	80-120	25

KIFF ANALYTICAL, LLC

2795 2nd Street, Suite 300 Davis, CA 95618 530-297-4800

Report Number : 83842

QC Report : Matrix Spike/ Matrix Spike Duplicate

Date : 01/28/2013

Project Name : **#25983 1Q13 GWM**

Project Number : **185750040.230.0400**

Parameter	Spiked Sample	Sample Value	Spike Level	Spike Dup. Level	Spiked Sample Value	Duplicate Spiked Sample Value	Units	Analysis Method	Date Analyzed	Spiked Sample Percent Recov.	Duplicate Spiked Sample Percent Recov.	Relative Percent Diff.	Spiked Sample Percent Recov. Limit	Relative Percent Diff. Limit
Ethylbenzene														
	83842-03	<0.50	40.0	40.0	41.4	40.0	ug/L	EPA 8260B	1/25/13	103	100	3.32	80-120	25
P + M Xylene														
	83842-03	<0.50	40.0	40.0	41.2	39.8	ug/L	EPA 8260B	1/25/13	103	99.4	3.54	76.8-120	25
Toluene														
	83842-03	<0.50	40.0	40.0	41.7	40.7	ug/L	EPA 8260B	1/25/13	104	102	2.28	80-120	25

KIFF ANALYTICAL, LLC

2795 2nd Street, Suite 300 Davis, CA 95618 530-297-4800

Report Number : 83842

QC Report : Laboratory Control Sample (LCS)

Date : 01/28/2013

Project Name : **#25983 1Q13 GWM**

Project Number : **185750040.230.0400**

Parameter	Spike Level	Units	Analysis Method	Date Analyzed	LCS Percent Recov.	LCS Percent Recov. Limit
Benzene	40.0	ug/L	EPA 8260B	1/25/13	101	80-120
Ethylbenzene	40.0	ug/L	EPA 8260B	1/25/13	109	80-120
P + M Xylene	40.0	ug/L	EPA 8260B	1/25/13	108	76.8-120
Toluene	40.0	ug/L	EPA 8260B	1/25/13	103	80-120
Benzene	40.2	ug/L	EPA 8260B	1/25/13	105	80-120
Ethylbenzene	40.2	ug/L	EPA 8260B	1/25/13	108	80-120
P + M Xylene	40.2	ug/L	EPA 8260B	1/25/13	105	76.8-120
Toluene	40.2	ug/L	EPA 8260B	1/25/13	106	80-120
Benzene	39.8	ug/L	EPA 8260B	1/25/13	102	80-120
Ethylbenzene	39.8	ug/L	EPA 8260B	1/25/13	103	80-120
P + M Xylene	39.8	ug/L	EPA 8260B	1/25/13	102	76.8-120
Toluene	39.8	ug/L	EPA 8260B	1/25/13	104	80-120

KIFF ANALYTICAL, LLC

2795 2nd Street, Suite 300 Davis, CA 95618 530-297-4800

Report Number : 83842

QC Report : Sample Duplicate

Date : 01/28/2013

Project Name : **#25983 1Q13 GWM**

Project Number : **185750040.230.0400**

Parameter	Sample ID	Units	Analysis Method	Date Analyzed	Sample Value	Duplicate Value	RPD	RPD Limit
Gasoline Range Organics	83841-01	ug/L	NWTPH-Gx	1/24/13	< 250	< 250	NC	25

NC RPD not calculated. Both Sample and Duplicate < Lab PQL

KIFF ANALYTICAL, LLC

2795 2nd Street, Suite 300 Davis, CA 95618 530-297-4800

KIFF Analytical LLC

2795 2nd Street, Suite 300
Davis, CA 95618
Lab: 530.297.4800
Fax: 530.297.4802

SRG # / Lab No. 83842

Page ___ of ___

Chain-of-Custody Record and Analysis Request

Project Contact (Hardcopy or PDF To):	Washington EIM Report? ☑ Yes ☐ No
Company / Address: STANTEC CONSULTING 12034 134th CT NE ST 102 REDMOND, WA	User Location ID:
Phone Number: 425-298-1016	User Study ID:
Fax Number: 425-298-1019	Bill to:
Project #: 185750040 / P.O. #:	Sampler Print Name: EMILY HARPER
Project Name: #25983 1013 GWM	Sampler Signature:

Project Address:

Sample Designation	Sampling: Date	Sampling: Time	Container: 40 ml VOA	Container: Sleeve	Container: Poly	Container: Glass	Container: Tedlar	Preservative: HCl	Preservative: HNO_3	Preservative: None	Matrix: Water	Matrix: Soil	Matrix: Air	MTBE @ 0.5 ppb (EPA 8260B)	BTEX (EPA 8260B)	NW-TPH Gx	5 Oxygenates (MTBE, DIPE, ETBE, TAME, TBA) (EPA 8260B)	7 Oxygenates (5 oxy + EtOH, MeOH) (EPA 8260B)	Lead Scav. (1,2 DCA & 1,2 EDB) (EPA 8260B)	Volatile Halocarbons (EPA 8260B)	Volatile Organics Full List (EPA 8260B)	Volatile Organics (EPA 524.2 Drinking Water)	TPH as Diesel (EPA 8015M)	TPH as Motor Oil (EPA 8015M)	CAM 17 Metals (EPA 200.7 / 6010)	5 Waste Oil Metals (Cd,Cr,Ni,Pb,Zn) (EPA 200.7 / 6010)	Mercury (EPA 245.1 / 7470 / 7471)	Total Lead (EPA 200.7 / 6010)	W.E.T. Lead (STLC)	NW-TPHDx					For Lab Use Only
MW-1	1/18/13	14:28	X					X			X				X	X																			01
MW-2	1/18/13	13:09	X					X			X				X	X																			02
MW-4	1/18/13	11:39	X					X			X				X	X																			03
MW-5	1/18/13	12:28	X					X			X				X	X																			04

circle method: 12 hr ☐ / 24 hr ☐ / 48hr ☐ / 72hr ☐ / 1 wk ☑

Relinquished by:	Date	Time	Received by:
	1/18/13	17:45	KIFF RKP 1/23/13 10:20
KIFF RKP	1/23/13	10:20	
	012413	0936	Kiff Analytical LLC

Remarks:

For Lab Use Only: Sample Receipt

Temp °C	Initials	Date	Time	Therm. ID #	Coolant Present
					Yes / No

Distribution: White - Lab; Pink - Originator
Rev: 031308

KIFF Analytical LLC

SAMPLE RECEIPT CHECKLIST

RECEIVER: TJB (Initials)

SRG#: 83842 Date: 012413

Project ID: #25983 1013 GWM

Method of Receipt: ☐ Courier ☐ Over-the-counter ☒ Shipper

Shipping Only: ☐ FedEx * ☐ OnTrac * ☒ Greyhound ☐ Other *Service level if not Priority or Sunrise (M-F): _____

COC Inspection

Is COC present?	☒ Yes	☐ No	
Custody seals on shipping container?	☒ Intact	☐ Broken	☐ Not present ☐ N/A
Is COC Signed by Relinquisher? ☒ Yes ☐ No Dated?	☒ Yes	☐ No	
Is sampler name legibly indicated on COC?	☒ Yes	☐ No	
Is analysis or hold requested for all samples?	☒ Yes	☐ No	
Is the turnaround time indicated on COC?	☒ Yes	☐ No	
Is COC free of whiteout and uninitialed cross-outs?	☒ Yes	☐ No, Whiteout	☐ No, Cross-outs

Sample Inspection

Coolant Present: ☒ Yes ☐ No (includes water)

Temperature °C 3.8 Therm. ID# IR-1 Initial TJB Date/Time 012413/0928 ☐ N/A

Are there custody seals on sample containers?	☐ Intact	☐ Broken	☒ Not present	
Do containers match COC? ☒ Yes ☐ No	☐ No, COC lists absent sample(s)	☐ No, Extra sample(s) present		
Are there samples matrices other than soil, water, air or carbon?	☐ Yes	☒ No		
Are any sample containers broken, leaking or damaged?	☐ Yes	☒ No		
Are preservatives indicated? ☐ Yes, on sample containers	☒ Yes, on COC	☐ Not indicated	☐ N/A	
Are preservatives correct for analyses requested?	☒ Yes	☐ No	☐ N/A	
Are samples within holding time for analyses requested?	☒ Yes	☐ No		
Are the correct sample containers used for the analyses requested?	☒ Yes	☐ No		
Is there sufficient sample to perform testing?	☒ Yes	☐ No		

Does any sample contain product, have strong odor or are otherwise suspected to be hot? ☐ Yes ☒ No

Receipt Details

Matrix WA	Container type VOA	# of containers received 12
Matrix _____	Container type _____	# of containers received _____
Matrix _____	Container type _____	# of containers received _____

Date and Time Sample Put into Temp Storage Date: 012413 Time: 0936

Quicklog

Are the Sample ID's indicated:	☐ On COC	☐ On sample container(s)	☒ On Both	☐ Not indicated
If Sample ID's are listed on both COC and containers, do they all match?	☒ Yes	☐ No	☐ N/A	
Is the Project ID indicated:	☐ On COC	☐ On sample container(s)	☒ On Both	☐ Not indicated
If project ID is listed on both COC and containers, do they all match?	☒ Yes	☐ No	☐ N/A	
Are the sample collection dates indicated:	☐ On COC	☐ On sample container(s)	☒ On Both	☐ Not indicated
If collection dates are listed on both COC and containers, do they all match?	☒ Yes	☐ No	☐ N/A	
Are the sample collection times indicated:	☐ On COC	☐ On sample container(s)	☒ On Both	☐ Not indicated
If collection times are listed on both COC and containers, do they all match?	☒ Yes	☐ No	☐ N/A	

COMMENTS:

WORK REQUEST FORM

Stantec

JOB NAME:	7-Eleven 25983	JOB NUMBER:	185750040
SITE ADDRESS:	3541 Martin Way Olympia, Wa	START DATE:	1/18/13
PREPARED FOR:	Emily Harper	PREPARED BY:	Emily Harper
	NOTE:	REVIEWED BY:	Paul Fairbairn

WORK DESCRIPTION:

1. Review H&S Plan.
2. Arrive onsite and check in with Station Manager and contact Paul Fairbairn. .
3. Review HASP, conduct Health and Safety briefing and perform Site Walk to determine any traffic flow.
4. Gauge all site wells following gauging order on Sampling Request Form.
5. Low-flow purge and sample wells following the sampling order provided.
6. Take a drum for purge water. Store purge water in drums onsite, make sure they are labeled properly and secured.
7. Take an inventory of all waste drums generated by Stantec at the site, and mark locations on site plan.
8. Call Paul Fairbairn in the office prior to leaving the site.

Job Numbers:
All Groundwater Sampling
185750040.230.0700

Contacts Information:
Paul Fairbairn in Stantec Office: (425) 298-1016 or (206) 369-8383

7-Eleven Environmental Manager: Jose Rios

ANALYTICAL REQUIREMENTS:	EQUIPMENT NEEDED:
NWTPH-Gx	H&S plan
BTEX 8260	Safety Equipment
	Delineators
	Mini cooler for product sample
	Low-Flow Purging/Sampling Equipment
	Oil/Water Interface Probe
	Disposable bailers/ Rope
	Peristaltic Pump & Tubing
	Drum and labels

AUTHORIZATION : _____ COMPLETED: _____

Stantec

1st QUARTER 2013 SAMPLING REQUEST

7-Eleven Service Station No. 25983 located at 3541 Martin Way; Olympia, WA

Project No.	Task		Project Manager	Date		Lab:		Client Contact:
185750040	230.0700		Paul Fairbairn			Kiff		Jose Rios

Well Number	Gaug. Freq.	Gaug. Order	Samp. Freq.	Samp. Order	Analyses	Well Depth	Top of Screen	Casing Dia.	Depth of Pump intake (ft bTOC)	Comments
MW-1	Annual	5	Annual	5	NWTPHG, BTEX 8260					
MW-2	Annual	4	Annual	4	NWTPHG, BTEX 8260					
MW-3	Annual	1	Annual	1	NWTPHG, BTEX 8260					DAMAGED WELL HEAD
MW-4	Annual	2	Annual	2	NWTPHG, BTEX 8260					
MW-5	Annual	3	Annual	3	NWTPHG, BTEX 8260					

Notes:

*Review and sign HASP prior to arriving on site. Check in with station manager and Stantec Project Manager Paul Fairbairn: Cell: 206 369 8383; Office: 425 298 1016

* Implement Stantec low flow purging and sampling procedures.

*All wells will be sampled for NWTPH-Gx, BTEX 8260

*The wells are now historically clean, if product or sheen is found, use Stop Work Authority and contact the 7-Eleven Project Manager Paul Fairbairn immediately.

*Please gauge all selected wells first and proceed to sample all wells unless otherwise noted.

*Store water in drum on-site. Label drum with contents with a Non Hazardous Waste Drum label and note in the field log

No. wells gauged without sampling: 0

Total wells sampled: 4

Gallons Purged:

SITE VISITATION REPORT
1Q13 - 7-Eleven Service Station No. 25983 - Olympia, WA

Stantec

Name(s) Emily Harper Date: 1/18/13 Time of Arrival Call-In: 9:20

Arrival Time: 9:20 Departure Time: 15:15 Time of Departure Call-In 15:13

Who did you call? Paul Fairba

5-gallon plastic bucket with lid was used to purge water, no drums.

DRUM INVENTORY

0	WATER	0	CARBON	TOTAL OPEN TOP	0
0	SOIL	0	EMPTY	TOTAL BUNG TOP	0

HEALTH AND SAFETY ASSESSMENT

TRAFFIC - USE DELIN/FENCE
COLD + ICY SURFACES
PROPER PPE
PINCH PTS
LIFTING

DESCRIPTION OF ACTIVITIES ONSITE AND NOTES

9:20 - ARRIVE & CALL PAUL
9:25 - PPE
9:30 - NOTIFY MGR ARRIVAL
9:35 - SET UP DECON STA + DELIN, GAUGE MW3
9:59 - MW-3 DAMAGED, MOVING ONTO MW-4
10:00 - MW4 GAUGE
10:15 - MW 5 GAUGED
10:28 - MW 2 GAUGED
10:35 - MW-1 GAUGED
10:43 - SET UP BAILER + HORIBA
11:14 - BAIL + SAMPLE MW-4
12:06 - BAIL + SAMPLE MW-5
12:49 - SAMPLE MW-2
13:15 - O/W INTERFACE GAUGE NOT WORKING - TRY TO FIX
13:35 - WAIT FOR CAR TO MOVE OFF MW-1, INTERFACE STILL BROKEN
14:00 - BEGIN SAMPLING MW-1
14:43 - CLEAN UP + DECON
15:13 - CHECK OUT + CALL PAUL
15:13 - DEPART

EH 1/18/13

Stantec

HYDROLOGIC DATA SHEET

Gauge Date: 1/18/13 **Project Name:** 7-Eleven #25983

Field Technician: Emily Harper **Project Number:** 185750040

DTP = Depth to Free Product (FP or NAPH) Below TOC
DTW = Depth to Groundwater Below TOC
DTB = Depth to Bottom of Well Casing Below TOC

Flow through cell calibrated Y____ N____

Wells checked for product and gauged prior to commencement of bailing or purging the wells Y X N____

WELL OR LOCATION	WELL SCREEN DEPTH	PROPOSED INTAKE RANGE (feet below TOC)	MEASUREMENTS				PURGE? (Y/N)	SHEEN? (Y/N)	SAMPLE? (Y/N)	COMMENTS / PROBE CALIBRATION
			TIME	DTP (feet)	DTW (feet)	DTB (feet)				
MW-1			10:35		24.51	36.11	Y	N		ICED WELL
MW-2			10:28		25.13	30.91	Y	N		4" DIAM.
MW-3			9:48		–	–	N	X	N	DAMAGED CASING INACCESSIBLE
MW-4			10:00		24.32	33.25	X	N		SEALED CAP
MW-5			10:15		26.00	34.80	Y	N		

PIPE DAMAGED SEE PICS

Stantec

WATER SAMPLE FIELD DATA SHEET

Stantec
PROJECT #: 185750040
CLIENT NAME: 7-Eleven
LOCATION: 3541 Martin Way; Olympia, WA

PURGED & SAMPLED BY: Emily Harper

WELL & SAMPLE ID: MW-4

DATE PURGED & SAMPLED: 1/18/13

START (2400hr): 11:15
END (2400hr):
SAMPLE TIME (2400hr): 11:39
LOW-FLOW USED: NO → BAILER

SAMPLE TYPE: Groundwater x | Surface Water | Treatment Effluent | Other

CASING DIAMETER: 2" x (0.64) | 3" (1.44) | 4" (2.45)
Casing Volume: (liters per foot)

DEPTH TO BOTTOM (feet) = 33.25
DEPTH TO WATER (feet) = 24.32
WATER COLUMN HEIGHT (feet) = 8.93

ACTUAL PURGE (GL) = 1.75L

FIELD MEASUREMENTS

DATE	TIME (2400hr)	VOLUME (L)	TEMP. (degrees F)	CONDUCTIVITY (µS/cm)	pH (units)	COLOR (visual)	O.R.P.
1/18/13	1124	1.75L	12.7	.115	6.59	CLEAR	226
	1127	1.75L	12.6	.115	6.08	CLEAR	220
	1130	1.75L	12.4	.116	6.06	CLEAR	210
	1133	1.75L	12.2	.117	6.04	CLEAR	206
↓	1136	1.75L	12.0	.117	5.99	CLEAR	200
							1/18/13
Calculated Variance of Final Three Samples:							
Acceptable Variance Limits:			≤ 10%	≤ 3%	≤ 0.1		≤ 10%

DEPTH TO PURGE INTAKE DURING PURGE: N/A
SAMPLE DTW: 25.91

QTY OF SAMPLE VESSELS & PRESERVATIVE:
3 HCL VOA's per well

ANALYSES:
NWTPH-g
BTEX 8260

PURGING EQUIPMENT:
~~Cole-Palmer Peristaltic Pump~~
BAILER

SAMPLING EQUIPMENT:
Horiba U-22

Flow Through Cell Disconnected Prior to Sample Collection?: YES ____ NO ____ N/A

WELL PAD CONDITION: POOR - SEALED OVER CUT THRU BLACK TOP SEALER
WELL CASING CONDITION: GOOD
WELL VAULT CONDITION: FAIR
SEAL PRESENT?: NO
BOLTS PRESENT?: NO
WELL INTEGRITY: GOOD
WELL TAG: N/A
LOCK#: N/A

REMARKS: BAILED WELL

SIGNATURE:

Stantec

WATER SAMPLE FIELD DATA SHEET

Stantec

PROJECT #: 185750040 **PURGED & SAMPLED BY:** **WELL & SAMPLE ID:**

CLIENT NAME: 7-Eleven Emily Harper MW-5

LOCATION: 3541 Martin Way; Olympia, WA

DATE PURGED & SAMPLED 1/18/13 START (2400hr) 12:06 END (2400hr)

SAMPLE TIME (2400hr) 12:28 LOW-FLOW USED NO

SAMPLE TYPE: Groundwater x Surface Water Treatment Effluent Other

CASING DIAMETER: 2" X (0.64) 3" (1.44) 4" (2.45)

Casing Volume: (liters per foot)

DEPTH TO BOTTOM (feet) = 34.80

DEPTH TO WATER (feet) = 26.00

WATER COLUMN HEIGHT (feet) = 8.80

ACTUAL PURGE (GL) = 2.00L

FIELD MEASUREMENTS

DATE	TIME (2400hr)	VOLUME (L)	TEMP. (degrees C)	CONDUCTIVITY (µS/cm)	pH (units)	COLOR (visual)	O.R.P.
1/18/13	12:13	2.00L	12.7	.148	6.50	MRKY/BRN	143
	12:16	2.00	12.8	.155	6.49	MRKY/BRN	145
	12:19	2.00	12.6	.155	6.48	MRKY/BRN	148
	12:22	2.00	12.0	.155	6.49	MRKY/BRN	163
	12:25	2.00	11.7	.155	6.48	MRK/BRN	171
							EA 1/18/13
Calculated Variance of Final Three Samples:							
Acceptable Variance Limits:			≤ 10%	≤ 3%	≤ 0.1		≤ 10%

DEPTH TO PURGE INTAKE DURING PURGE: N/A SAMPLE DTW: 25.95

QTY OF SAMPLE VESSELS & PRESERVATIVE:

3 HCL VOA's per well

ANALYSES:

NWTPH-g

BTEX 8260

PURGING EQUIPMENT:	SAMPLING EQUIPMENT:
~~Cole-Palmer Peristaltic Pump~~ BAILER	Horiba U-22

Flow Through Cell Disconnected Prior to Sample Collection?: YES NO N/A

WELL PAD CONDITION: Good WELL CASING CONDITION:

WELL VAULT CONDITION: Good SEAL PRESENT?: NO BOLTS PRESENT?: YES-3

WELL INTEGRITY: Good WELL TAG: N/A LOCK#: N/A

REMARKS: USED BAILER TO RETRIEVE WATER FOR SAMPLING.

SIGNATURE:

Stantec

WATER SAMPLE FIELD DATA SHEET

Stantec

PROJECT #: 185750040 **PURGED & SAMPLED BY:** Emily Harper **WELL & SAMPLE ID:** MW-2

CLIENT NAME: 7-Eleven

LOCATION: 3541 Martin Way; Olympia, WA

DATE PURGED & SAMPLED 1/18/13 START (2400hr) 12:47 END (2400hr) _____

SAMPLE TIME (2400hr) 13:09 LOW-FLOW USED YES

SAMPLE TYPE: Groundwater x Surface Water _____ Treatment Effluent _____ Other _____

CASING DIAMETER: 2" _____ 3" _____ 4" 6

Casing Volume: (liters per foot) (0.64) (1.44) (2.45)

DEPTH TO BOTTOM (feet) = 36.91

DEPTH TO WATER (feet) = 25.13

WATER COLUMN HEIGHT (feet) = 11.78

ACTUAL PURGE (~~GAL~~ L) = 1.25 L

FIELD MEASUREMENTS

DATE	TIME (2400hr)	VOLUME (L)	TEMP. (degrees F)	CONDUCTIVITY (µS/cm)	pH (units)	COLOR (visual)	O.R.P.
1/18/13	12:54	.15 L	11.9	.189	6.28	MRKY/LT BRN	208
	12:57	.45 L	11.6	.191	6.22	MRKY/LT BRN	213
	13:00	.55 L	11.4	.191	6.19	MRKY/LT BRN	217
	13:03	.90 L	11.3	.188	6.16	MRKY/LT BRN	219
↓	13:06	1.25 L	11.3	.186	6.16	MRKY/LT BRN	221
Calculated Variance of Final Three Samples:							
Acceptable Variance Limits:			≤ 10%	≤ 3%	≤ 0.1		≤ 10%

CW 1/18/13

DEPTH TO PURGE INTAKE DURING PURGE: 35.41 SAMPLE DTW: N/A

QTY OF SAMPLE VESSELS & PRESERVATIVE:

3 HCL VOA's per well

ANALYSES:

NWTPH-g

BTEX 8260

PURGING EQUIPMENT:	SAMPLING EQUIPMENT:
Cole-Palmer Peristaltic Pump	Horiba U-22

Flow Through Cell Disconnected Prior to Sample Collection?: YES Y NO _____

WELL PAD CONDITION: GOOD WELL CASING CONDITION: GOOD

WELL VAULT CONDITION: GOOD SEAL PRESENT?: YES BOLTS PRESENT?: NO

WELL INTEGRITY: GOOD WELL TAG: N/A LOCK#: N/A

REMARKS: LOW FLOW USED

SIGNATURE: _____

Stantec

WATER SAMPLE FIELD DATA SHEET

Stantec

PROJECT #: 185750040 **PURGED & SAMPLED BY:** Emily Harper **WELL & SAMPLE ID:** MW-1

CLIENT NAME: 7-Eleven

LOCATION: 3541 Martin Way; Olympia, WA

DATE PURGED & SAMPLED 1/18/13 START (2400hr) 1400 END (2400hr) _____

SAMPLE TIME (2400hr) 14:28 LOW-FLOW USED YES

SAMPLE TYPE: Groundwater x Surface Water _____ Treatment Effluent _____ Other _____

CASING DIAMETER: 2" x (0.64) 3" _____ (1.44) 4" _____ (2.45)

Casing Volume: (liters per foot)

DEPTH TO BOTTOM (feet) = 36.11

DEPTH TO WATER (feet) = 24.51

WATER COLUMN HEIGHT (feet) = 11.60

ACTUAL PURGE (L) = .85 L

FIELD MEASUREMENTS

DATE	TIME (2400hr)	VOLUME (L)	TEMP. (degrees F)	CONDUCTIVITY (µS/cm)	pH (units)	COLOR (visual)	O.R.P.
1/18/13	14:13	.15 L	11.4	.160	6.33	MRKY/BRN	231
	14:16	.25 L	11.1	.160	6.24	MRKY/LT BRN	225
	14:19	.45 L	11.0	.161	6.21	MRKY/LT BRN	218
	14:22	.75 L	11.1	.160	6.21	MRKY/LT BRN	209
	14:25	.85 L	11.3	.160	6.21	MRKY/LT BRN	202
Calculated Variance of Final Three Samples:							
Acceptable Variance Limits:			≤ 10%	≤ 3%	≤ 0.1		≤ 10%

CH 1/18/13

DEPTH TO PURGE INTAKE DURING PURGE: 35.11 SAMPLE DTW: N/A

QTY OF SAMPLE VESSELS & PRESERVATIVE:

3 HCL VOA's per well

ANALYSES:

NWTPH-g

BTEX 8260

PURGING EQUIPMENT:	SAMPLING EQUIPMENT:
Cole-Palmer Peristaltic Pump	Horiba U-22

Flow Through Cell Disconnected Prior to Sample Collection?: YES ~~NO~~ NO _____

WELL PAD CONDITION: Good WELL CASING CONDITION: Good

WELL VAULT CONDITION: POOR SEAL PRESENT?: NO BOLTS PRESENT?: YES-3

WELL INTEGRITY: FAIR WELL TAG: N/A LOCK#: N/A

REMARKS: ICE AROUND WELL CAP LIFTED IT & SURFACE WATER LEAKED INSIDE MOST LIKELY BETWEEN LAST SAMPLING

SIGNATURE:

KIFF Analytical LLC

2795 2nd Street, Suite 300
Davis, CA 95618
Lab: 530.297.4800
Fax: 530.297.4802

SRG # / Lab No. _____ Page ___ of ___

Chain-of-Custody Record and Analysis Request

Project Contact (Hardcopy or PDF To):	Washington EIM Report? ☑ Yes ☐ No
Company / Address: STANTEC CONSULTING 12034 134th CT NE ST 102 REDMOND, WA	User Location ID:
Phone Number: 425-298-1016	User Study ID:
Fax Number: 425-298-1019	Bill to:
Project #: 185750040 / P.O. #:	Sampler Print Name: EMILY HARPER
Project Name: #25983 1013 GWM	Sampler Signature:
Project Address:	

Sample Designation	Date	Time	Sampling	Container: 40 ml VOA	Container: Sleeve	Container: Poly	Container: Glass	Container: Tedlar	Preservative: HCl	Preservative: HNO_3	Preservative: None	Matrix: Water	Matrix: Soil	Matrix: Air
MW-1	1/18/13	14:28		X					X			X		
MW-2	1/18/13	13:09		X					X			X		
MW-4	1/18/13	11:39		X					X			X		
MW-5	1/18/13	12:28		X					X			X		

Analysis Request

MTBE @ 0.5 ppb (EPA 8260B)	BTEX (EPA 8260B)	NW-TPH Gx	5 Oxygenates (MTBE, DIPE, ETBE, TAME, TBA) (EPA 8260B)	7 Oxygenates (5 oxy + EtOH, MeOH) (EPA 8260B)	Lead Scav. (1,2 DCA & 1,2 EDB) (EPA 8260B)	Volatile Halocarbons (EPA 8260B)	Volatile Organics Full List (EPA 8260B)	Volatile Organics (EPA 524.2 Drinking Water)	TPH as Diesel (EPA 8015M)	TPH as Motor Oil (EPA 8015M)	CAM 17 Metals (EPA 200.7 / 6010)	5 Waste Oil Metals (Cd,Cr,Ni,Pb,Zn) (EPA 200.7 / 6010)	Mercury (EPA 245.1 / 7470 / 7471)	Total Lead (EPA 200.7 / 6010)	W.E.T. Lead (STLC)	NW-TPHDx
	X	X														
	X	X														
	X	X														
	X	X														

circle method

TAT: ☐ 12 hr ☐ 24 hr ☐ 48hr ☐ 72hr ☑ 1 wk

For Lab Use Only

Relinquished by:	Date	Time	Received by:
	1/18/13	17:45	
Relinquished by:	Date	Time	Received by:
Relinquished by:	Date	Time	Received by Laboratory:

Remarks:

For Lab Use Only: Sample Receipt

Temp °C	Initials	Date	Time	Therm. ID #	Coolant Present
					Yes / No

Distribution: White - Lab; Pink - Originator
Rev: 031308

STANTEC MONITORING WELL PURGING AND SAMPLING PROCEDURES

Monitoring well purging and sampling was conducted using U.S. Environmental Protection Agency (EPA) approved low-flow sampling techniques.

Purging Procedures

A. Using a decontaminated instrument (i.e., tape measure, continuity meter, or interface probe) measure the depth to groundwater in reference to the measuring point at the top of the casing. Measure the total depth of the well to calculate the height and volume of water in the borehole.

B. Based on previously obtained data, if a monitoring well is suspected of containing liquid-phase hydrocarbon (LPH) concentrations, lower a transparent bailer into the well to evaluate the presence of a LPH sheen on the water table.

C. Decontaminate the purge pump and/or PVC bailers by scrubbing in Alconox detergent solution, followed by a tap water rinse and then a deionized water rinse.

D. Purge, by low-flow pumping (less than 0.5 liters per minute) for approximately five minutes. If low-flow purging is not possible and bailing is used to purge the well, then a minimum of three well volumes will be removed. If the well goes dry, the procedure listed in step E2 (below) should be followed. Parameters should be measured after each ½-casing volume is removed.

E. Conduct field measurements (i.e., pH, specific conductivity, temperature, and oxidation-reduction potential) note clarity, color, turbidity, and odor of purge water, and measure depth to groundwater.

1. If the well has not been purged dry, continue to pump and conduct field measurements (including depth to water) again every five minutes during purging.

    a) If the first through third series of measurements vary by less than 10 percent, the well has been adequately purged. Allow the well to recover to 80 percent of its static condition and begin the sampling procedure.

    b) If the measurements vary by 10 percent or greater, repeat Step E1 above.

    c) If a minimum of three parameters cannot be measured during purging, remove three well volumes prior to sampling.

2. If the well has been purged dry, measure the water level and allow the well to recharge to 80 percent, or for two hours, whichever occurs first. Calculate the percent recovery, and begin the sampling procedure.

Sampling Procedures

- Use the pump to collect the groundwater sample.
- Transfer the groundwater sample into the appropriate container(s). Where applicable, some containers are completely filled to achieve zero headspace. Label the samples according to location and date of collection.
- Enter the samples into Chain-of-Custody and preserve on ice until delivery to the analytical laboratory. Complete the Well Development or Purging/Sampling Log to be stored in the project file.

When requested by the client, collect a bailer rinse blank of deionized water to check decontamination procedure. In addition, trip blanks prepared by the laboratory and kept with the samples may be included to check for cross contamination of samples within the cooler. Additional and/or alternate QA/QC samples can be collected and analyzed upon client request.