ARCADIS Geraghty Miller
BC Laboratory Number: 99-02656
Client Reference: ILM Groundwater

CASE NARRATIVE
Date: 05/11/99
Page 1

SAMPLE RECEIPT:

BC Laboratories, Inc (BCL) received a total of 8 samples, and 1 trip blank on 03-03-99 at 1925. The samples were collected by Arcadis Geraghty Miller on 03-03-99 and were received by a BCL courier from the site and transported to the laboratory. The samples were logged into the Laboratory Information Management System (LIMS) and BCL numbers were assigned to each sample. The result of the temperature check was 5.7 and 5.3 °C and was recorded on the cooler receipt form. No discrepancies were found on the chain of custody (COC) or the samples.

ORGANICS:

In accordance with the COC, EPA method 8260B for VOC's, 8015M for Fuel fingerprint were performed on designated samples. Copies of the Calibration, Method Blanks, LCS, duplicates, and MS/MDS if applicable are included in the following package. All holding times and quality control requirements were met except for the following:

EPA 8260

The internal end CCV and BFB exceeded the 12-hour time requirement. The matrix spike (MS) and the matrix spike duplicate (MSD) associated with samples 99-2656-1-9TB had low recovery of Bromodichloromethane outside the laboratory QC limits. Accuracy was verified through LCSW. The reports have been flagged accordingly.

INORGANICS:

In accordance with the COC, EPA method 6000/7000 for 17 metals and hexavalent chromium was performed on designated samples. Copies of the Calibration, Method Blanks, LCS, duplicates, and MS/MDS if applicable are included in the following package. All holding times and quality control requirements were met except for the following:

ARCADIS Geraghty Miller
BC Laboratory Number: 99-02656
Client Reference: ILM Groundwater

CASE NARRATIVE
Date: 05/11/99
Page 2

17 Metals

The matrix spike (MS) and matrix spike duplicate (MSD) associated with samples 99-02656-1, 3-8 had high recovery of total Titanium outside the laboratory QC limits. Accuracy was verified through LCSW. The reports have been flagged accordingly.

Data Package reviewed by: 5-11-99
Date

CHAIN OF CUSTODY

BC LABORATORIES, INC. 4100 Atlas Court - Bakersfield, CA 93308 (805) 327-4911 - FAX (805) 327-1918

Report To: Arcadis
Name: Geraghty + Miller
Address: 1400 N Harbor
City: Fullerton
State: CA Zip:
Attn: Teresa Wilson
Phone (714) 278-0992

Project: Former ILM
Project #: CA000280020000 2
Sampler Name: Teeple / J. Newman
Submission #: 99-2656

Lab #	Sample Description	Date & Time Sampled	8260	8015M FP	CR6+	Inorganic Chemical Metals	Inorganic Chem. Metals FILTERED	MATRIX (DW - Drinking Water, GW - Ground Water, WW - Waste Water, S - Soil, O - Oil, SL - Sludge, M - Miscellaneous)	Turn Around Time Requested	Number and Container Type
-1	P-6B	3-3-99 / 0950	X	X	X	X	X	GW	NTAT	3 VOAs 1 plastic 1 amber
-2	EB-2	3-2-99 / 1700	X					PI		3 VOAs
-3	P-24	3-3-99 / 1630	X	X	X	X	X	GW		3 VOAs 1 plastic 1 amber
-4	P-9B	3-3-99 / 1215	X	X	X	X	X			
-5	P-22	3-3-99 / 1335	X	X	X	X	X			
-6	P-12	3-3-99 / 1545	X	X	X	X	X			
-7	P-2	3-2-99 1520	X	X	X	X	X			
-8	P-16C	3-2-99 1645	X	X	X	X	X			

DISTRIBUTION: MA, RP, TC, CS, JB

*Run -7 & -8 per Tim

NUMBERING CHECKED BY

5 DAY RUSH ok per SB, RP.

Billing Information:
Name: Same as above
Address:
City State Zip
Attention:
PO #

BC Lab. Field Service
Time : Miles:
Equipment: Flat Rate:

Report Drinking Water on State Form ? Y / N
Send Copy to State of Calif. Y / N

Comments: 24 hr Turn Around on CR6+ (?) & Filtered metals (?)

Relinquished by: (Signature)	Received by: (Signature)	Date:	Time:
Timothy Teeple	[illegible]	3-3-99	1643
[illegible]	Chrissy Ford	3-3-99	1925

Revised 5/97....Sample Disposal by BC Labs may be billed at $5.00 / sample for non-aqueous Samples:

2552

BOE-C6-0234597

BC LABORATORIES INC. **SAMPLE RECEIPT FORM** Rev. No.6 10/13/98 Page 1 Of 2

Submission #: 99-2656 Project Code:

SHIPPING INFORMATION

Federal Express ☐ UPS ☐ Hand Delivery ☐
BC Lab Field Service ☒ Other ☐ (Specify) _____

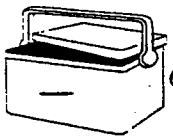
SHIPPING CONTAINER

Ice Chest ☒ None ☐
Box ☐ Other ☐ (Specify) _____

Refrigerant: Ice ☒ Blue Ice ☐ None ☐ Other ☐ Comments:

Custody Seals: Ice Chest ☐ Intact? Yes ☐ No ☐ Containers ☐ Intact? Yes ☐ No ☐ None ☒ Comments:

All samples received? Yes ☒ No ☐ All samples containers intact? Yes ☒ No ☐ Description(s) match COC? Yes ☒ No ☐



Form #1

Ice Chest ID Red/white Date/Time 3/3/99 19:58
Temperature: 5.7 °C
Thermometer ID: 17 Analyst Init CFORD
Emissivity .90
Container TBlank

Ice Chest ID _____ Date/Time _____
Temperature: _____ °C
Thermometer ID: _____ Analyst Init _____
Emissivity _____
Container _____

SAMPLE NUMBERS

SAMPLE CONTAINERS	1	2	3	4	5	6	7 (EW) TB	8	9	10	11	12	1	2	3	4	5	6	7	8	9	10	11	12
QT GENERAL MINERAL/ GENERAL PHYSICAL			1	1	1	1																		
PT PE UNPRESERVED																								
QT INORGANIC CHEMICAL METALS			2	2	2	2																		
PT INORGANIC CHEMICAL METALS																								
PT CYANIDE																								
PT NITROGEN FORMS																								
PT TOTAL SULFIDE																								
2oz. NITRATE / NITRITE																								
00ml TOTAL ORGANIC CARBON																								
QT TOX																								
PT CHEMICAL OXYGEN DEMAND																								
100ml PHENOLICS																								
40ml VOA VIAL TRAVEL BLANK							3																	
40ml VOA VIAL			3	3	3	3																		
QT EPA 413.1, 413.2, 418.1																								
PT ODOR																								
RADIOLOGICAL																								
BACTERIOLOGICAL																								
PT EPA 504																								
QT EPA 508/608/8080																								
QT EPA 515.1/8150																								
QT EPA 525																								
QT EPA 525 TRAVEL BLANK																								
100ml EPA 547																								
100ml EPA 531.1																								
QT EPA 548																								
QT EPA 549																								
QT EPA 632																								
QT EPA 8015M			1	1	1	1																		
QT QA/QC																								
QT AMBER																								
8 OZ. JAR																								
32 OZ. JAR																								
SOIL SLEEVE																								
CB VIAL																								
PLASTIC BAG																								

Comments:

Sample Numbering Completed By: CFORD Date/Time: 3/3/99 2230

[F:\WP80\LAB_DOCS\FORMS\SAMREC2.WP]

BC LABORATORIES INC. **SAMPLE RECEIPT FORM** Rev. No.6 10/13/98 Page 2 Of 2

Submission #: 99-2656 **Project Code:**

SHIPPING INFORMATION

Federal Express ☐ UPS ☐ Hand Delivery ☐
BC Lab Field Service ☒ Other ☐ (Specify) _____

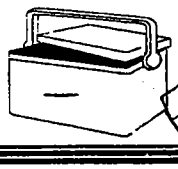
SHIPPING CONTAINER

Ice Chest ☒ None ☐
Box ☐ Other ☐ (Specify) _____

Refrigerant: Ice ☒ Blue Ice ☐ None ☐ Other ☐ Comments:

Custody Seals: Ice Chest ☐ Intact? Yes ☐ No ☐ Containers ☐ Intact? Yes ☐ No ☐ None ☒ Comments:

All samples received? Yes ☒ No ☐ All samples containers intact? Yes ☒ No ☐ Description(s) match COC? Yes ☒ No ☐



Form #2

Ice Chest ID Blue/White Date/Time 3-3-99 20:25
Temperature: 5.3 °C
Thermometer ID: 17 Analyst Init CFORD
Emissivity .90
Container QT PE

Ice Chest ID _____ Date/Time _____
Temperature: _____ °C
Thermometer ID: _____ Analyst Init _____
Emissivity _____
Container _____

SAMPLE CONTAINERS	SAMPLE NUMBERS 1	2	3	4	5	6	7	8	9	10	11	12	1	2	3	4	5	6	7	8	9	10	11	12
QT GENERAL MINERAL/ GENERAL PHYSICAL	1	1					1	1																
PT PE UNPRESERVED			CF 3/3/99																					
QT INORGANIC CHEMICAL METALS	2	2	3				2	2																
PT INORGANIC CHEMICAL METALS																								
PT CYANIDE																								
PT NITROGEN FORMS																								
PT TOTAL SULFIDE																								
2oz. NITRATE / NITRITE																								
100ml TOTAL ORGANIC CARBON																								
QT TOX																								
PT CHEMICAL OXYGEN DEMAND																								
100ml PHENOLICS																								
40ml VOA VIAL TRAVEL BLANK																								
40ml VOA VIAL	3	3				3	3																	
QT EPA 413.1, 413.2, 418.1																								
PT ODOR																								
RADIOLOGICAL																								
BACTERIOLOGICAL																								
PT EPA 504																								
QT EPA 508/608/8080																								
QT EPA 515.1/8150																								
QT EPA 525																								
QT EPA 525 TRAVEL BLANK																								
100ml EPA 547																								
100ml EPA 531.1																								
QT EPA 548																								
QT EPA 549																								
QT EPA 632																								
QT EPA 8015M	1						1	1																
QT QA/QC																								
QT AMBER																								
8 OZ. JAR																								
32 OZ. JAR																								
SOIL SLEEVE																								
PCB VIAL																								
PLASTIC BAG																								

Comments: _____

Sample Numbering Completed By: CFORD Date/Time: 3/3/99 2232 [F:\WP80\LAB_DOCS\FORMS\SAMREC2.WPD]

BC LABORATORIES

WATER ANALYSIS
(METALS)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/17/99
Date Received: 03/03/99
Laboratory No.: 99-02656-1

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-6B
Sampling Date/Time: 03/03/99 @ 09:50AM
Sample Collected By: TEEPLE/J.NEWMAN

Constituents	Results	Units	P.Q.L.	Method	Date Prepared	Date Analyzed	Dilution Factor
Dissolved Aluminum	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Antimony	None Detected	µg/L	100.	EPA-6010	03/03/99	03/11/99	1
Dissolved Arsenic	2.3	µg/L	2.	SM-3114B	03/08/99	03/11/99	1
Dissolved Barium	268.	µg/L	100.	EPA-6010	03/03/99	03/11/99	1
Dissolved Beryllium	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Cadmium	None Detected	µg/L	5.	EPA-6010	03/03/99	03/11/99	1
Dissolved Chromium	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Hexavalent Chromium	4.9	µg/L	2.	EPA-7196	03/04/99	03/04/99	1
Dissolved Cobalt	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Copper	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Iron	53.	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Lead	None Detected	µg/L	5.	EPA-7421	03/03/99	03/05/99	1
Dissolved Mercury	None Detected	µg/L	0.2	EPA-7470	03/12/99	03/12/99	1
Dissolved Molybdenum	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Nickel	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Selenium	None Detected	µg/L	2.	SM-3114B	03/08/99	03/10/99	1
Dissolved Silver	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Titanium	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Thallium	None Detected	µg/L	1.	EPA-7841	03/03/99	03/05/99	1
Dissolved Vanadium	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Zinc	12.	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Total Aluminum	38500.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Antimony	None Detected	µg/L	100.	EPA-6010	03/05/99	03/06/99	1
Total Arsenic	12.	µg/L	2.	SM-3114B	03/08/99	03/11/99	1
Total Barium	556.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Beryllium	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Cadmium	None Detected	µg/L	5.	EPA-6010	03/05/99	03/06/99	1
Total Chromium	66.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Cobalt	19.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Copper	53.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Iron	44600.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Lead	26.	µg/L	5.	EPA-7421	03/05/99	03/05/99	2
Total Mercury	None Detected	µg/L	0.2	EPA-7470	03/12/99	03/12/99	1
Total Molybdenum	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Nickel	50.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Selenium	None Detected	µg/L	2.	SM-3114B	03/08/99	03/10/99	1
Total Silver	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Titanium	*1 1970.	µg/L	10.	EPA-6010	03/05/99	03/05/99	1
Total Thallium	None Detected	µg/L	5.0	EPA-7841	03/05/99	03/05/99	1
Total Vanadium	131.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Zinc	156.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1

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4100 Atlas Ct. · Bakersfield, CA 93308 · (805) 327-4911 · FAX (805) 327-1918

BC LABORATORIES

WATER ANALYSIS
(METALS)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/17/99
Date Received: 03/03/99
Laboratory No.: 99-02656-1

Sample Description: CA00028000200002, FORMER ILM, P-6B, 03/03/99 @ 09:50AM, TEEPLE/J.NEWMAN

P.Q.L. = Practical Quantitation Limit (refers to the least amount of analyte quantifiable based on sample size used and analytical technique employed).

Dissolved analysis reported on sample filtered and acidified in the field.

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.

Dan Schultz
Laboratory Director

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BC LABORATORIES

WATER ANALYSIS
(METALS)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/17/99
Date Received: 03/03/99
Laboratory No.: 99-02656-3

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-24
Sampling Date/Time: 03/03/99 @ 04:30PM
Sample Collected By: TEEPLE/J.NEWMAN

Constituents	Results	Units	P.Q.L.	Method	Date Prepared	Date Analyzed	Dilution Factor
Dissolved Aluminum	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Antimony	None Detected	µg/L	100.	EPA-6010	03/03/99	03/11/99	1
Dissolved Arsenic	3.6	µg/L	2.	SM-3114B	03/08/99	03/11/99	1
Dissolved Barium	120.	µg/L	100.	EPA-6010	03/03/99	03/11/99	1
Dissolved Beryllium	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Cadmium	None Detected	µg/L	5.	EPA-6010	03/03/99	03/11/99	1
Dissolved Chromium	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Hexavalent Chromium	5.6	µg/L	2.	EPA-7196	03/04/99	03/04/99	1
Dissolved Cobalt	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Copper	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Iron	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Lead	None Detected	µg/L	5.	EPA-7421	03/03/99	03/05/99	1
Dissolved Mercury	None Detected	µg/L	0.2	EPA-7470	03/12/99	03/12/99	1
Dissolved Molybdenum	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Nickel	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Selenium	None Detected	µg/L	2.	SM-3114B	03/08/99	03/10/99	1
Dissolved Silver	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Titanium	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Thallium	None Detected	µg/L	1.	EPA-7841	03/03/99	03/05/99	1
Dissolved Vanadium	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Zinc	16.	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Total Aluminum	5250.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Antimony	None Detected	µg/L	100.	EPA-6010	03/05/99	03/06/99	1
Total Arsenic	4.9	µg/L	2.	SM-3114B	03/08/99	03/11/99	1
Total Barium	144.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Beryllium	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Cadmium	None Detected	µg/L	5.	EPA-6010	03/05/99	03/06/99	1
Total Chromium	13.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Cobalt	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Copper	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Iron	5760.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Lead	None Detected	µg/L	5.	EPA-7421	03/05/99	03/05/99	2
Total Mercury	None Detected	µg/L	0.2	EPA-7470	03/12/99	03/12/99	1
Total Molybdenum	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Nickel	None Detected	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Selenium	None Detected	µg/L	2.	SM-3114B	03/08/99	03/10/99	1
Total Silver	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Titanium	*1 274.	µg/L	10.	EPA-6010	03/11/99	03/12/99	1
Total Thallium	None Detected	µg/L	5.0	EPA-7841	03/05/99	03/05/99	1
Total Vanadium	15.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Zinc	None Detected	µg/L	50.	EPA-6010	03/05/99	03/06/99	1

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4100 Atlas Ct. · Bakersfield, CA 93308 · (805) 327-4911 · FAX (805) 327-1918

BC LABORATORIES

WATER ANALYSIS
(METALS)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/17/99
Date Received: 03/03/99
Laboratory No.: 99-02656-3

Sample Description: CA00028000200002, FORMER ILM, P-24, 03/03/99 @ 04:30PM, TEEPLE/J.NEWMAN

P.Q.L. = Practical Quantitation Limit (refers to the least amount of analyte quantifiable based on sample size used and analytical technique employed).

Dissolved analysis reported on sample filtered and acidified in the field.

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.

for Dan Schultz
Laboratory Director

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BC LABORATORIES

WATER ANALYSIS
(METALS)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/17/99
Date Received: 03/03/99
Laboratory No.: 99-02656-4

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-9B
Sampling Date/Time: 03/03/99 @ 12:15PM
Sample Collected By: TEEPLE/J.NEWMAN

Constituents	Results	Units	P.Q.L.	Method	Date Prepared	Date Analyzed	Dilution Factor
Dissolved Aluminum	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Antimony	None Detected	µg/L	100.	EPA-6010	03/03/99	03/11/99	1
Dissolved Arsenic	None Detected	µg/L	2.	SM-3114B	03/08/99	03/11/99	1
Dissolved Barium	None Detected	µg/L	100.	EPA-6010	03/03/99	03/11/99	1
Dissolved Beryllium	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Cadmium	None Detected	µg/L	5.	EPA-6010	03/03/99	03/11/99	1
Dissolved Chromium	12.	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Hexavalent Chromium	22.	µg/L	2.	EPA-7196	03/04/99	03/04/99	1
Dissolved Cobalt	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Copper	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Iron	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Lead	None Detected	µg/L	5.	EPA-7421	03/03/99	03/05/99	1
Dissolved Mercury	None Detected	µg/L	0.2	EPA-7470	03/12/99	03/12/99	1
Dissolved Molybdenum	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Nickel	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Selenium	None Detected	µg/L	2.	SM-3114B	03/08/99	03/10/99	1
Dissolved Silver	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Titanium	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Thallium	None Detected	µg/L	1.	EPA-7841	03/03/99	03/05/99	1
Dissolved Vanadium	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Zinc	15.	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Total Aluminum	4600.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Antimony	None Detected	µg/L	100.	EPA-6010	03/05/99	03/06/99	1
Total Arsenic	2.3	µg/L	2.	SM-3114B	03/08/99	03/11/99	1
Total Barium	100.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Beryllium	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Cadmium	None Detected	µg/L	5.	EPA-6010	03/05/99	03/06/99	1
Total Chromium	32.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Cobalt	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Copper	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Iron	6530.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Lead	None Detected	µg/L	5.	EPA-7421	03/05/99	03/05/99	2
Total Mercury	None Detected	µg/L	0.2	EPA-7470	03/12/99	03/12/99	1
Total Molybdenum	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Nickel	None Detected	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Selenium	None Detected	µg/L	2.	SM-3114B	03/08/99	03/10/99	1
Total Silver	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Titanium	*1 295.	µg/L	10.	EPA-6010	03/11/99	03/12/99	1
Total Thallium	None Detected	µg/L	5.0	EPA-7841	03/05/99	03/05/99	1
Total Vanadium	15.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Zinc	None Detected	µg/L	50.	EPA-6010	03/05/99	03/06/99	1

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BC LABORATORIES

WATER ANALYSIS
(METALS)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/17/99
Date Received: 03/03/99
Laboratory No.: 99-02656-4

Sample Description: CA00028000200002, FORMER ILM, P-9B, 03/03/99 @ 12:15PM, TEEPLE/J.NEWMAN

P.Q.L. = Practical Quantitation Limit (refers to the least amount of analyte quantifiable based on sample size used and analytical technique employed).

Dissolved analysis reported on sample filtered and acidified in the field.

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.

for Dan Schultz
Laboratory Director

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WATER ANALYSIS
(METALS)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/17/99
Date Received: 03/03/99
Laboratory No.: 99-02656-5

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-22
Sampling Date/Time: 03/03/99 @ 01:35PM
Sample Collected By: TEEPLE/J.NEWMAN

Constituents	Results	Units	P.Q.L.	Method	Date Prepared	Date Analyzed	Dilution Factor
Dissolved Aluminum	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Antimony	None Detected	µg/L	100.	EPA-6010	03/03/99	03/11/99	1
Dissolved Arsenic	3.8	µg/L	2.	SM-3114B	03/08/99	03/11/99	1
Dissolved Barium	178.	µg/L	100.	EPA-6010	03/03/99	03/11/99	1
Dissolved Beryllium	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Cadmium	None Detected	µg/L	5.	EPA-6010	03/03/99	03/11/99	1
Dissolved Chromium	10.	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Hexavalent Chromium	18.	µg/L	2.	EPA-7196	03/04/99	03/04/99	1
Dissolved Cobalt	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Copper	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Iron	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Lead	None Detected	µg/L	5.	EPA-7421	03/03/99	03/05/99	1
Dissolved Mercury	None Detected	µg/L	0.2	EPA-7470	03/12/99	03/12/99	1
Dissolved Molybdenum	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Nickel	None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99	1
Dissolved Selenium	2.3	µg/L	2.	SM-3114B	03/08/99	03/10/99	1
Dissolved Silver	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Titanium	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Thallium	None Detected	µg/L	1.	EPA-7841	03/03/99	03/05/99	1
Dissolved Vanadium	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Dissolved Zinc	None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99	1
Total Aluminum	2200.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Antimony	None Detected	µg/L	100.	EPA-6010	03/05/99	03/06/99	1
Total Arsenic	4.2	µg/L	2.	SM-3114B	03/08/99	03/11/99	1
Total Barium	184.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Beryllium	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Cadmium	None Detected	µg/L	5.	EPA-6010	03/05/99	03/06/99	1
Total Chromium	25.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Cobalt	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Copper	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Iron	2420.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Lead	None Detected	µg/L	5.	EPA-7421	03/05/99	03/05/99	2
Total Mercury	None Detected	µg/L	0.2	EPA-7470	03/12/99	03/12/99	1
Total Molybdenum	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Nickel	None Detected	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Selenium	2.3	µg/L	2.	SM-3114B	03/08/99	03/10/99	1
Total Silver	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Titanium	*1 139.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Thallium	None Detected	µg/L	5.0	EPA-7841	03/05/99	03/05/99	1
Total Vanadium	12.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Zinc	None Detected	µg/L	50.	EPA-6010	03/05/99	03/06/99	1

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WATER ANALYSIS
(METALS)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/17/99
Date Received: 03/03/99
Laboratory No.: 99-02656-5

Sample Description: CA00028000200002, FORMER ILM, P-22, 03/03/99 @ 01:35PM, TEEPLE/J.NEWMAN

P.Q.L. = Practical Quantitation Limit (refers to the least amount of analyte quantifiable based on sample size used and analytical technique employed).

Dissolved analysis reported on sample filtered and acidified in the field.

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.

for Dan Schultz
Laboratory Director

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BC Laboratories, Inc.

WATER ANALYSIS
(METALS)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/17/99
Date Received: 03/03/99
Laboratory No.: 99-02656-6
(Revised)

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-12
Sampling Date/Time: 03/03/99 @ 03:45PM
Sample Collected By: TEEPLE/J.NEWMAN

Constituents		Results	Units	P.Q.L.	Method	Date Prepared	Date Analyzed
Dissolved Aluminum		None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99
Dissolved Antimony		None Detected	µg/L	100.	EPA-6010	03/03/99	03/11/99
Dissolved Arsenic		2.1	µg/L	2.	SM-3114B	03/08/99	03/11/99
Dissolved Barium		190.	µg/L	100.	EPA-6010	03/03/99	03/11/99
Dissolved Beryllium		None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99
Dissolved Cadmium		None Detected	µg/L	5.	EPA-6010	03/03/99	03/11/99
Dissolved Chromium		26.	µg/L	10.	EPA-6010	03/03/99	03/11/99
Hexavalent Chromium		36.	µg/L	2.	EPA-7196	03/04/99	03/04/99
Dissolved Cobalt		58.	µg/L	50.	EPA-6010	03/03/99	03/11/99
Dissolved Copper		16.	µg/L	10.	EPA-6010	03/03/99	03/11/99
Dissolved Iron		1190.	µg/L	50.	EPA-6010	03/03/99	03/11/99
Dissolved Lead		None Detected	µg/L	5.	EPA-7421	03/03/99	03/05/99
Dissolved Mercury		1.9	µg/L	0.2	EPA-7470	03/12/99	03/12/99
Dissolved Molybdenum		None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99
Dissolved Nickel		None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99
Dissolved Selenium		None Detected	µg/L	2.	SM-3114B	03/08/99	03/10/99
Dissolved Silver		None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99
Dissolved Titanium		None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99
Dissolved Thallium		None Detected	µg/L	5.0	EPA-7841	03/03/99	03/05/99
Dissolved Vanadium		None Detected	µg/L	10.	EPA-6010	03/03/99	03/11/99
Dissolved Zinc		None Detected	µg/L	50.	EPA-6010	03/03/99	03/11/99
Total Aluminum	*1	3100.	µg/L	50.	EPA-6020	05/18/99	05/18/99
Total Antimony	*1	None Detected	µg/L	100.	EPA-6020	05/18/99	05/18/99
Total Arsenic		3.2	µg/L	2.	SM-3114B	03/08/99	03/11/99
Total Barium	*1	190.	µg/L	10.	EPA-6020	05/18/99	05/18/99
Total Beryllium	*1	None Detected	µg/L	10.	EPA-6020	05/18/99	05/18/99
Total Cadmium	*1	None Detected	µg/L	5.	EPA-6020	05/18/99	05/18/99
Total Chromium	*1	32.	µg/L	10.	EPA-6020	05/18/99	05/18/99
Total Cobalt	*1	53.	µg/L	10.	EPA-6020	05/18/99	05/18/99
Total Copper	*1	None Detected	µg/L	10.	EPA-6020	05/18/99	05/18/99
Total Iron	*1	5100.	µg/L	50.	EPA-6020	05/18/99	05/18/99
Total Lead	*1	None Detected	µg/L	5.	EPA-6020	05/18/99	05/18/99
Total Mercury		0.54	µg/L	0.2	EPA-7470	03/12/99	03/12/99
Total Molybdenum	*1	None Detected	µg/L	10.	EPA-6020	05/18/99	05/18/99
Total Nickel	*1	None Detected	µg/L	50.	EPA-6020	05/18/99	05/18/99
Total Selenium		None Detected	µg/L	2.	SM-3114B	03/08/99	03/10/99
Total Silver	*1	None Detected	µg/L	10.	EPA-6020	05/18/99	05/18/99
Total Titanium	*1	19.	µg/L	10.	EPA-6020	05/18/99	05/18/99
Total Thallium	*1	None Detected	µg/L	5.0	EPA-6020	05/18/99	05/18/99
Total Vanadium	*1	11.	µg/L	10.	EPA-6020	05/18/99	05/18/99
Total Zinc	*1	None Detected	µg/L	50.	EPA-6020	05/18/99	05/18/99

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WATER ANALYSIS
(METALS)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/17/99
Date Received: 03/03/99
Laboratory No.: 99-02656-6
(Revised)

Sample Description: CA00028000200002, FORMER ILM, P-12, 03/03/99 @ 03:45PM, TEEPLE/J.NEWMAN

P.Q.L. = Practical Quantitation Limit (refers to the least amount of analyte quantifiable based on sample size used and analytical technique employed).

Dissolved analysis reported on sample filtered and acidified in the field.

Flag Explanations:
*1 = Sample analyzed by Zymax Envirotechnology.

California D.O.H.S. Cert. #1186

for Dan Schultz
Laboratory Director

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WATER ANALYSIS
(METALS)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/17/99
Date Received: 03/03/99
Laboratory No.: 99-02656-7

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-2
Sampling Date/Time: 03/02/99 @ 03:20PM
Sample Collected By: TEEPLE/J.NEWMAN

Constituents	Results	Units	P.Q.L.	Method	Date Prepared	Date Analyzed	Dilution Factor
Dissolved Aluminum	None Detected	µg/L	50.	EPA-6010	03/02/99	03/11/99	1
Dissolved Antimony	None Detected	µg/L	100.	EPA-6010	03/02/99	03/11/99	1
Dissolved Arsenic	2.2	µg/L	2.	SM-3114B	03/08/99	03/11/99	1
Dissolved Barium	161.	µg/L	100.	EPA-6010	03/02/99	03/11/99	1
Dissolved Beryllium	None Detected	µg/L	10.	EPA-6010	03/02/99	03/11/99	1
Dissolved Cadmium	None Detected	µg/L	5.	EPA-6010	03/02/99	03/11/99	1
Dissolved Chromium	None Detected	µg/L	10.	EPA-6010	03/02/99	03/11/99	1
Hexavalent Chromium	2.5	µg/L	2.	EPA-7196	03/04/99	03/04/99	1
Dissolved Cobalt	None Detected	µg/L	50.	EPA-6010	03/02/99	03/11/99	1
Dissolved Copper	None Detected	µg/L	10.	EPA-6010	03/02/99	03/11/99	1
Dissolved Iron	1550.	µg/L	50.	EPA-6010	03/02/99	03/11/99	1
Dissolved Lead	None Detected	µg/L	5.	EPA-7421	03/02/99	03/05/99	1
Dissolved Mercury	None Detected	µg/L	0.2	EPA-7470	03/12/99	03/12/99	1
Dissolved Molybdenum	None Detected	µg/L	50.	EPA-6010	03/02/99	03/11/99	1
Dissolved Nickel	None Detected	µg/L	50.	EPA-6010	03/02/99	03/11/99	1
Dissolved Selenium	None Detected	µg/L	2.	SM-3114B	03/08/99	03/10/99	1
Dissolved Silver	None Detected	µg/L	10.	EPA-6010	03/02/99	03/11/99	1
Dissolved Titanium	None Detected	µg/L	10.	EPA-6010	03/02/99	03/11/99	1
Dissolved Thallium	None Detected	µg/L	1.	EPA-7841	03/02/99	03/05/99	1
Dissolved Vanadium	None Detected	µg/L	10.	EPA-6010	03/02/99	03/11/99	1
Dissolved Zinc	129.	µg/L	10.	EPA-6010	03/02/99	03/11/99	1
Total Aluminum	1440.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Antimony	None Detected	µg/L	100.	EPA-6010	03/05/99	03/06/99	1
Total Arsenic	3.2	µg/L	2.	SM-3114B	03/08/99	03/11/99	1
Total Barium	166.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Beryllium	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Cadmium	24.	µg/L	5.	EPA-6010	03/05/99	03/06/99	1
Total Chromium	11.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Cobalt	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Copper	29.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Iron	3210.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Lead	38.	µg/L	5.	EPA-7421	03/05/99	03/05/99	2
Total Mercury	None Detected	µg/L	0.2	EPA-7470	03/12/99	03/12/99	1
Total Molybdenum	14.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Nickel	None Detected	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Selenium	None Detected	µg/L	2.	SM-3114B	03/08/99	03/10/99	1
Total Silver	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Titanium	*1 73.	µg/L	10.	EPA-6010	03/11/99	03/11/99	1
Total Thallium	None Detected	µg/L	5.0	EPA-7841	03/05/99	03/05/99	1
Total Vanadium	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Zinc	388.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1

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BC LABORATORIES

WATER ANALYSIS
(METALS)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/17/99
Date Received: 03/03/99
Laboratory No.: 99-02656-7

Sample Description: CA00028000200002, FORMER ILM, P-2, 03/02/99 @ 03:20PM, TEEPLE/J.NEWMAN

P.Q.L. = Practical Quantitation Limit (refers to the least amount of analyte quantifiable based on sample size used and analytical technique employed).

Dissolved analysis reported on sample filtered and acidified in the field.

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.

Dan Schultz
Laboratory Director

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BC LABORATORIES

WATER ANALYSIS
(METALS)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/17/99
Date Received: 03/03/99
Laboratory No.: 99-02656-8

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-16C
Sampling Date/Time: 03/02/99 @ 04:45PM
Sample Collected By: TEEPLE/J.NEWMAN

Constituents	Results	Units	P.Q.L.	Method	Date Prepared	Date Analyzed	Dilution Factor
Dissolved Aluminum	None Detected	µg/L	50.	EPA-6010	03/02/99	03/11/99	1
Dissolved Antimony	None Detected	µg/L	100.	EPA-6010	03/02/99	03/11/99	1
Dissolved Arsenic	None Detected	µg/L	2.	SM-3114B	03/08/99	03/11/99	1
Dissolved Barium	424.	µg/L	100.	EPA-6010	03/02/99	03/11/99	1
Dissolved Beryllium	None Detected	µg/L	10.	EPA-6010	03/02/99	03/11/99	1
Dissolved Cadmium	None Detected	µg/L	5.	EPA-6010	03/02/99	03/11/99	1
Dissolved Chromium	None Detected	µg/L	10.	EPA-6010	03/02/99	03/11/99	1
Hexavalent Chromium	None Detected	µg/L	5.	EPA-7196	03/04/99	03/04/99	1
Dissolved Cobalt	None Detected	µg/L	50.	EPA-6010	03/02/99	03/11/99	1
Dissolved Copper	None Detected	µg/L	10.	EPA-6010	03/02/99	03/11/99	1
Dissolved Iron	None Detected	µg/L	50.	EPA-6010	03/02/99	03/11/99	1
Dissolved Lead	None Detected	µg/L	5.	EPA-7421	03/02/99	03/05/99	1
Dissolved Mercury	None Detected	µg/L	0.2	EPA-7470	03/12/99	03/12/99	1
Dissolved Molybdenum	None Detected	µg/L	50.	EPA-6010	03/02/99	03/11/99	1
Dissolved Nickel	None Detected	µg/L	50.	EPA-6010	03/02/99	03/11/99	1
Dissolved Selenium	5.1	µg/L	2.	SM-3114B	03/08/99	03/10/99	1
Dissolved Silver	None Detected	µg/L	10.	EPA-6010	03/02/99	03/11/99	1
Dissolved Titanium	None Detected	µg/L	10.	EPA-6010	03/02/99	03/11/99	1
Dissolved Thallium	None Detected	µg/L	1.	EPA-7841	03/02/99	03/05/99	1
Dissolved Vanadium	None Detected	µg/L	10.	EPA-6010	03/02/99	03/11/99	1
Dissolved Zinc	37.	µg/L	10.	EPA-6010	03/02/99	03/11/99	1
Total Aluminum	3680.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Antimony	None Detected	µg/L	100.	EPA-6010	03/05/99	03/06/99	1
Total Arsenic	2.6	µg/L	2.	SM-3114B	03/08/99	03/11/99	1
Total Barium	451.	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Beryllium	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Cadmium	None Detected	µg/L	5.	EPA-6010	03/05/99	03/06/99	1
Total Chromium	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Cobalt	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Copper	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Iron	4000.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Lead	None Detected	µg/L	5.	EPA-7421	03/05/99	03/05/99	2
Total Mercury	None Detected	µg/L	0.2	EPA-7470	03/12/99	03/12/99	1
Total Molybdenum	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Nickel	None Detected	µg/L	50.	EPA-6010	03/05/99	03/06/99	1
Total Selenium	4.3	µg/L	2.	SM-3114B	03/08/99	03/10/99	1
Total Silver	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Titanium	*1 209.	µg/L	10.	EPA-6010	03/11/99	03/12/99	1
Total Thallium	None Detected	µg/L	5.0	EPA-7841	03/05/99	03/05/99	1
Total Vanadium	None Detected	µg/L	10.	EPA-6010	03/05/99	03/06/99	1
Total Zinc	61.	µg/L	50.	EPA-6010	03/05/99	03/06/99	1

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BC LABORATORIES

WATER ANALYSIS
(METALS)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/17/99
Date Received: 03/03/99
Laboratory No.: 99-02656-8

Sample Description: CA00028000200002, FORMER ILM, P-16C, 03/02/99 @ 04:45PM, TEEPLE/J.NEWMAN

P.Q.L. = Practical Quantitation Limit (refers to the least amount of analyte quantifiable based on sample size used and analytical technique employed).

Dissolved analysis reported on sample filtered and acidified in the field.

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.

Dan Schultz
Laboratory Director

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BC Laboratories, Inc.

EPA 8015M
Fuel Identification / Quantitation Summary

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/15/99
Date Received: 03/03/99
Laboratory No.: 99-02656-1
(Revised)

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-6B
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/03/99 @ 09:50AM
Date Extracted: 03/05/99
Date Analyzed: 03/07/99

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit
Stoddard / White Spirits	None Detected	µg/L	200.
JP 4	None Detected	µg/L	1000.
JP 5	None Detected	µg/L	1000.
JP 6	None Detected	µg/L	1000.
JP 8	None Detected	µg/L	200.
Kerosene / Jet Fuel	None Detected	µg/L	200.
Diesel	None Detected	µg/L	200.
Crude Oil	1100.	µg/L	1000.
Hydraulic Oil	None Detected	µg/L	1000.
Waste Oil	None Detected	µg/L	1000.
Motor Oil	None Detected	µg/L	1000.
Surrogate % Recovery	73.	%	32-143

METHOD: 8015M DOHS LUFT MANUAL
Boiling Range: 70 - 300 C

Mixtures of hydrocarbons are identified by a boiling point range and a fingerprint. Hydrocarbons that fall within a boiling range but do not exhibit the pattern are quantitated versus the fuel that corresponds with the boiling range, but are qualified with a note.

California D.O.H.S. Cert. #1186

Stuart G. Buttram
Department Supervisor

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BC Laboratories, Inc.

EPA 8015M
Fuel Identification / Quantitation Summary

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/15/99
Date Received: 03/03/99
Laboratory No.: 99-02656-3
(Revised)

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-24
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/03/99 @ 04:30PM
Date Extracted: 03/05/99
Date Analyzed: 03/07/99

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit
Stoddard / White Spirits	None Detected	µg/L	200.
JP 4	None Detected	µg/L	1000.
JP 5	None Detected	µg/L	1000.
JP 6	None Detected	µg/L	1000.
JP 8	None Detected	µg/L	200.
Kerosene / Jet Fuel	None Detected	µg/L	200.
Diesel	450.	µg/L	200.
Crude Oil	None Detected	µg/L	1000.
Hydraulic Oil	None Detected	µg/L	1000.
Waste Oil	None Detected	µg/L	1000.
Motor Oil	None Detected	µg/L	1000.
Surrogate % Recovery	50.	%	32-143

METHOD: 8015M DOHS LUFT MANUAL
Boiling Range: 70 - 300 C

Mixtures of hydrocarbons are identified by a boiling point range and a fingerprint. Hydrocarbons that fall within a boiling range but do not exhibit the pattern are quantitated versus the fuel that corresponds with the boiling range, but are qualified with a note.

California D.O.H.S. Cert. #1186

Stuart G. Buttram
Department Supervisor

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BC Laboratories, Inc.

EPA 8015M
Fuel Identification / Quantitation Summary

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/15/99
Date Received: 03/03/99
Laboratory No.: 99-02656-4
(Revised)

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-9B
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/03/99 @ 12:15PM
Date Extracted: 03/05/99
Date Analyzed: 03/07/99

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit
Stoddard / White Spirits	None Detected	µg/L	200.
JP 4	None Detected	µg/L	1000.
JP 5	None Detected	µg/L	1000.
JP 6	None Detected	µg/L	1000.
JP 8	None Detected	µg/L	200.
Kerosene / Jet Fuel	None Detected	µg/L	200.
Diesel	None Detected	µg/L	200.
Crude Oil	None Detected	µg/L	1000.
Hydraulic Oil	None Detected	µg/L	1000.
Waste Oil	None Detected	µg/L	1000.
Motor Oil	None Detected	µg/L	1000.
Surrogate % Recovery	54.	%	32-143

METHOD: 8015M DOHS LUFT MANUAL
Boiling Range: 70 - 300 C

Mixtures of hydrocarbons are identified by a boiling point range and a fingerprint. Hydrocarbons that fall within a boiling range but do not exhibit the pattern are quantitated versus the fuel that corresponds with the boiling range, but are qualified with a note.

California D.O.H.S. Cert. #1186

Stuart G. Buttram
Department Supervisor

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EPA 8015M
Fuel Identification / Quantitation Summary

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/15/99
Date Received: 03/03/99
Laboratory No.: 99-02656-5
(Revised)

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-22
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/03/99 @ 01:35PM
Date Extracted: 03/05/99
Date Analyzed: 03/07/99

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit
Stoddard / White Spirits	None Detected	µg/L	200.
JP 4	None Detected	µg/L	1000.
JP 5	None Detected	µg/L	1000.
JP 6	None Detected	µg/L	1000.
JP 8	None Detected	µg/L	200.
Kerosene / Jet Fuel	None Detected	µg/L	200.
Diesel	None Detected	µg/L	200.
Crude Oil	None Detected	µg/L	1000.
Hydraulic Oil	None Detected	µg/L	1000.
Waste Oil	None Detected	µg/L	1000.
Motor Oil	None Detected	µg/L	1000.
Surrogate % Recovery	55.	%	32-143

METHOD: 8015M DOHS LUFT MANUAL
Boiling Range: 70 - 300 C

Mixtures of hydrocarbons are identified by a boiling point range and a fingerprint. Hydrocarbons that fall within a boiling range but do not exhibit the pattern are quantitated versus the fuel that corresponds with the boiling range, but are qualified with a note.

California D.O.H.S. Cert. #1166

Stuart G. Buttram
Department Supervisor

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BC Laboratories, Inc.

EPA 8015M
Fuel Identification / Quantitation Summary

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/15/99
Date Received: 03/03/99
Laboratory No.: 99-02656-6
(Revised)

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-12
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/03/99 @ 03:45PM
Date Extracted: 03/05/99
Date Analyzed: 03/07/99

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit
Stoddard / White Spirits	None Detected	µg/L	200.
JP 4	None Detected	µg/L	1000.
JP 5	None Detected	µg/L	1000.
JP 6	None Detected	µg/L	1000.
JP 8	None Detected	µg/L	200.
Kerosene / Jet Fuel	None Detected	µg/L	200.
Diesel	None Detected	µg/L	200.
Crude Oil	None Detected	µg/L	1000.
Hydraulic Oil	None Detected	µg/L	1000.
Waste Oil	None Detected	µg/L	1000.
Motor Oil	None Detected	µg/L	1000.
Surrogate % Recovery	46.	%	32-143

METHOD: 8015M DOHS LUFT MANUAL
Boiling Range: 70 - 300 C

Mixtures of hydrocarbons are identified by a boiling point range and a fingerprint. Hydrocarbons that fall within a boiling range but do not exhibit the pattern are quantitated versus the fuel that corresponds with the boiling range, but are qualified with a note.

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Stuart G. Buttram
Department Supervisor

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EPA 8015M
Fuel Identification / Quantitation Summary

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/15/99
Date Received: 03/03/99
Laboratory No.: 99-02656-7
(Revised)

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-2
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/02/99 @ 03:20PM
Date Extracted: 03/05/99
Date Analyzed: 03/10/99

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit
Stoddard / White Spirits	None Detected	µg/L	400.
JP 4	None Detected	µg/L	2000.
JP 5	None Detected	µg/L	2000.
JP 6	None Detected	µg/L	2000.
JP 8	None Detected	µg/L	400.
Kerosene / Jet Fuel	2300.	µg/L	400.
Diesel	None Detected	µg/L	400.
Crude Oil	None Detected	µg/L	2000.
Hydraulic Oil	None Detected	µg/L	2000.
Waste Oil	None Detected	µg/L	2000.
Motor Oil	None Detected	µg/L	2000.
Surrogate % Recovery	70.	%	32-143

METHOD: 8015M DOHS LUFT MANUAL
Boiling Range: 70 - 300 C

Mixtures of hydrocarbons are identified by a boiling point range and a fingerprint. Hydrocarbons that fall within a boiling range but do not exhibit the pattern are quantitated versus the fuel that corresponds with the boiling range, but are qualified with a note.

Note: PQL's were raised due to dilution required to bring target analytes into calibration range.

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Stuart G. Buttram
Department Supervisor

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BC Laboratories, Inc.

EPA 8015M
Fuel Identification / Quantitation Summary

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/15/99
Date Received: 03/03/99
Laboratory No.: 99-02656-8
(Revised)

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-16C
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/02/99 @ 04:45PM
Date Extracted: 03/05/99
Date Analyzed: 03/07/99

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit
Stoddard / White Spirits	None Detected	µg/L	200.
JP 4	None Detected	µg/L	1000.
JP 5	None Detected	µg/L	1000.
JP 6	None Detected	µg/L	1000.
JP 8	None Detected	µg/L	200.
Kerosene / Jet Fuel	None Detected	µg/L	200.
Diesel	None Detected	µg/L	200.
Crude Oil	None Detected	µg/L	1000.
Hydraulic Oil	None Detected	µg/L	1000.
Waste Oil	None Detected	µg/L	1000.
Motor Oil	None Detected	µg/L	1000.
Surrogate % Recovery	79.	%	32-143

METHOD: 8015M DOHS LUFT MANUAL
Boiling Range: 70 - 300 C

Mixtures of hydrocarbons are identified by a boiling point range and a fingerprint. Hydrocarbons that fall within a boiling range but do not exhibit the pattern are quantitated versus the fuel that corresponds with the boiling range, but are qualified with a note.

California D.O.H.S. Cert. #1186

Stuart G. Buttram
Department Supervisor

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BC LABORATORIES

Volatile Organic Analysis
(EPA Method 8260)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-1

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-6B
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/03/99 @ 09:50AM
Date Extracted: 03/06/99
Date Analyzed: 03/06/99
Dilution Used: 1

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
Benzene	None Detected	µg/L	0.5	
Bromobenzene	None Detected	µg/L	0.5	
Bromochloromethane	None Detected	µg/L	0.5	
Bromodichloromethane	None Detected	µg/L	0.5	*1
Bromoform	None Detected	µg/L	0.5	
Bromomethane	None Detected	µg/L	0.5	
n-Butylbenzene	None Detected	µg/L	0.5	
sec-Butylbenzene	None Detected	µg/L	0.5	
tert-Butylbenzene	None Detected	µg/L	0.5	
Carbon tetrachloride	None Detected	µg/L	0.5	
Chlorobenzene	None Detected	µg/L	0.5	
Chloroethane	None Detected	µg/L	0.5	
2-Chloroethylvinyl ether	None Detected	µg/L	20.	
Chloroform	0.94	µg/L	0.5	
Chloromethane	None Detected	µg/L	0.5	
2-Chlorotoluene	None Detected	µg/L	0.5	
4-Chlorotoluene	None Detected	µg/L	0.5	
Dibromochloromethane	None Detected	µg/L	0.5	
1,2-Dibromo-3-Chloropropane	None Detected	µg/L	0.5	
1,2-Dibromoethane	None Detected	µg/L	0.5	
Dibromomethane	None Detected	µg/L	0.5	
1,2-Dichlorobenzene	None Detected	µg/L	0.5	
1,3-Dichlorobenzene	None Detected	µg/L	0.5	
1,4-Dichlorobenzene	None Detected	µg/L	0.5	
Dichlorodifluoromethane	None Detected	µg/L	0.5	
1,1-Dichloroethane	None Detected	µg/L	0.5	
1,2-Dichloroethane	None Detected	µg/L	0.5	
1,1-Dichloroethene	1.2	µg/L	0.5	
cis-1,2-Dichloroethene	1.7	µg/L	0.5	
trans-1,2-Dichloroethene	None Detected	µg/L	0.5	
1,2-Dichloropropane	None Detected	µg/L	0.5	
1,3-Dichloropropane	None Detected	µg/L	0.5	
2,2-Dichloropropane	None Detected	µg/L	0.5	
1,1-Dichloropropene	None Detected	µg/L	0.5	
cis-1,3-Dichloropropene	None Detected	µg/L	0.5	
trans-1,3-Dichloropropene	None Detected	µg/L	0.5	
Ethyl Benzene	None Detected	µg/L	0.5	
Hexachlorobutadiene	None Detected	µg/L	0.5	
Isopropylbenzene	None Detected	µg/L	0.5	
p-Isopropyltoluene	None Detected	µg/L	0.5	
Methylene Chloride	None Detected	µg/L	0.5	
Naphthalene	None Detected	µg/L	0.5	

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Volatile Organic Analysis
(EPA Method 8260)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-1

Sample Description: CA00028000200002, FORMER ILM, P-6B, 03/03/99 @ 09:50AM, TEEPLE/J.NEWMAN

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
n-Propylbenzene	None Detected	µg/L	0.5	
Styrene	None Detected	µg/L	0.5	
1,1,1,2-Tetrachloroethane	None Detected	µg/L	0.5	
1,1,2,2-Tetrachloroethane	None Detected	µg/L	0.5	
Tetrachloroethene	7.4	µg/L	0.5	
Toluene	None Detected	µg/L	0.5	
1,2,3-Trichlorobenzene	None Detected	µg/L	0.5	
1,2,4-Trichlorobenzene	None Detected	µg/L	0.5	
1,1,1-Trichloroethane	None Detected	µg/L	0.5	
1,1,2-Trichloroethane	None Detected	µg/L	0.5	
Trichloroethene	280.	µg/L	3.	*2
Trichlorofluoromethane	None Detected	µg/L	0.5	
1,2,3-Trichloropropane	None Detected	µg/L	0.5	
1,2,4-Trimethylbenzene	None Detected	µg/L	0.5	
1,3,5-Trimethylbenzene	None Detected	µg/L	0.5	
Vinyl Chloride	None Detected	µg/L	0.5	
Total Xylenes	None Detected	µg/L	1.	

Quality Control Data

Surrogates	% Recovery	Control Limits
1,2-Dichloroethane-d4	108.	76-114
Toluene-d8	93.	88-110
4-Bromofluorobenzene	91.	86-115

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BC LABORATORIES

Volatile Organic Analysis
(EPA Method 8260)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-1

Sample Description: CA00028000200002, FORMER ILM, P-6B, 03/03/99 @ 09:50AM, TEEPLE/J.NEWMAN

Note: PQL's were raised due to dilution required to bring target analytes into calibration range.
Internal end BFB 12 hour criteria exceeded.
Internal end CCV 12 hour criteria exceeded.
for run with dilution factor = 5

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.
*2 = Dilution factor = 5
California D.O.H.S. Cert. #1186, AZ License: AZ0345

Stuart G. Buttram
Department Supervisor

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Volatile Organic Analysis
(EPA Method 8260)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-2

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: EB-2
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/02/99 @ 05:00PM
Date Extracted: 03/05/99
Date Analyzed: 03/05/99
Dilution Used: 1

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
Benzene	None Detected	µg/L	0.5	
Bromobenzene	None Detected	µg/L	0.5	
Bromochloromethane	None Detected	µg/L	0.5	
Bromodichloromethane	None Detected	µg/L	0.5	*1
Bromoform	None Detected	µg/L	0.5	
Bromomethane	None Detected	µg/L	0.5	
n-Butylbenzene	None Detected	µg/L	0.5	
sec-Butylbenzene	None Detected	µg/L	0.5	
tert-Butylbenzene	None Detected	µg/L	0.5	
Carbon tetrachloride	None Detected	µg/L	0.5	
Chlorobenzene	None Detected	µg/L	0.5	
Chloroethane	None Detected	µg/L	0.5	
2-Chloroethylvinyl ether	None Detected	µg/L	20.	
Chloroform	None Detected	µg/L	0.5	
Chloromethane	None Detected	µg/L	0.5	
2-Chlorotoluene	None Detected	µg/L	0.5	
4-Chlorotoluene	None Detected	µg/L	0.5	
Dibromochloromethane	None Detected	µg/L	0.5	
1,2-Dibromo-3-Chloropropane	None Detected	µg/L	0.5	
1,2-Dibromoethane	None Detected	µg/L	0.5	
Dibromomethane	None Detected	µg/L	0.5	
1,2-Dichlorobenzene	None Detected	µg/L	0.5	
1,3-Dichlorobenzene	None Detected	µg/L	0.5	
1,4-Dichlorobenzene	None Detected	µg/L	0.5	
Dichlorodifluoromethane	None Detected	µg/L	0.5	
1,1-Dichloroethane	None Detected	µg/L	0.5	
1,2-Dichloroethane	None Detected	µg/L	0.5	
1,1-Dichloroethene	None Detected	µg/L	0.5	
cis-1,2-Dichloroethene	None Detected	µg/L	0.5	
trans-1,2-Dichloroethene	None Detected	µg/L	0.5	
1,2-Dichloropropane	None Detected	µg/L	0.5	
1,3-Dichloropropane	None Detected	µg/L	0.5	
2,2-Dichloropropane	None Detected	µg/L	0.5	
1,1-Dichloropropene	None Detected	µg/L	0.5	
cis-1,3-Dichloropropene	None Detected	µg/L	0.5	
trans-1,3-Dichloropropene	None Detected	µg/L	0.5	
Ethyl Benzene	None Detected	µg/L	0.5	
Hexachlorobutadiene	None Detected	µg/L	0.5	
Isopropylbenzene	None Detected	µg/L	0.5	
p-Isopropyltoluene	None Detected	µg/L	0.5	
Methylene Chloride	None Detected	µg/L	0.5	
Naphthalene	None Detected	µg/L	0.5	

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ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-2

Sample Description: CA00028000200002, FORMER ILM, EB-2, 03/02/99 @ 05:00PM, TEEPLE/J.NEWMAN

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit
n-Propylbenzene	None Detected	µg/L	0.5
Styrene	None Detected	µg/L	0.5
1,1,1,2-Tetrachloroethane	None Detected	µg/L	0.5
1,1,2,2-Tetrachloroethane	None Detected	µg/L	0.5
Tetrachloroethene	None Detected	µg/L	0.5
Toluene	None Detected	µg/L	0.5
1,2,3-Trichlorobenzene	None Detected	µg/L	0.5
1,2,4-Trichlorobenzene	None Detected	µg/L	0.5
1,1,1-Trichloroethane	None Detected	µg/L	0.5
1,1,2-Trichloroethane	None Detected	µg/L	0.5
Trichloroethene	None Detected	µg/L	0.5
Trichlorofluoromethane	None Detected	µg/L	0.5
1,2,3-Trichloropropane	None Detected	µg/L	0.5
1,2,4-Trimethylbenzene	None Detected	µg/L	0.5
1,3,5-Trimethylbenzene	None Detected	µg/L	0.5
Vinyl Chloride	None Detected	µg/L	0.5
Total Xylenes	None Detected	µg/L	1.

Quality Control Data

Surrogates	% Recovery	Control Limits
1,2-Dichloroethane-d4	107.	76-114
Toluene-d8	97.	88-110
4-Bromofluorobenzene	90.	86-115

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.
California D.O.H.S. Cert. #1186, AZ License: AZ0345

Stuart G. Buttram
Department Supervisor

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Volatile Organic Analysis
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1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-3

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-24
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/03/99 @ 04:30PM
Date Extracted: 03/06/99
Date Analyzed: 03/06/99
Dilution Used: 1

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
Benzene	None Detected	µg/L	0.5	
Bromobenzene	None Detected	µg/L	0.5	
Bromochloromethane	None Detected	µg/L	0.5	
Bromodichloromethane	None Detected	µg/L	0.5	*1
Bromoform	None Detected	µg/L	0.5	
Bromomethane	None Detected	µg/L	0.5	
n-Butylbenzene	None Detected	µg/L	0.5	
sec-Butylbenzene	None Detected	µg/L	0.5	
tert-Butylbenzene	None Detected	µg/L	0.5	
Carbon tetrachloride	None Detected	µg/L	0.5	
Chlorobenzene	None Detected	µg/L	0.5	
Chloroethane	None Detected	µg/L	0.5	
2-Chloroethylvinyl ether	None Detected	µg/L	20.	
Chloroform	6.7	µg/L	0.5	
Chloromethane	None Detected	µg/L	0.5	
2-Chlorotoluene	None Detected	µg/L	0.5	
4-Chlorotoluene	None Detected	µg/L	0.5	
Dibromochloromethane	None Detected	µg/L	0.5	
1,2-Dibromo-3-Chloropropane	None Detected	µg/L	0.5	
1,2-Dibromoethane	None Detected	µg/L	0.5	
Dibromomethane	None Detected	µg/L	0.5	
1,2-Dichlorobenzene	None Detected	µg/L	0.5	
1,3-Dichlorobenzene	None Detected	µg/L	0.5	
1,4-Dichlorobenzene	None Detected	µg/L	0.5	
Dichlorodifluoromethane	None Detected	µg/L	0.5	
1,1-Dichloroethane	None Detected	µg/L	0.5	
1,2-Dichloroethane	None Detected	µg/L	0.5	
1,1-Dichloroethene	1.4	µg/L	0.5	
cis-1,2-Dichloroethene	0.75	µg/L	0.5	
trans-1,2-Dichloroethene	None Detected	µg/L	0.5	
1,2-Dichloropropane	None Detected	µg/L	0.5	
1,3-Dichloropropane	None Detected	µg/L	0.5	
2,2-Dichloropropane	None Detected	µg/L	0.5	
1,1-Dichloropropene	None Detected	µg/L	0.5	
cis-1,3-Dichloropropene	None Detected	µg/L	0.5	
trans-1,3-Dichloropropene	None Detected	µg/L	0.5	
Ethyl Benzene	None Detected	µg/L	0.5	
Hexachlorobutadiene	None Detected	µg/L	0.5	
Isopropylbenzene	None Detected	µg/L	0.5	
p-Isopropyltoluene	None Detected	µg/L	0.5	
Methylene Chloride	None Detected	µg/L	0.5	
Naphthalene	None Detected	µg/L	0.5	

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1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-3

Sample Description: CA00028000200002, FORMER ILM, P-24, 03/03/99 @ 04:30PM, TEEPLE/J.NEWMAN

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
n-Propylbenzene	None Detected	µg/L	0.5	
Styrene	None Detected	µg/L	0.5	
1,1,1,2-Tetrachloroethane	None Detected	µg/L	0.5	
1,1,2,2-Tetrachloroethane	None Detected	µg/L	0.5	
Tetrachloroethene	0.99	µg/L	0.5	
Toluene	None Detected	µg/L	0.5	
1,2,3-Trichlorobenzene	None Detected	µg/L	0.5	
1,2,4-Trichlorobenzene	None Detected	µg/L	0.5	
1,1,1-Trichloroethane	None Detected	µg/L	0.5	
1,1,2-Trichloroethane	None Detected	µg/L	0.5	
Trichloroethene	210.	µg/L	3.	*2
Trichlorofluoromethane	None Detected	µg/L	0.5	
1,2,3-Trichloropropane	None Detected	µg/L	0.5	
1,2,4-Trimethylbenzene	None Detected	µg/L	0.5	
1,3,5-Trimethylbenzene	None Detected	µg/L	0.5	
Vinyl Chloride	None Detected	µg/L	0.5	
Total Xylenes	None Detected	µg/L	1.	

Quality Control Data

Surrogates	% Recovery	Control Limits
1,2-Dichloroethane-d4	103.	76-114
Toluene-d8	95.	88-110
4-Bromofluorobenzene	96.	86-115

Note: PQL's were raised due to dilution required to bring target analytes into calibration range.

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.
*2 = Internal end BFB 12 hour criteria exceeded.
Internal end CCV 12 hour criteria exceeded.
Dilution factor = 5

California D.O.H.S. Cert. #1186, AZ License: AZ0345

Stuart G. Buttram
Department Supervisor

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1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-4

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-9B
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/03/99 @ 12:15PM
Date Extracted: 03/06/99
Date Analyzed: 03/06/99
Dilution Used: 1

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
Benzene	None Detected	µg/L	0.5	
Bromobenzene	None Detected	µg/L	0.5	
Bromochloromethane	None Detected	µg/L	0.5	
Bromodichloromethane	None Detected	µg/L	0.5	*1
Bromoform	None Detected	µg/L	0.5	
Bromomethane	None Detected	µg/L	0.5	
n-Butylbenzene	None Detected	µg/L	0.5	
sec-Butylbenzene	None Detected	µg/L	0.5	
tert-Butylbenzene	None Detected	µg/L	0.5	
Carbon tetrachloride	None Detected	µg/L	0.5	
Chlorobenzene	None Detected	µg/L	0.5	
Chloroethane	None Detected	µg/L	0.5	
2-Chloroethylvinyl ether	None Detected	µg/L	20.	
Chloroform	2.2	µg/L	0.5	
Chloromethane	None Detected	µg/L	0.5	
2-Chlorotoluene	None Detected	µg/L	0.5	
4-Chlorotoluene	None Detected	µg/L	0.5	
Dibromochloromethane	None Detected	µg/L	0.5	
1,2-Dibromo-3-Chloropropane	None Detected	µg/L	0.5	
1,2-Dibromoethane	None Detected	µg/L	0.5	
Dibromomethane	None Detected	µg/L	0.5	
1,2-Dichlorobenzene	None Detected	µg/L	0.5	
1,3-Dichlorobenzene	None Detected	µg/L	0.5	
1,4-Dichlorobenzene	None Detected	µg/L	0.5	
Dichlorodifluoromethane	None Detected	µg/L	0.5	
1,1-Dichloroethane	None Detected	µg/L	0.5	
1,2-Dichloroethane	None Detected	µg/L	0.5	
1,1-Dichloroethene	4.5	µg/L	0.5	
cis-1,2-Dichloroethene	None Detected	µg/L	0.5	
trans-1,2-Dichloroethene	None Detected	µg/L	0.5	
1,2-Dichloropropane	None Detected	µg/L	0.5	
1,3-Dichloropropane	None Detected	µg/L	0.5	
2,2-Dichloropropane	None Detected	µg/L	0.5	
1,1-Dichloropropene	None Detected	µg/L	0.5	
cis-1,3-Dichloropropene	None Detected	µg/L	0.5	
trans-1,3-Dichloropropene	None Detected	µg/L	0.5	
Ethyl Benzene	None Detected	µg/L	0.5	
Hexachlorobutadiene	None Detected	µg/L	0.5	
Isopropylbenzene	None Detected	µg/L	0.5	
p-Isopropyltoluene	None Detected	µg/L	0.5	
Methylene Chloride	None Detected	µg/L	0.5	
Naphthalene	None Detected	µg/L	0.5	

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ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-4

Sample Description: CA00028000200002, FORMER ILM, P-9B, 03/03/99 @ 12:15PM, TEEPLE/J.NEWMAN

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
n-Propylbenzene	None Detected	µg/L	0.5	
Styrene	None Detected	µg/L	0.5	
1,1,1,2-Tetrachloroethane	None Detected	µg/L	0.5	
1,1,2,2-Tetrachloroethane	None Detected	µg/L	0.5	
Tetrachloroethene	1.7	µg/L	0.5	
Toluene	None Detected	µg/L	0.5	
1,2,3-Trichlorobenzene	None Detected	µg/L	0.5	
1,2,4-Trichlorobenzene	None Detected	µg/L	0.5	
1,1,1-Trichloroethane	None Detected	µg/L	0.5	
1,1,2-Trichloroethane	None Detected	µg/L	0.5	
Trichloroethene	280.	µg/L	20.	*2
Trichlorofluoromethane	None Detected	µg/L	0.5	
1,2,3-Trichloropropane	None Detected	µg/L	0.5	
1,2,4-Trimethylbenzene	None Detected	µg/L	0.5	
1,3,5-Trimethylbenzene	None Detected	µg/L	0.5	
Vinyl Chloride	None Detected	µg/L	0.5	
Total Xylenes	None Detected	µg/L	1.	

Quality Control Data

Surrogates	% Recovery	Control Limits
1,2-Dichloroethane-d4	109.	76-114
Toluene-d8	96.	88-110
4-Bromofluorobenzene	94.	86-115

Note: PQL's were raised due to dilution required to bring target analytes into calibration range.

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.
*2 = Internal end BFB 12 hour criteria exceeded.
Internal end CCV 12 hour criteria exceeded.
Dilution factor = 25

California D.O.H.S. Cert. #1186, AZ License: AZ0345

Stuart G. Buttram
Department Supervisor

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1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-5

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-22
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/03/99 @ 01:35PM
Date Extracted: 03/06/99
Date Analyzed: 03/06/99
Dilution Used: 1

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
Benzene	None Detected	µg/L	0.5	
Bromobenzene	None Detected	µg/L	0.5	
Bromochloromethane	None Detected	µg/L	0.5	
Bromodichloromethane	None Detected	µg/L	0.5	*1
Bromoform	None Detected	µg/L	0.5	
Bromomethane	None Detected	µg/L	0.5	
n-Butylbenzene	None Detected	µg/L	0.5	
sec-Butylbenzene	None Detected	µg/L	0.5	
tert-Butylbenzene	None Detected	µg/L	0.5	
Carbon tetrachloride	None Detected	µg/L	0.5	
Chlorobenzene	None Detected	µg/L	0.5	
Chloroethane	None Detected	µg/L	0.5	
2-Chloroethylvinyl ether	None Detected	µg/L	20.	
Chloroform	8.4	µg/L	0.5	
Chloromethane	None Detected	µg/L	0.5	
2-Chlorotoluene	None Detected	µg/L	0.5	
4-Chlorotoluene	None Detected	µg/L	0.5	
Dibromochloromethane	None Detected	µg/L	0.5	
1,2-Dibromo-3-Chloropropane	None Detected	µg/L	0.5	
1,2-Dibromoethane	None Detected	µg/L	0.5	
Dibromomethane	None Detected	µg/L	0.5	
1,2-Dichlorobenzene	None Detected	µg/L	0.5	
1,3-Dichlorobenzene	None Detected	µg/L	0.5	
1,4-Dichlorobenzene	None Detected	µg/L	0.5	
Dichlorodifluoromethane	None Detected	µg/L	0.5	
1,1-Dichloroethane	1.5	µg/L	0.5	
1,2-Dichloroethane	None Detected	µg/L	0.5	
1,1-Dichloroethene	18.	µg/L	0.5	
cis-1,2-Dichloroethene	18.	µg/L	0.5	
trans-1,2-Dichloroethene	0.59	µg/L	0.5	
1,2-Dichloropropane	None Detected	µg/L	0.5	
1,3-Dichloropropane	None Detected	µg/L	0.5	
2,2-Dichloropropane	None Detected	µg/L	0.5	
1,1-Dichloropropene	None Detected	µg/L	0.5	
cis-1,3-Dichloropropene	None Detected	µg/L	0.5	
trans-1,3-Dichloropropene	None Detected	µg/L	0.5	
Ethyl Benzene	None Detected	µg/L	0.5	
Hexachlorobutadiene	None Detected	µg/L	0.5	
Isopropylbenzene	None Detected	µg/L	0.5	
p-Isopropyltoluene	None Detected	µg/L	0.5	
Methylene Chloride	None Detected	µg/L	0.5	
Naphthalene	None Detected	µg/L	0.5	

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BC LABORATORIES

Volatile Organic Analysis
(EPA Method 8260)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-5

Sample Description: CA00028000200002, FORMER ILM, P-22, 03/03/99 @ 01:35PM, TEEPLE/J.NEWMAN

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
n-Propylbenzene	None Detected	µg/L	0.5	
Styrene	None Detected	µg/L	0.5	
1,1,1,2-Tetrachloroethane	None Detected	µg/L	0.5	
1,1,2,2-Tetrachloroethane	None Detected	µg/L	0.5	
Tetrachloroethene	30.	µg/L	0.5	
Toluene	None Detected	µg/L	0.5	
1,2,3-Trichlorobenzene	None Detected	µg/L	0.5	
1,2,4-Trichlorobenzene	None Detected	µg/L	0.5	
1,1,1-Trichloroethane	None Detected	µg/L	0.5	
1,1,2-Trichloroethane	None Detected	µg/L	0.5	
Trichloroethene	1100.	µg/L	20.	*2
Trichlorofluoromethane	None Detected	µg/L	0.5	
1,2,3-Trichloropropane	None Detected	µg/L	0.5	
1,2,4-Trimethylbenzene	None Detected	µg/L	0.5	
1,3,5-Trimethylbenzene	None Detected	µg/L	0.5	
Vinyl Chloride	None Detected	µg/L	0.5	
Total Xylenes	None Detected	µg/L	1.	

Quality Control Data

Surrogates	% Recovery	Control Limits
1,2-Dichloroethane-d4	106.	76-114
Toluene-d8	95.	88-110
4-Bromofluorobenzene	96.	86-115

Note: PQL's were raised due to dilution required to bring target analytes into calibration range.

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.
*2 = Internal end CCV 12 hour criteria exceeded.
Internal end BFB 12 hour criteria exceeded.
Dilution factor = 25

California D.O.H.S. Cert. #1186, AZ License: AZ0345

Stuart G. Buttram
Department Supervisor

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BC LABORATORIES

Volatile Organic Analysis
(EPA Method 8260)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-6

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-12
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/03/99 @ 03:45PM
Date Extracted: 03/06/99
Date Analyzed: 03/06/99
Dilution Used: 1

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
Benzene	6.7	µg/L	0.5	
Bromobenzene	None Detected	µg/L	0.5	
Bromochloromethane	None Detected	µg/L	0.5	
Bromodichloromethane	None Detected	µg/L	0.5	*1
Bromoform	None Detected	µg/L	0.5	
Bromomethane	None Detected	µg/L	0.5	
n-Butylbenzene	None Detected	µg/L	0.5	
sec-Butylbenzene	None Detected	µg/L	0.5	
tert-Butylbenzene	None Detected	µg/L	0.5	
Carbon tetrachloride	None Detected	µg/L	0.5	
Chlorobenzene	None Detected	µg/L	0.5	
Chloroethane	None Detected	µg/L	0.5	
2-Chloroethylvinyl ether	None Detected	µg/L	20.	
Chloroform	31.	µg/L	0.5	
Chloromethane	None Detected	µg/L	0.5	
2-Chlorotoluene	None Detected	µg/L	0.5	
4-Chlorotoluene	None Detected	µg/L	0.5	
Dibromochloromethane	None Detected	µg/L	0.5	
1,2-Dibromo-3-Chloropropane	None Detected	µg/L	0.5	
1,2-Dibromoethane	None Detected	µg/L	0.5	
Dibromomethane	None Detected	µg/L	0.5	
1,2-Dichlorobenzene	None Detected	µg/L	0.5	
1,3-Dichlorobenzene	None Detected	µg/L	0.5	
1,4-Dichlorobenzene	None Detected	µg/L	0.5	
Dichlorodifluoromethane	None Detected	µg/L	0.5	
1,1-Dichloroethane	31.	µg/L	0.5	
1,2-Dichloroethane	0.54	µg/L	0.5	
1,1-Dichloroethene	29.	µg/L	0.5	
cis-1,2-Dichloroethene	2.9	µg/L	0.5	
trans-1,2-Dichloroethene	None Detected	µg/L	0.5	
1,2-Dichloropropane	2.9	µg/L	0.5	
1,3-Dichloropropane	None Detected	µg/L	0.5	
2,2-Dichloropropane	None Detected	µg/L	0.5	
1,1-Dichloropropene	None Detected	µg/L	0.5	
cis-1,3-Dichloropropene	None Detected	µg/L	0.5	
trans-1,3-Dichloropropene	None Detected	µg/L	0.5	
Ethyl Benzene	None Detected	µg/L	0.5	
Hexachlorobutadiene	None Detected	µg/L	0.5	
Isopropylbenzene	None Detected	µg/L	0.5	
p-Isopropyltoluene	None Detected	µg/L	0.5	
Methylene Chloride	None Detected	µg/L	0.5	
Naphthalene	None Detected	µg/L	0.5	

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ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-6

Sample Description: CA00028000200002, FORMER ILM, P-12, 03/03/99 @ 03:45PM, TEEPLE/J.NEWMAN

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
n-Propylbenzene	None Detected	µg/L	0.5	
Styrene	None Detected	µg/L	0.5	
1,1,1,2-Tetrachloroethane	None Detected	µg/L	0.5	
1,1,2,2-Tetrachloroethane	None Detected	µg/L	0.5	
Tetrachloroethene	1.5	µg/L	0.5	
Toluene	None Detected	µg/L	0.5	
1,2,3-Trichlorobenzene	None Detected	µg/L	0.5	
1,2,4-Trichlorobenzene	None Detected	µg/L	0.5	
1,1,1-Trichloroethane	8.9	µg/L	0.5	
1,1,2-Trichloroethane	1.6	µg/L	0.5	
Trichloroethene	1500.	µg/L	20.	*2
Trichlorofluoromethane	None Detected	µg/L	0.5	
1,2,3-Trichloropropane	None Detected	µg/L	0.5	
1,2,4-Trimethylbenzene	None Detected	µg/L	0.5	
1,3,5-Trimethylbenzene	None Detected	µg/L	0.5	
Vinyl Chloride	None Detected	µg/L	0.5	
Total Xylenes	None Detected	µg/L	1.	

Quality Control Data

Surrogates	% Recovery	Control Limits
1,2-Dichloroethane-d4	109.	76-114
Toluene-d8	96.	88-110
4-Bromofluorobenzene	99.	86-115

Note: PQL's were raised due to dilution required to bring target analytes into calibration range.

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.
*2 = Dilution factor = 25
California D.O.H.S. Cert. #1186, AZ License: AZ0345

Stuart G. Buttram
Department Supervisor

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ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-7

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-2
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/02/99 @ 03:20PM
Date Extracted: 03/05/99
Date Analyzed: 03/05/99
Dilution Used: 1

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
Benzene	None Detected	µg/L	0.5	
Bromobenzene	None Detected	µg/L	0.5	
Bromochloromethane	None Detected	µg/L	0.5	
Bromodichloromethane	None Detected	µg/L	0.5	*1
Bromoform	None Detected	µg/L	0.5	
Bromomethane	None Detected	µg/L	0.5	
n-Butylbenzene	None Detected	µg/L	0.5	
sec-Butylbenzene	0.93	µg/L	0.5	
tert-Butylbenzene	None Detected	µg/L	0.5	
Carbon tetrachloride	None Detected	µg/L	0.5	
Chlorobenzene	None Detected	µg/L	0.5	
Chloroethane	None Detected	µg/L	0.5	
2-Chloroethylvinyl ether	None Detected	µg/L	20.	
Chloroform	None Detected	µg/L	0.5	
Chloromethane	None Detected	µg/L	0.5	
2-Chlorotoluene	None Detected	µg/L	0.5	
4-Chlorotoluene	None Detected	µg/L	0.5	
Dibromochloromethane	None Detected	µg/L	0.5	
1,2-Dibromo-3-Chloropropane	None Detected	µg/L	0.5	
1,2-Dibromoethane	None Detected	µg/L	0.5	
Dibromomethane	None Detected	µg/L	0.5	
1,2-Dichlorobenzene	None Detected	µg/L	0.5	
1,3-Dichlorobenzene	None Detected	µg/L	0.5	
1,4-Dichlorobenzene	None Detected	µg/L	0.5	
Dichlorodifluoromethane	None Detected	µg/L	0.5	
1,1-Dichloroethane	None Detected	µg/L	0.5	
1,2-Dichloroethane	None Detected	µg/L	0.5	
1,1-Dichloroethene	None Detected	µg/L	0.5	
cis-1,2-Dichloroethene	None Detected	µg/L	0.5	
trans-1,2-Dichloroethene	None Detected	µg/L	0.5	
1,2-Dichloropropane	None Detected	µg/L	0.5	
1,3-Dichloropropane	None Detected	µg/L	0.5	
2,2-Dichloropropane	None Detected	µg/L	0.5	
1,1-Dichloropropene	None Detected	µg/L	0.5	
cis-1,3-Dichloropropene	None Detected	µg/L	0.5	
trans-1,3-Dichloropropene	None Detected	µg/L	0.5	
Ethyl Benzene	None Detected	µg/L	0.5	
Hexachlorobutadiene	None Detected	µg/L	0.5	
Isopropylbenzene	0.87	µg/L	0.5	
p-Isopropyltoluene	1.5	µg/L	0.5	
Methylene Chloride	None Detected	µg/L	0.5	
Naphthalene	None Detected	µg/L	0.5	

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Volatile Organic Analysis
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ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-7

Sample Description: CA00028000200002, FORMER ILM, P-2, 03/02/99 @ 03:20PM, TEEPLE/J.NEWMAN

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit
n-Propylbenzene	None Detected	µg/L	0.5
Styrene	None Detected	µg/L	0.5
1,1,1,2-Tetrachloroethane	None Detected	µg/L	0.5
1,1,2,2-Tetrachloroethane	None Detected	µg/L	0.5
Tetrachloroethene	None Detected	µg/L	0.5
Toluene	None Detected	µg/L	0.5
1,2,3-Trichlorobenzene	None Detected	µg/L	0.5
1,2,4-Trichlorobenzene	None Detected	µg/L	0.5
1,1,1-Trichloroethane	None Detected	µg/L	0.5
1,1,2-Trichloroethane	None Detected	µg/L	0.5
Trichloroethene	0.70	µg/L	0.5
Trichlorofluoromethane	None Detected	µg/L	0.5
1,2,3-Trichloropropane	None Detected	µg/L	0.5
1,2,4-Trimethylbenzene	None Detected	µg/L	0.5
1,3,5-Trimethylbenzene	0.58	µg/L	0.5
Vinyl Chloride	None Detected	µg/L	0.5
Total Xylenes	None Detected	µg/L	1.

Quality Control Data

Surrogates	% Recovery	Control Limits
1,2-Dichloroethane-d4	110.	76-114
Toluene-d8	94.	88-110
4-Bromofluorobenzene	96.	86-115

Internal end BFB 12 hour criteria exceeded.
Internal end CCV 12 hour criteria exceeded.

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.
California D.O.H.S. Cert. #1186, AZ License: AZ0345

Stuart G. Buttram
Department Supervisor

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1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-8

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: P-16C
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/02/99 @ 04:45PM
Date Extracted: 03/06/99
Date Analyzed: 03/06/99
Dilution Used: 1

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
Benzene	None Detected	µg/L	0.5	
Bromobenzene	None Detected	µg/L	0.5	
Bromochloromethane	None Detected	µg/L	0.5	
Bromodichloromethane	None Detected	µg/L	0.5	*1
Bromoform	None Detected	µg/L	0.5	
Bromomethane	None Detected	µg/L	0.5	
n-Butylbenzene	None Detected	µg/L	0.5	
sec-Butylbenzene	None Detected	µg/L	0.5	
tert-Butylbenzene	None Detected	µg/L	0.5	
Carbon tetrachloride	None Detected	µg/L	0.5	
Chlorobenzene	None Detected	µg/L	0.5	
Chloroethane	None Detected	µg/L	0.5	
2-Chloroethylvinyl ether	None Detected	µg/L	20.	
Chloroform	1.7	µg/L	0.5	
Chloromethane	None Detected	µg/L	0.5	
2-Chlorotoluene	None Detected	µg/L	0.5	
4-Chlorotoluene	None Detected	µg/L	0.5	
Dibromochloromethane	None Detected	µg/L	0.5	
1,2-Dibromo-3-Chloropropane	None Detected	µg/L	0.5	
1,2-Dibromoethane	None Detected	µg/L	0.5	
Dibromomethane	None Detected	µg/L	0.5	
1,2-Dichlorobenzene	None Detected	µg/L	0.5	
1,3-Dichlorobenzene	None Detected	µg/L	0.5	
1,4-Dichlorobenzene	None Detected	µg/L	0.5	
Dichlorodifluoromethane	None Detected	µg/L	0.5	
1,1-Dichloroethane	0.94	µg/L	0.5	
1,2-Dichloroethane	None Detected	µg/L	0.5	
1,1-Dichloroethene	43.	µg/L	0.5	
cis-1,2-Dichloroethene	0.65	µg/L	0.5	
trans-1,2-Dichloroethene	None Detected	µg/L	0.5	
1,2-Dichloropropane	None Detected	µg/L	0.5	
1,3-Dichloropropane	None Detected	µg/L	0.5	
2,2-Dichloropropane	None Detected	µg/L	0.5	
1,1-Dichloropropene	None Detected	µg/L	0.5	
cis-1,3-Dichloropropene	None Detected	µg/L	0.5	
trans-1,3-Dichloropropene	None Detected	µg/L	0.5	
Ethyl Benzene	None Detected	µg/L	0.5	
Hexachlorobutadiene	None Detected	µg/L	0.5	
Isopropylbenzene	None Detected	µg/L	0.5	
p-Isopropyltoluene	None Detected	µg/L	0.5	
Methylene Chloride	None Detected	µg/L	0.5	
Naphthalene	None Detected	µg/L	0.5	

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BC LABORATORIES

Volatile Organic Analysis
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ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-8

Sample Description: CA00028000200002, FORMER ILM, P-16C, 03/02/99 @ 04:45PM, TEEPLE/J.NEWMAN

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
n-Propylbenzene	None Detected	µg/L	0.5	
Styrene	None Detected	µg/L	0.5	
1,1,1,2-Tetrachloroethane	None Detected	µg/L	0.5	
1,1,2,2-Tetrachloroethane	None Detected	µg/L	0.5	
Tetrachloroethene	0.78	µg/L	0.5	
Toluene	None Detected	µg/L	0.5	
1,2,3-Trichlorobenzene	None Detected	µg/L	0.5	
1,2,4-Trichlorobenzene	None Detected	µg/L	0.5	
1,1,1-Trichloroethane	None Detected	µg/L	0.5	
1,1,2-Trichloroethane	None Detected	µg/L	0.5	
Trichloroethene	210.	µg/L	3.	*2
Trichlorofluoromethane	None Detected	µg/L	0.5	
1,2,3-Trichloropropane	None Detected	µg/L	0.5	
1,2,4-Trimethylbenzene	None Detected	µg/L	0.5	
1,3,5-Trimethylbenzene	None Detected	µg/L	0.5	
Vinyl Chloride	None Detected	µg/L	0.5	
Total Xylenes	None Detected	µg/L	1.	

Quality Control Data

Surrogates	% Recovery	Control Limits
1,2-Dichloroethane-d4	104.	76-114
Toluene-d8	96.	88-110
4-Bromofluorobenzene	94.	86-115

Note: PQL's were raised due to dilution required to bring target analytes into calibration range.
Internal end BFB 12 hour criteria exceeded.
Internal end CCV 12 hour criteria exceeded.

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.
*2 = Dilution factor = 5

California D.O.H.S. Cert. #1186, AZ License: AZ0345

Stuart G. Buttram
Department Supervisor

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ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-9TB

Project Number: CA00028000200002
Sampling Location: FORMER ILM
Sample ID: TRAVEL BLANK
Sample Matrix: Groundwater
Sample Collected By: TEEPLE/J.NEWMAN

Date Collected: 03/02/99
Date Extracted: 03/05/99
Date Analyzed: 03/05/99
Dilution Used: 1

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit	
Benzene	None Detected	µg/L	0.5	
Bromobenzene	None Detected	µg/L	0.5	
Bromochloromethane	None Detected	µg/L	0.5	
Bromodichloromethane	None Detected	µg/L	0.5	*1
Bromoform	None Detected	µg/L	0.5	
Bromomethane	None Detected	µg/L	0.5	
n-Butylbenzene	None Detected	µg/L	0.5	
sec-Butylbenzene	None Detected	µg/L	0.5	
tert-Butylbenzene	None Detected	µg/L	0.5	
Carbon tetrachloride	None Detected	µg/L	0.5	
Chlorobenzene	None Detected	µg/L	0.5	
Chloroethane	None Detected	µg/L	0.5	
2-Chloroethylvinyl ether	None Detected	µg/L	20.	
Chloroform	None Detected	µg/L	0.5	
Chloromethane	None Detected	µg/L	0.5	
2-Chlorotoluene	None Detected	µg/L	0.5	
4-Chlorotoluene	None Detected	µg/L	0.5	
Dibromochloromethane	None Detected	µg/L	0.5	
1,2-Dibromo-3-Chloropropane	None Detected	µg/L	0.5	
1,2-Dibromoethane	None Detected	µg/L	0.5	
Dibromomethane	None Detected	µg/L	0.5	
1,2-Dichlorobenzene	None Detected	µg/L	0.5	
1,3-Dichlorobenzene	None Detected	µg/L	0.5	
1,4-Dichlorobenzene	None Detected	µg/L	0.5	
Dichlorodifluoromethane	None Detected	µg/L	0.5	
1,1-Dichloroethane	None Detected	µg/L	0.5	
1,2-Dichloroethane	None Detected	µg/L	0.5	
1,1-Dichloroethene	None Detected	µg/L	0.5	
cis-1,2-Dichloroethene	None Detected	µg/L	0.5	
trans-1,2-Dichloroethene	None Detected	µg/L	0.5	
1,2-Dichloropropane	None Detected	µg/L	0.5	
1,3-Dichloropropane	None Detected	µg/L	0.5	
2,2-Dichloropropane	None Detected	µg/L	0.5	
1,1-Dichloropropene	None Detected	µg/L	0.5	
cis-1,3-Dichloropropene	None Detected	µg/L	0.5	
trans-1,3-Dichloropropene	None Detected	µg/L	0.5	
Ethyl Benzene	None Detected	µg/L	0.5	
Hexachlorobutadiene	None Detected	µg/L	0.5	
Isopropylbenzene	None Detected	µg/L	0.5	
Isopropyltoluene	None Detected	µg/L	0.5	
Methylene Chloride	3.0	µg/L	0.5	
Naphthalene	None Detected	µg/L	0.5	

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BC LABORATORIES

Volatile Organic Analysis
(EPA Method 8260)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
Attn: TERESA WILSON 714-278-0992

Date Reported: 03/10/99
Date Received: 03/03/99
Laboratory No.: 99-02656-9TB

Sample Description: CA00028000200002, FORMER ILM, TRAVEL BLANK, 03/02/99, TEEPLE/J.NEWMAN

Constituents	Analysis Results	Reporting Units	Practical Quantitation Limit
n-Propylbenzene	None Detected	µg/L	0.5
Styrene	None Detected	µg/L	0.5
1,1,1,2-Tetrachloroethane	None Detected	µg/L	0.5
1,1,2,2-Tetrachloroethane	None Detected	µg/L	0.5
Tetrachloroethene	None Detected	µg/L	0.5
Toluene	None Detected	µg/L	0.5
1,2,3-Trichlorobenzene	None Detected	µg/L	0.5
1,2,4-Trichlorobenzene	None Detected	µg/L	0.5
1,1,1-Trichloroethane	None Detected	µg/L	0.5
1,1,2-Trichloroethane	None Detected	µg/L	0.5
Trichloroethene	None Detected	µg/L	0.5
Trichlorofluoromethane	None Detected	µg/L	0.5
1,2,3-Trichloropropane	None Detected	µg/L	0.5
1,2,4-Trimethylbenzene	None Detected	µg/L	0.5
1,3,5-Trimethylbenzene	None Detected	µg/L	0.5
Vinyl Chloride	None Detected	µg/L	0.5
Total Xylenes	None Detected	µg/L	1.

Quality Control Data

Surrogates	% Recovery	Control Limits
1,2-Dichloroethane-d4	108.	76-114
Toluene-d8	95.	88-110
4-Bromofluorobenzene	90.	86-115

Internal end BFB 12 hour criteria exceeded.
Internal end CCV 12 hour criteria exceeded.

Flag Explanations:
*1 = Matrix spike recoveries not within established limits. Results may be biased.
California D.O.H.S. Cert. #1186, AZ License: AZ0345

Stuart G. Buttram
Department Supervisor

All results listed in this report are for the exclusive use of the submitting party. BC Laboratories, Inc. assumes no responsibility for report alteration, separation, detachment or third party interpretation.

4100 Atlas Ct. · Bakersfield, CA 93308 · (805) 327-4911 · FAX (805) 327-1918

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT - LEVEL III
(Preparation & Analysis Information)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	Preparation Method	Preparation Date	Preparation Technician	Analytical Method	Run Date	Analyst
Dissolved Aluminum	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Dissolved Antimony	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Dissolved Arsenic	SM-3114B	03/08/99	KSV	SM-3114B	03/11/99	TMS
Dissolved Barium	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Dissolved Beryllium	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Dissolved Cadmium	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Dissolved Chromium	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Hexavalent Chromium	0.45uFilt	03/04/99	TDC	EPA-7196	03/04/99	TDC
Dissolved Cobalt	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Dissolved Copper	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Dissolved Iron	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Dissolved Lead	EPA-600-4-79-02	03/03/99	FIELD	EPA-7421	03/05/99	MRM
Dissolved Mercury	EPA-7470	03/12/99	DIW	EPA-7470	03/12/99	DIW
Dissolved Molybdenum	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Dissolved Nickel	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Dissolved Selenium	SM-3114B	03/08/99	KSV	SM-3114B	03/10/99	TMS
Dissolved Silver	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Dissolved Titanium	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Dissolved Thallium	EPA-600-4-79-02	03/03/99	FIELD	EPA-7841	03/05/99	MRM
Dissolved Vanadium	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Dissolved Zinc	EPA-600-4-79-02	03/03/99	FIELD	EPA-6010	03/11/99	MTM
Total Aluminum	EPA-3010	03/05/99	PAP	EPA-6010	03/06/99	MTM
Total Antimony	EPA-3010	03/05/99	PAP	EPA-6010	03/06/99	MTM
Total Arsenic	SM-3114B	03/08/99	KSV	SM-3114B	03/11/99	TMS
Total Barium	EPA-3010	03/05/99	PAP	EPA-6010	03/06/99	MTM
Total Beryllium	EPA-3010	03/05/99	PAP	EPA-6010	03/06/99	MTM
Total Cadmium	EPA-3010	03/05/99	PAP	EPA-6010	03/06/99	MTM
Total Chromium	EPA-3010	03/05/99	PAP	EPA-6010	03/06/99	MTM
Total Cobalt	EPA-3010	03/05/99	PAP	EPA-6010	03/06/99	MTM
Total Copper	EPA-3010	03/05/99	PAP	EPA-6010	03/06/99	MTM
Total Iron	EPA-3010	03/05/99	PAP	EPA-6010	03/06/99	MTM

BOE-C6-0234640

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT - LEVEL III
(Preparation & Analysis Information)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	Preparation Method	Preparation Date	Preparation Technician	Analytical Method	Run Date	Analyst
Total Lead	EPA-3020	03/05/99	PAP	EPA-7421	03/05/99	MRM
Total Mercury	EPA-7470	03/12/99	DIW	EPA-7470	03/12/99	DIW
Total Molybdenum	EPA-3010	03/05/99	PAP	EPA-6010	03/06/99	MTM
Total Nickel	EPA-3010	03/05/99	PAP	EPA-6010	03/06/99	MTM
Total Selenium	SM-3114B	03/08/99	KSV	SM-3114B	03/10/99	TMS
Total Silver	EPA-3010	03/05/99	PAP	EPA-6010	03/06/99	MTM
Total Titanium	EPA-3010	03/05/99	PAP	EPA-6010	03/05/99	MTM
Total Thallium	EPA-3010	03/05/99	PAP	EPA-7841	03/05/99	MRM
Total Vanadium	EPA-3010	03/05/99	PAP	EPA-6010	03/06/99	MTM
Total Zinc	EPA-3010	03/05/99	PAP	EPA-6010	03/06/99	MTM

Quality Control Officer

Anthony Bonanno

4100 Atlas Ct. · Bakersfield, CA 93308) 327-4911 · FAX (661) 327-1918

BOE-C6-0234641

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT
(Instrumental & Blank Parameters)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	ICV % Found	ICV %Found Control Limits	CCV % Found Before	CCV % Found After	% Found Control Limits	CCB Readings Before	Units	CCB Readings After	Units	Method Blank Readings	Units
Dissolved Aluminum	101.	90 - 110	103.	100.	90 - 110	<50.	µg/L	<50.	µg/L	<50.	µg/L
Dissolved Antimony	97.	90 - 110	100.	99.	90 - 110	<100.	µg/L	<100.	µg/L	<100.	µg/L
Dissolved Arsenic	102.	90 - 110	102.	100.	90 - 110	< 1.	µg/L	< 1.	µg/L	< 2.	µg/L
Dissolved Barium	98.	90 - 110	100.	96.	90 - 110	<100.	µg/L	<100.	µg/L	<100.	µg/L
Dissolved Beryllium	99.	90 - 110	101.	98.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Dissolved Cadmium	98.	90 - 110	101.	98.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Dissolved Chromium	98.	90 - 110	100.	98.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Hexavalent Chromium	99.	90 - 110	101.	106.	90 - 110	< 0.002	mg/L	< 0.002	mg/L	< 2.	µg/L
Dissolved Cobalt	100.	90 - 110	102.	100.	90 - 110	<50.	µg/L	<50.	µg/L	<50.	µg/L
Dissolved Copper	98.	90 - 110	100.	97.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Dissolved Iron	101.	90 - 110	102.	100.	90 - 110	<50.	µg/L	<50.	µg/L	<50.	µg/L
Dissolved Lead	100.	90 - 110	102.	94.	90 - 110	< 5.	µg/L	< 5.	µg/L	< 5.	µg/L
Dissolved Mercury	100.	90 - 110	100.	98.	80 - 120	< 0.2	µg/L	< 0.2	µg/L	< 0.2	µg/L
Dissolved Molybdenum	100.	90 - 110	102.	99.	90 - 110	<50.	µg/L	<50.	µg/L	<50.	µg/L
Dissolved Nickel	101.	90 - 110	102.	100.	90 - 110	<50.	µg/L	<50.	µg/L	<50.	µg/L
Dissolved Selenium	102.	90 - 110	102.	108.	90 - 110	< 1.	µg/L	< 1.	µg/L	< 2.	µg/L
Dissolved Silver	95.	90 - 110	95.	92.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Dissolved Titanium	99.	90 - 110	100.	97.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Dissolved Thallium	100.	90 - 110	100.	98.	90 - 110	< 1.	µg/L	< 1.	µg/L	< 1.	µg/L
Dissolved Vanadium	98.	90 - 110	100.	97.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Dissolved Zinc	101.	90 - 110	104.	102.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Total Aluminum	99.	90 - 110	100.	100.	90 - 110	<50.	µg/L	<50.	µg/L	<50.	µg/L
Total Antimony	101.	90 - 110	101.	102.	90 - 110	<100.	µg/L	<100.	µg/L	<100.	µg/L
Total Arsenic	102.	90 - 110	102.	100.	90 - 110	< 1.	µg/L	< 1.	µg/L	< 2.	µg/L
Total Barium	100.	90 - 110	99.	100.	90 - 110	<100.	µg/L	<100.	µg/L	<100.	µg/L
Total Beryllium	97.	90 - 110	99.	98.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Total Cadmium	100.	90 - 110	99.	100.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Total Chromium	99.	90 - 110	101.	101.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Total Cobalt	101.	90 - 110	100.	101.	90 - 110	<50.	µg/L	<50.	µg/L	<50.	µg/L
Total Copper	101.	90 - 110	100.	102.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Total Iron	98.	90 - 110	99.	99.	90 - 110	<50.	µg/L	<50.	µg/L	<50.	µg/L

BOE-C6-0234642

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT
(Instrumental & Blank Parameters)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	ICV % Found	ICV %Found Control Limits	CCV % Found Before	CCV % Found After	% Found Control Limits	CCB Readings Before	Units	CCB Readings After	Units	Method Blank Readings	Units
Total Lead	100.	90 - 110	101.	100.	90 - 110	< 5.	µg/L	< 5.	µg/L	< 5.	µg/L
Total Mercury	100.	90 - 110	107.	107.	80 - 120	< 0.2	µg/L	< 0.2	µg/L	< 0.2	µg/L
Total Molybdenum	99.	90 - 110	101.	100.	90 - 110	<50.	µg/L	<50.	µg/L	<50.	µg/L
Total Nickel	98.	90 - 110	99.	98.	90 - 110	<50.	µg/L	<50.	µg/L	<50.	µg/L
Total Selenium	102.	90 - 110	102.	108.	90 - 110	< 1.	µg/L	< 1.	µg/L	< 2.	µg/L
Total Silver	100.	90 - 110	103.	102.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Total Titanium	99.	90 - 110	99.	100.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Total Thallium	100.	90 - 110	110.	103.	90 - 110	< 1.	µg/L	< 1.	µg/L	< 1.	µg/L
Total Vanadium	102.	90 - 110	101.	102.	90 - 110	<10.	µg/L	<10.	µg/L	<10.	µg/L
Total Zinc	103.	90 - 110	103.	104.	90 - 110	<50.	µg/L	<50.	µg/L	<50.	µg/L

ICV = Initial Calibration Verification; CCV = Continuing Calibration Verification; CCB = Continuing Calibration Blank

Quality Control Officer

Anthony Bonanno

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BOE-C6-0234643

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT - LEVEL III
(Precision & Accuracy)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	QC Sample ID	Sample Result	Sample Duplicate	MS Result	MSD Result	MS Spike Level	MSD Spike Level	Units	Sample R.P.D.	Spike R.P.D.	Precision Control Limits	MS % Rec	MSD % Rec	Accuracy Control Limits
Dissolved Aluminum	2656-3	< 50.	< 50.	452.	433.	408.	408.	µg/L	<PQL	4.	20	111.	107.	85 - 115
Dissolved Antimony	2656-3	<100.	<100.	449.	443.	408.	408.	µg/L	<PQL	1.	20	109.	107.	85 - 115
Dissolved Arsenic #1,3	DISS-2652-4	1.42	1.44	20.9	21.	20.	20.	µg/L	<PQL	0.	20	98.	98.	80 - 120
Dissolved Arsenic #4-8	DISS-2656-4	< 2.	< 2.	20.4	20.4	20.	20.	µg/L	<PQL	0.	20	97.	97.	80 - 120
Dissolved Barium	2656-3	120.	120.	328.	324.	204.	204.	µg/L	<PQL	1.	20	102.	100.	85 - 115
Dissolved Beryllium	2656-3	< 10.	< 10.	206.	204.	204.	204.	µg/L	<PQL	1.	20	101.	100.	85 - 115
Dissolved Cadmium	2656-3	< 10.	< 10.	213.	210.	204.	204.	µg/L	<PQL	1.	20	103.	102.	85 - 115
Dissolved Chromium	2656-3	< 10.	< 10.	206.	205.	204.	204.	µg/L	<PQL	0.	20	100.	100.	85 - 115
Hexavalent Chromium	2652-2	< 2.000	< 2.000	52.3	53.	52.6	52.6	µg/L	<PQL	1.	10	99.	101.	85 - 115
Dissolved Cobalt	2656-3	< 50.	< 50.	216.	214.	204.	204.	µg/L	<PQL	1.	20	106.	105.	85 - 115
Dissolved Copper	2656-3	< 10.	< 10.	210.	210.	204.	204.	µg/L	<PQL	0.	20	103.	103.	85 - 115
Dissolved Iron	2656-3	< 50.	< 50.	435.	433.	408.	408.	µg/L	<PQL	0.	20	103.	103.	85 - 115
Dissolved Lead	DISS-2656-1	< 5.	< 5.	22.8	22.8	25.	25.	µg/L	<PQL	0.	20	90.	90.	85 - 115
Dissolved Mercury	DISS-02652-4	< 0.2	< 0.2	0.984	1.	1.	1.	µg/L	<PQL	2.	20	97.	99.	70 - 130
Dissolved Mercury #6	TOTAL-02652-2	< 0.2	< 0.2	1.02	0.912	1.	1.	µg/L	<PQL	11.	20	101.	90.	70 - 130
Dissolved Molybdenum	2656-3	< 50.	< 50.	199.	207.	204.	204.	µg/L	<PQL	4.	20	97.	101.	85 - 115
Dissolved Nickel	2656-3	< 50.	< 50.	424.	424.	408.	408.	µg/L	<PQL	0.	20	104.	104.	85 - 115
Dissolved Selenium	DISS-2652-4	1.6	1.76	21.8	21.6	20.	20.	µg/L	<PQL	1.	20	101.	100.	80 - 120
Dissolved Silver	2656-3	< 10.	< 10.	186.	187.	204.	204.	µg/L	<PQL	1.	20	93.	93.	85 - 115
Dissolved Titanium	2656-3	< 10.	< 10.	203.	202.	204.	204.	µg/L	<PQL	1.	20	101.	100.	85 - 115
Dissolved Thallium	DISS-2656-1	< 1.	< 1.	24.	24.4	25.	25.	µg/L	<PQL	1.	20	96.	97.	85 - 115
Dissolved Vanadium	2656-3	< 10.	< 10.	207.	207.	204.	204.	µg/L	<PQL	0.	20	100.	100.	85 - 115
Dissolved Zinc	2656-3	< 50.	< 50.	239.	236.	204.	204.	µg/L	<PQL	1.	20	109.	108.	85 - 115
Total Aluminum	TOTAL-2656-5	2200.	2190.	4440.	4460.	400.	400.	µg/L	0.	1.	20	H MEAN	H MEAN	80 - 120
Total Antimony	TOTAL-2656-5	<100.	<100.	401.	405.	400.	400.	µg/L	<PQL	1.	20	101.	102.	80 - 120
Total Arsenic	DISS-2652-4	1.42	1.44	20.9	21.	20.	20.	µg/L	<PQL	0.	20	98.	98.	80 - 120
Total Barium	TOTAL-2656-5	184.	185.	378.	381.	200.	200.	µg/L	<PQL	1.	20	97.	99.	80 - 120
Total Beryllium	TOTAL-2656-5	< 10.	< 10.	182.	184.	200.	200.	µg/L	<PQL	1.	20	91.	92.	80 - 120
Total Cadmium	TOTAL-2656-5	< 10.	< 10.	188.	191.	200.	200.	µg/L	<PQL	1.	20	96.	97.	80 - 120
Total Chromium	TOTAL-2656-5	25.4	20.	209.	209.	200.	200.	µg/L	<PQL	0.	20	92.	92.	80 - 120
Total Cobalt	TOTAL-2656-5	< 50.	< 50.	195.	198.	200.	200.	µg/L	<PQL	1.	20	97.	98.	80 - 120

BOE-C6-0234644

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT - LEVEL III
(Precision & Accuracy)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	QC Sample ID	Sample Result	Sample Duplicate	MS Result	MSD Result	MS Spike Level	MSD Spike Level	Units	Sample R.P.D.	Spike R.P.D.	Precision Control Limits	MS % Rec	MSD % Rec	Accuracy Control Limits
Total Copper	TOTAL-2656-5	< 10.	< 10.	201.	202.	200.	200.	µg/L	<PQL	1.	20	100.	101.	80 - 120
Total Iron	TOTAL-2656-5	2420.	2420.	3160.	3200.	400.	400.	µg/L	0.	1.	20	H MEAN	H MEAN	80 - 120
Total Lead	TOTAL-2656-6	< 5.	< 5.	16.8	17.1	20.	20.	µg/L	<PQL	2.	20	84.	85.	80 - 120
Total Mercury	TOTAL-02652-2	< 0.2	< 0.2	1.02	0.912	1.	1.	µg/L	<PQL	11.	20	101.	90.	70 - 130
Total Mercury #6,8	DISS-02652-4	< 0.2	< 0.2	0.984	1.	1.	1.	µg/L	<PQL	2.	20	97.	99.	70 - 130
Total Molybdenum	TOTAL-2656-5	< 50.	< 50.	196.	198.	200.	200.	µg/L	<PQL	1.	20	96.	97.	80 - 120
Total Nickel	TOTAL-2656-5	< 50.	< 50.	367.	370.	400.	400.	µg/L	<PQL	1.	20	90.	91.	80 - 120
Total Selenium	DISS-2652-4	1.6	1.76	21.8	21.6	20.	20.	µg/L	<PQL	1.	20	101.	100.	80 - 120
Total Selenium #4-8	DISS-2656-4	< 2.	< 2.	20.	21.9	20.	20.	µg/L	<PQL	9.	20	96.	106.	80 - 120
Total Silver	TOTAL-2656-5	< 10.	< 10.	183.	184.	200.	200.	µg/L	<PQL	0.	20	93.	94.	80 - 120
Total Titanium	TOTAL-2656-5-0	139.	138.	413.	410.	200.	200.	µg/L	1.	1.	20	137.	135.	80 - 120
Total Thallium	TOTAL-2656-6	< 1.	< 1.	19.3	20.7	20.	20.	µg/L	<PQL	7.	20	96.	103.	80 - 120
Total Vanadium	TOTAL-2656-5	12.	10.	202.	204.	200.	200.	µg/L	<PQL	1.	20	95.	96.	80 - 120
Total Zinc	TOTAL-2656-5	< 50.	< 50.	217.	218.	200.	200.	µg/L	<PQL	1.	20	99.	100.	80 - 120

MS = Matrix Spike; MSD = Matrix Spike Duplicate; RPD = Relative Percent Difference

The matrix spike recoveries for total titanium are outside QC limits.

Quality Control Officer

Anthony Bonanno

4100 Atlas Ct. • Bakersfield, CA 93308 1) 327-4911 • FAX (661) 327-1918

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT - LEVEL III
(Laboratory Control Sample)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	QC Sample ID	Sample Result	Spike Level	Units	% Rec	Accuracy Control Limits
Dissolved Aluminum	LFB#1-0129	426.7	400.	µg/L	107.	85 - 115
Dissolved Antimony	LFB#1-0129	413.3	400.	µg/L	103.	85 - 115
Dissolved Arsenic	LCSW1-03-0	9.85	10.	µg/L	99.	85 - 115
Dissolved Barium	LFB#1-0129	193.6	200.	µg/L	97.	85 - 115
Dissolved Beryllium	LFB#1-0129	189.9	200.	µg/L	95.	85 - 115
Dissolved Cadmium	LFB#1-0129	197.3	200.	µg/L	99.	85 - 115
Dissolved Chromium	LFB#1-0129	194.	200.	µg/L	97.	85 - 115
Hexavalent Chromium	LCSW-3-4-9	1022.	1000.	µg/L	102.	85 - 115
Dissolved Cobalt	LFB#1-0129	208.2	200.	µg/L	104.	85 - 115
Dissolved Copper	LFB#1-0129	197.2	200.	µg/L	99.	85 - 115
Dissolved Iron	LFB#1-0129	398.7	400.	µg/L	100.	85 - 115
Dissolved Lead	LFB-25-LCS	24.39	25.	µg/L	98.	85 - 115
Dissolved Mercury	LCSW1-03-1	0.9676	1.0	µg/L	97.	85 - 115
Dissolved Molybdenum	LFB#1-0129	204.1	200.	µg/L	102.	85 - 115
Dissolved Nickel	LFB#1-0129	422.4	400.	µg/L	106.	85 - 115
Dissolved Selenium	LCSW1-03-0	9.5	10.	µg/L	95.	85 - 115
Dissolved Silver	LFB#1-0129	183.6	200.	µg/L	92.	85 - 115
Dissolved Titanium	LFB#1-0129	191.5	200.	µg/L	96.	85 - 115
Dissolved Thallium	LFB-25-LCS	24.88	25.	µg/L	100.	85 - 115
Dissolved Vanadium	LFB#1-0129	190.9	200.	µg/L	95.	85 - 115
Dissolved Zinc	LFB#1-0129	218.6	200.	µg/L	109.	85 - 115
Total Aluminum	TOTAL-LCSW	422.8	400.	µg/L	106.	80 - 120
Total Antimony	TOTAL-LCSW	439.3	400.	µg/L	110.	80 - 120
Total Arsenic	LCSW1-03-0	9.85	10.	µg/L	99.	85 - 115
Total Barium	TOTAL-LCSW	199.9	200.	µg/L	100.	80 - 120
Total Beryllium	TOTAL-LCSW	190.9	200.	µg/L	95.	80 - 120
Total Cadmium	TOTAL-LCSW	203.7	200.	µg/L	102.	80 - 120
Total Chromium	TOTAL-LCSW	203.3	200.	µg/L	102.	80 - 120
Total Cobalt	TOTAL-LCSW	212.	200.	µg/L	106.	80 - 120
Total Copper	TOTAL-LCSW	199.4	200.	µg/L	100.	80 - 120
Total Iron	TOTAL-LCSW	396.9	400.	µg/L	99.	80 - 120

BOE-C6-0234646

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT - LEVEL III
(Laboratory Control Sample)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	QC Sample ID	Sample Result	Spike Level	Units	% Rec	Accuracy Control Limits
Total Lead	TOTAL-LCSW	19.64	20.	µg/L	98.	80 - 120
Total Mercury	LCSW2-03-1	1.04	1.0	µg/L	104.	85 - 115
Total Molybdenum	TOTAL-LCSW	205.4	200.	µg/L	103.	80 - 120
Total Nickel	TOTAL-LCSW	402.4	400.	µg/L	101.	80 - 120
Total Selenium	LCSW1-03-0	9.5	10.	µg/L	95.	85 - 115
Total Silver	TOTAL-LCSW	201.4	200.	µg/L	101.	80 - 120
Total Titanium	TOTAL-LCSW	185.5	200.	µg/L	93.	80 - 120
Total Thallium	TOTAL-LCSW	22.81	20.	µg/L	114.	80 - 120
Total Vanadium	TOTAL-LCSW	200.6	200.	µg/L	100.	80 - 120
Total Zinc	TOTAL-LCSW	214.	200.	µg/L	107.	80 - 120

Quality Control Officer

Anthony Bonanno

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BOE-C6-0234647

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT
(Preparation & Analysis Information)
Method 8260

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1 - 99-02656-8, 99-02656-9TB

Constituents	Preparation Method	Preparation Date	Preparation Technician	Analytical Method	Run Date	Analyst
Method 8260 compounds	EPA-5030	03/05/99	MCH	EPA-8260	03/05/99	MCH
Method 8260 compounds #1(dil), 3(dil),4(dil),5(dil),6(dil), 8(dil)	EPA-5030	03/06/99	MCH	EPA-8260	03/06/99	MCH

Quality Control Officer

Anthony Bonanno

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BOE-C6-0234648

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT
(Instrumental & Blank Parameters)
Method 8260

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1 - 99-02656-8, 99-02656-9TB

Constituents	Method Blank Readings	Units
Benzene	< 0.5	µg/L
Bromobenzene	< 0.5	µg/L
Bromochloromethane	< 0.5	µg/L
Bromodichloromethane	< 0.5	µg/L
Bromoform	< 0.5	µg/L
Bromomethane	< 0.5	µg/L
n-Butylbenzene	< 0.5	µg/L
sec-Butylbenzene	< 0.5	µg/L
tert-Butylbenzene	< 0.5	µg/L
Carbon tetrachloride	< 0.5	µg/L
Chlorobenzene	< 0.5	µg/L
Chloroethane	< 0.5	µg/L
2-Chloroethylvinyl ether	<20.	µg/L
Chloroform	< 0.5	µg/L
Chloromethane	< 0.5	µg/L
2-Chlorotoluene	< 0.5	µg/L
4-Chlorotoluene	< 0.5	µg/L
Dibromochloromethane	< 0.5	µg/L
1,2-Dibromo-3-Chloropropane	< 0.5	µg/L
1,2-Dibromoethane	< 0.5	µg/L
Dibromomethane	< 0.5	µg/L
1,2-Dichlorobenzene	< 0.5	µg/L
1,3-Dichlorobenzene	< 0.5	µg/L
1,4-Dichlorobenzene	< 0.5	µg/L
Dichlorodifluoromethane	< 0.5	µg/L
1,1-Dichloroethane	< 0.5	µg/L
1,2-Dichloroethane	< 0.5	µg/L
1,1-Dichloroethene	< 0.5	µg/L
cis-1,2-Dichloroethene	< 0.5	µg/L
trans-1,2-Dichloroethene	< 0.5	µg/L

BOE-C6-0234649

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT
(Instrumental & Blank Parameters)
Method 8260

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1 - 99-02656-8, 99-02656-9TB

Constituents	Method Blank Readings	Units
1,2-Dichloropropane	< 0.5	µg/L
1,3-Dichloropropane	< 0.5	µg/L
2,2-Dichloropropane	< 0.5	µg/L
1,1-Dichloropropene	< 0.5	µg/L
cis-1,3-Dichloropropene	< 0.5	µg/L
trans-1,3-Dichloropropene	< 0.5	µg/L
Ethyl Benzene	< 0.5	µg/L
Hexachlorobutadiene	< 0.5	µg/L
Isopropylbenzene	< 0.5	µg/L
p-Isopropyltoluene	< 0.5	µg/L
Methylene Chloride	< 0.5	µg/L
Naphthalene	< 0.5	µg/L
n-Propylbenzene	< 0.5	µg/L
Styrene	< 0.5	µg/L
1,1,1,2-Tetrachloroethane	< 0.5	µg/L
1,1,2,2-Tetrachloroethane	< 0.5	µg/L
Tetrachloroethene	< 0.5	µg/L
Toluene	< 0.5	µg/L
1,2,3-Trichlorobenzene	< 0.5	µg/L
1,2,4-Trichlorobenzene	< 0.5	µg/L
1,1,1-Trichloroethane	< 0.5	µg/L
1,1,2-Trichloroethane	< 0.5	µg/L
Trichloroethene	< 0.5	µg/L
Trichlorofluoromethane	< 0.5	µg/L
1,2,3-Trichloropropane	< 0.5	µg/L
1,2,4-Trimethylbenzene	< 0.5	µg/L
1,3,5-Trimethylbenzene	< 0.5	µg/L
Vinyl Chloride	< 0.5	µg/L
Total Xylenes	< 1.	µg/L
1,2-Dichloroethane-d4	108.	%

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BOE-C6-0234650

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT
(Instrumental & Blank Parameters)
Method 8260

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1 - 99-02656-8, 99-02656-9TB

Constituents	Method Blank Readings	Units
Toluene-d8	97.	%
4-Bromofluorobenzene	89.	%

Quality Control Officer

Anthony Bonanno

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BOE-C6-0234651

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\1\DATA\MAR99\MAR04\04MAR30.D Vial: 31
Acq On : 5 Mar 1999 5:42 am Operator: M. CHAVEZ
Sample : CCV 11 Inst : MS-V4
isc : 25 UG/L; VO-9-3268 Multiplr: 1.00
S Integration Params: 82604.M

Method : C:\HPCHEM\1\METHODS\82604.M (RTE Integrator)
Title : EPA 8260\524.2
Last Update : Thu Feb 25 18:16:58 1999
Response via : Multiple Level Calibration

Min. RRF : 0.100 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	pentafluorobenzene	1.000	1.000	0.0	100	0.00
2		dichlorodifluoromethane	0.656	0.657	-0.1	100	0.00
3	P	chloromethane	0.531	0.587	-10.6	117	0.00
4	C	vinyl chloride	0.537	0.615	-14.6	117	0.00
5		bromomethane	0.449	0.396	11.7	90	0.00
6	M	chloroethane	0.362	0.423	-17.0	121	0.00
7		trichlorofluoromethane	0.912	0.930	-2.0	103	0.02
8		1,1,2-trichloro-1,2,2-trifl	0.953	1.043	-9.5	112	0.00
9	MC	1,1-dichloroethene	0.508	0.563	-10.9	114	0.00
10		methylene chloride	0.481	0.519	-8.0	114	0.02
11		MTBE	0.805	0.806	-0.1	105	0.02
12		trans-1,2-dichloroethene	0.560	0.629	-12.4	116	0.00
1[illegible]	P	1,1-dichloroethane	1.314	1.439	-9.5	113	0.00
[illegible]		2,2-dichloropropane	0.991	0.871	12.1	92	0.00
15		cis-1,2-dichloroethene	0.648	0.721	-11.2	116	0.02
16	C	chloroform	1.158	1.221	-5.5	108	0.00
17		bromochloromethane	0.294	0.300	-1.8	104	0.02
18		1,1,1-trichloroethane	1.073	1.112	-3.6	108	0.00
19		1,1-dichloropropene	0.994	1.085	-9.1	113	0.00
20		carbon tetrachloride	1.005	1.029	-2.4	103	0.00
21	S	1,2-dichloroethane-d4	0.398	0.379	4.7	98	0.02
22		1,2-dichloroethane	0.520	0.529	-1.7	103	0.00
23	M	benzene	1.917	2.117	-10.4	115	0.00
24	I	1,4-difluorobenzene	1.000	1.000	0.0	109	0.00
25	M	trichloroethene	0.370	0.405	-9.4	123	0.00
26	C	1,2-dichloropropane	0.358	0.365	-1.9	114	0.00
27	M	bromodichloromethane	0.470	0.452	3.8	105	0.00
28		dibromomethane	0.165	0.152	7.6	104	0.00
29		2-CEVE	0.103	0.095#	8.2	99	0.00
30		cis-1,3-dichloropropene	0.431	0.418	3.0	107	0.02
31	S	toluene-d8	0.905	0.862	4.8	104	0.00
32	MC	toluene	0.575	0.578	-0.5	114	0.02
33		trans-1,3-dichloropene	0.290	0.278	4.2	104	0.00
34		1,1,2-trichloroethane	0.154	0.152	1.7	111	0.00
35		1,3-dichloropropane	0.310	0.304	2.0	110	0.00
36		tetrachloroethene	0.405	0.414	-2.4	116	0.00
37		dibromochloromethane	0.291	0.281	3.4	104	0.00
[illegible]		1,2-dibromoethane	0.226	0.227	-0.3	111	0.00
39	I	chlorobenzene-d5	1.000	1.000	0.0	106	0.00

(#) = Out of Range

BOE-C6-0234652

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\1\DATA\MAR99\MAR04\04MAR30.D Vial: 31
Acq On : 5 Mar 1999 5:42 am Operator: M. CHAVEZ
Sample : CCV 11 Inst : MS-V4
Misc : 25 UG/L; VO-9-3268 Multiplr: 1.00
MS Integration Params: 82604.M

Method : C:\HPCHEM\1\METHODS\82604.M (RTE Integrator)
Title : EPA 8260\524.2
Last Update : Thu Feb 25 18:16:58 1999
Response via : Multiple Level Calibration

Min. RRF : 0.100 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
40	MP	chlorobenzene	2.807	2.890	-2.9	112	0.00
41		1,1,1,2-tetrachloroethane	1.304	1.319	-1.1	109	0.02
42	C	ethylbenzene	4.229	4.332	-2.4	114	0.00
43		m&p-xylene	1.666	1.673	-0.4	110	0.00
44		o-xylene	3.244	3.252	-0.2	110	0.00
45		styrene	2.392	2.445	-2.2	111	0.00
46	P	isopropylbenzene	4.574	4.582	-0.2	109	0.00
47	P	bromoform	0.618	0.625	-1.1	104	0.00
48	P	1,1,2,2-tetrachloroethane	0.805	0.709	11.8	93	0.00
49	S	4-bromofluorobenzene	1.881	1.815	3.5	102	0.00
50	P	1,2,3-trichloropropane	0.211	0.209	1.0	103	0.00
51		n-propylbenzene	4.869	5.073	-4.2	112	0.00
52		bromobenzene	1.114	1.118	-0.4	108	0.00
53		1,3,5-trimethylbenzene	3.216	3.245	-0.9	110	0.00
54		2-chlorotoluene	3.248	3.199	1.5	104	0.00
55		4-chlorotoluene	3.318	3.447	-3.9	115	0.00
56		tert-butylbenzene	3.672	3.714	-1.2	108	0.00
57		1,2,4-trimethylbenzene	3.115	3.180	-2.1	110	0.00
58		sec-butylbenzene	4.466	4.580	-2.6	109	0.00
59		4-isopropyltoluene	3.805	3.897	-2.4	109	0.00
60		1,3-dichlorobenzene	1.907	1.940	-1.7	108	0.00
61	M	1,4-dichlorobenzene	1.860	1.843	0.9	106	0.00
62		n-butylbenzene	3.113	3.279	-5.3	111	0.00
63		1,2-dichlorobenzene	1.539	1.550	-0.7	108	0.00
64		1,2-dibromo-3-chloropropane	0.121	0.118	2.2	98	0.00
65		1,2,4-trichlorobenzene	1.169	1.215	-4.0	106	0.00
66		hexachlorobutadiene	1.015	0.982	3.3	102	0.00
67		naphthalene	1.119	1.106	1.2	102	0.00
68		1,2,3-trichlorobenzene	0.884	0.933	-5.5	107	-0.02

(#) = Out of Range SPCC's out = 0 CCC's out = 0

BOE-C6-0234653

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\1\DATA\MAR99\MAR05\05MAR12.D Vial: 12
Acq On : 5 Mar 1999 5:28 pm Operator: S MAURER
Sample : CCV 12 Inst : MS-V4
c : 25 ML 25 UG\L V0-9-3272 Multiplr: 1.00
Integration Params: 82604.M

Method : C:\HPCHEM\1\METHODS\82604.M (RTE Integrator)
Title : EPA 8260\524.2
Last Update : Thu Feb 25 18:16:58 1999
Response via : Multiple Level Calibration

Min. RRF : 0.100 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	pentafluorobenzene	1.000	1.000	0.0	103	0.00
2		dichlorodifluoromethane	0.656	0.637	3.0	100	-0.01
3	P	chloromethane	0.531	0.580	-9.2	119	-0.01
4	C	vinyl chloride	0.537	0.609	-13.4	119	0.00
5		bromomethane	0.449	0.428	4.8	100	0.00
6	M	chloroethane	0.362	0.416	-15.0	123	0.00
7		trichlorofluoromethane	0.912	0.911	0.1	104	0.00
8		1,1,2-trichloro-1,2,2-trifl	0.953	1.053	-10.5	116	0.00
9	MC	1,1-dichloroethene	0.508	0.557	-9.7	116	-0.01
10		methylene chloride	0.481	0.570	-18.5	129	0.00
11		MTBE	0.805	0.905	-12.4	122	0.00
12		trans-1,2-dichloroethene	0.560	0.625	-11.5	119	-0.01
1[illegible]	MP	1,1-dichloroethane	1.314	1.433	-9.0	117	-0.01
[illegible]		2,2-dichloropropane	0.991	0.911	8.1	100	-0.02
1[illegible]		cis-1,2-dichloroethene	0.648	0.736	-13.4	122	0.00
16	C	chloroform	1.158	1.241	-7.2	114	-0.01
17		bromochloromethane	0.294	0.322	-9.4	115	0.00
18		1,1,1-trichloroethane	1.073	1.096	-2.1	109	-0.01
19		1,1-dichloropropene	0.994	1.072	-7.8	116	-0.02
20		carbon tetrachloride	1.005	1.019	-1.4	105	-0.01
21	S	1,2-dichloroethane-d4	0.398	0.399	-0.3	106	0.00
22		1,2-dichloroethane	0.520	0.555	-6.8	112	-0.02
23	M	benzene	1.917	2.145	-11.9	120	-0.01
24	I	1,4-difluorobenzene	1.000	1.000	0.0	112	-0.02
25	M	trichloroethene	0.370	0.405	-9.4	127	-0.02
26	C	1,2-dichloropropane	0.358	0.379	-5.6	122	-0.02
27	M	bromodichloromethane	0.470	0.476	-1.3	114	-0.03
28		dibromomethane	0.165	0.164	0.4	116	-0.03
29		2-CEVE	0.103	0.110	-6.8	118	-0.03
30		cis-1,3-dichloropropene	0.431	0.440	-2.1	116	-0.01
31	S	toluene-d8	0.905	0.870	3.9	108	-0.02
32	MC	toluene	0.575	0.578	-0.5	117	0.00
33		trans-1,3-dichloropene	0.290	0.301	-3.6	116	-0.01
34		1,1,2-trichloroethane	0.154	0.166	-7.3	125	-0.02
35		1,3-dichloropropane	0.310	0.329	-6.0	123	-0.02
36		tetrachloroethene	0.405	0.409	-1.1	117	-0.02
37		dibromochloromethane	0.291	0.306	-5.0	116	-0.01
[illegible]		1,2-dibromoethane	0.226	0.245	-8.4	123	-0.01
39	I	chlorobenzene-d5	1.000	1.000	0.0	108	0.00
40	MP	chlorobenzene	2.807	2.952	-5.1	117	0.00
41		1,1,1,2-tetrachloroethane	1.304	1.381	-5.9	117	0.01
42	C	ethylbenzene	4.229	4.248	-0.4	114	0.00
43		m&p-xylene	1.666	1.711	-2.7	116	0.00

44		o-xylene	3.244	3.321	-2.4	115	0.00
45		styrene	2.392	2.538	-6.1	118	-0.01
46	P	isopropylbenzene	4.574	4.639	-1.4	113	0.00
47	P	bromoform	0.618	0.701	-13.4	120	0.00
48	P	1,1,2,2-tetrachloroethane	0.805	0.845	-5.0	113	-0.01
49	S	4-bromofluorobenzene	1.881	1.899	-1.0	109	0.00
50	P	1,2,3-trichloropropane	0.211	0.244	-15.7	124	-0.01
51		n-propylbenzene	4.869	5.106	-4.9	115	0.00
52		bromobenzene	1.114	1.188	-6.7	118	0.00
53		1,3,5-trimethylbenzene	3.216	3.298	-2.5	114	0.00
54		2-chlorotoluene	3.248	3.331	-2.6	111	0.00
55		4-chlorotoluene	3.318	3.412	-2.8	117	0.00
56		tert-butylbenzene	3.672	3.781	-3.0	113	0.00
57		1,2,4-trimethylbenzene	3.115	3.260	-4.7	115	0.00
58		sec-butylbenzene	4.466	4.715	-5.6	114	-0.01
59		4-isopropyltoluene	3.805	3.942	-3.6	112	0.00
60		1,3-dichlorobenzene	1.907	2.044	-7.2	116	0.00
61	M	1,4-dichlorobenzene	1.860	1.954	-5.0	116	0.00
62		n-butylbenzene	3.113	3.292	-5.8	114	0.00
63		1,2-dichlorobenzene	1.539	1.675	-8.9	119	0.00
64		1,2-dibromo-3-chloropropane	0.121	0.138	-14.7	117	0.00
65		1,2,4-trichlorobenzene	1.169	1.321	-13.1	118	-0.01
66		hexachlorobutadiene	1.015	0.999	1.6	106	0.00
67		naphthalene	1.119	1.303	-16.4	123	0.00
68		1,2,3-trichlorobenzene	0.884	1.035	-17.0	121	-0.03

(#) = Out of Range SPCC's out = 0 CCC's out = 0
25FEB29.D 82604.M Fri Mar 05 17:56:17 1999

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\1\DATA\MAR99\MAR05\05MAR32.D Vial: 31
Acq On : 6 Mar 1999 5:44 am Operator: S MAURER
Sample : CCV 13 Inst : MS-V4
isc : 25 ML Multiplr: 1.00
S Integration Params: 82604.M

Method : C:\HPCHEM\1\METHODS\82604.M (RTE Integrator)
Title : EPA 8260\524.2
Last Update : Thu Feb 25 18:16:58 1999
Response via : Multiple Level Calibration

Min. RRF : 0.100 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	pentafluorobenzene	1.000	1.000	0.0	102	0.03
2		dichlorodifluoromethane	0.656	0.637	3.0	99	0.02
3	P	chloromethane	0.531	0.592	-11.5	120	0.02
4	C	vinyl chloride	0.537	0.632	-17.7	122	0.02
5		bromomethane	0.449	0.411	8.5	95	0.03
6	M	chloroethane	0.362	0.436	-20.5#	127	0.03
7		trichlorofluoromethane	0.912	0.934	-2.4	105	0.03
8		1,1,2-trichloro-1,2,2-trifl	0.953	1.072	-12.5	117	0.03
9	MC	1,1-dichloroethene	0.508	0.579	-14.1	119	0.02
10		methylene chloride	0.481	0.547	-13.9	122	0.03
11		MTBE	0.805	0.820	-1.8	109	0.03
12		trans-1,2-dichloroethene	0.560	0.647	-15.6	122	0.03
1[illegible]	MP	1,1-dichloroethane	1.314	1.477	-12.4	119	0.02
[illegible]		2,2-dichloropropane	0.991	0.883	10.9	95	0.02
1[illegible]		cis-1,2-dichloroethene	0.648	0.746	-15.0	122	0.03
16	C	chloroform	1.158	1.242	-7.3	112	0.03
17		bromochloromethane	0.294	0.307	-4.3	109	0.03
18		1,1,1-trichloroethane	1.073	1.127	-5.0	111	0.02
19		1,1-dichloropropene	0.994	1.110	-11.7	118	0.03
20		carbon tetrachloride	1.005	1.039	-3.4	106	0.03
21	S	1,2-dichloroethane-d4	0.398	0.394	1.0	103	0.05
22		1,2-dichloroethane	0.520	0.528	-1.5	105	0.03
23	M	benzene	1.917	2.189	-14.2	121	0.03
24	I	1,4-difluorobenzene	1.000	1.000	0.0	115	0.03
25	M	trichloroethene	0.370	0.395	-6.5	127	0.03
26	C	1,2-dichloropropane	0.358	0.362	-1.1	120	0.03
27	M	bromodichloromethane	0.470	0.439	6.7	109	0.03
28		dibromomethane	0.165	0.147	10.6	107	0.03
29		2-CEVE	0.103	0.092#	10.6	102	0.03
30		cis-1,3-dichloropropene	0.431	0.406	5.9	110	0.06
31	S	toluene-d8	0.905	0.836	7.6	107	0.04
32	MC	toluene	0.575	0.571	0.6	119	0.04
33		trans-1,3-dichloropene	0.290	0.271	6.8	108	0.03
34		1,1,2-trichloroethane	0.154	0.148	4.3	115	0.00
35		1,3-dichloropropane	0.310	0.298	4.1	114	0.00
36		tetrachloroethene	0.405	0.405	-0.1	120	0.00
37		dibromochloromethane	0.291	0.273	6.2	107	0.02
[illegible]		1,2-dibromoethane	0.226	0.218	3.4	113	0.00
39	I	chlorobenzene-d5	1.000	1.000	0.0	108	0.03

(#) = Out of Range

BOE-C6-0234656

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\1\DATA\MAR99\MAR05\05MAR32.D
Acq On : 6 Mar 1999 5:44 am
Sample : CCV 13
Misc : 25 ML
MS Integration Params: 82604.M

Vial: 31
Operator: S MAURER
Inst : MS-V4
Multiplr: 1.00

Method : C:\HPCHEM\1\METHODS\82604.M (RTE Integrator)
Title : EPA 8260\524.2
Last Update : Thu Feb 25 18:16:58 1999
Response via : Multiple Level Calibration

Min. RRF : 0.100 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
40	MP	chlorobenzene	2.807	2.933	-4.5	116	0.03
41		1,1,1,2-tetrachloroethane	1.304	1.326	-1.7	112	0.03
42	C	ethylbenzene	4.229	4.396	-3.9	118	0.03
43		m&p-xylene	1.666	1.702	-2.1	115	0.03
44		o-xylene	3.244	3.297	-1.6	114	0.02
45		styrene	2.392	2.472	-3.4	115	0.02
46	P	isopropylbenzene	4.574	4.650	-1.7	113	0.02
47	P	bromoform	0.618	0.627	-1.5	107	0.03
48	P	1,1,2,2-tetrachloroethane	0.805	0.720	10.6	96	0.00
49	S	4-bromofluorobenzene	1.881	1.866	0.8	107	0.00
50	P	1,2,3-trichloropropane	0.211	0.213	-0.8	107	0.00
51		n-propylbenzene	4.869	5.134	-5.4	116	0.02
52		bromobenzene	1.114	1.135	-1.9	112	0.02
53		1,3,5-trimethylbenzene	3.216	3.232	-0.5	112	0.02
54		2-chlorotoluene	3.248	3.358	-3.4	112	0.02
55		4-chlorotoluene	3.318	3.336	-0.6	114	0.03
56		tert-butylbenzene	3.672	3.754	-2.2	112	0.02
57		1,2,4-trimethylbenzene	3.115	3.175	-1.9	112	0.02
58		sec-butylbenzene	4.466	4.644	-4.0	112	0.00
59		4-isopropyltoluene	3.805	3.958	-4.0	113	0.00
60		1,3-dichlorobenzene	1.907	1.959	-2.7	111	0.02
61	M	1,4-dichlorobenzene	1.860	1.887	-1.5	111	0.02
62		n-butylbenzene	3.113	3.299	-6.0	114	0.02
63		1,2-dichlorobenzene	1.539	1.577	-2.5	112	0.00
64		1,2-dibromo-3-chloropropane	0.121	0.117	2.9	99	0.02
65		1,2,4-trichlorobenzene	1.169	1.215	-3.9	108	0.00
66		hexachlorobutadiene	1.015	0.998	1.7	106	0.02
67		naphthalene	1.119	1.109	0.9	104	0.03
68		1,2,3-trichlorobenzene	0.884	0.933	-5.5	109	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\1\DATA\MAR99\MAR05\05MAR41.D
Acq On : 6 Mar 1999 11:01 am
Sample : CCV 14
isc : 25 ML
IS Integration Params: 82604.M

Vial: 40
Operator: S MAURER
Inst : MS-V4
Multiplr: 1.00

Method : C:\HPCHEM\1\METHODS\82604.M (RTE Integrator)
Title : EPA 8260\524.2
Last Update : Thu Feb 25 18:16:58 1999
Response via : Multiple Level Calibration

Min. RRF : 0.100 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	pentafluorobenzene	1.000	1.000	0.0	105	0.00
2		dichlorodifluoromethane	0.656	0.567	13.6	91	0.00
3	P	chloromethane	0.531	0.536	-0.8	113	0.00
4	C	vinyl chloride	0.537	0.558	-3.9	112	0.00
5		bromomethane	0.449	0.383	14.7	92	0.00
6	M	chloroethane	0.362	0.387	-7.0	117	0.00
7		trichlorofluoromethane	0.912	0.835	8.4	97	0.01
8		1,1,2-trichloro-1,2,2-trifl	0.953	0.968	-1.6	109	0.00
9	MC	1,1-dichloroethene	0.508	0.510	-0.6	109	0.00
10		methylene chloride	0.481	0.521	-8.3	120	0.00
11		MTBE	0.805	0.845	-5.0	116	0.00
12		trans-1,2-dichloroethene	0.560	0.588	-5.0	114	0.00
[illegible]	MP	1,1-dichloroethane	1.314	1.346	-2.4	112	-0.01
		2,2-dichloropropane	0.991	0.726	26.7#	81	0.00
15		cis-1,2-dichloroethene	0.648	0.687	-6.0	116	0.01
16	C	chloroform	1.158	1.165	-0.6	109	0.00
17		bromochloromethane	0.294	0.298	-1.4	109	0.00
18		1,1,1-trichloroethane	1.073	1.017	5.2	104	0.00
19		1,1-dichloropropene	0.994	1.001	-0.7	110	0.00
20		carbon tetrachloride	1.005	0.938	6.7	99	0.00
21	S	1,2-dichloroethane-d4	0.398	0.391	1.9	106	0.02
22		1,2-dichloroethane	0.520	0.521	-0.2	107	-0.01
23	M	benzene	1.917	2.011	-4.9	115	0.00
24	I	1,4-difluorobenzene	1.000	1.000	0.0	112	0.00
25	M	trichloroethene	0.370	0.406	-9.5	127	-0.01
26	C	1,2-dichloropropane	0.358	0.361	-0.7	117	0.00
27	M	bromodichloromethane	0.470	0.449	4.5	108	-0.01
28		dibromomethane	0.165	0.158	4.2	112	-0.02
29		2-CEVE	0.103	0.099#	4.3	106	-0.02
30		cis-1,3-dichloropropene	0.431	0.405	6.0	107	0.00
31	S	toluene-d8	0.905	0.872	3.6	109	0.00
32	MC	toluene	0.575	0.550	4.4	112	0.01
33		trans-1,3-dichloropene	0.290	0.278	4.2	108	0.00
34		1,1,2-trichloroethane	0.154	0.158	-2.2	120	-0.01
35		1,3-dichloropropane	0.310	0.314	-1.2	118	0.00
36		tetrachloroethene	0.405	0.388	4.0	112	0.00
37		dibromochloromethane	0.291	0.287	1.2	110	0.00
		1,2-dibromoethane	0.226	0.232	-2.6	117	0.00
39	I	chlorobenzene-d5	1.000	1.000	0.0	109	0.01

(#) = Out of Range

BOE-C6-0234658

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\1\DATA\MAR99\MAR05\05MAR41.D
Acq On : 6 Mar 1999 11:01 am
Sample : CCV 14
Misc : 25 ML
MS Integration Params: 82604.M

Vial: 40
Operator: S MAURER
Inst : MS-V4
Multiplr: 1.00

Method : C:\HPCHEM\1\METHODS\82604.M (RTE Integrator)
Title : EPA 8260\524.2
Last Update : Thu Feb 25 18:16:58 1999
Response via : Multiple Level Calibration

Min. RRF : 0.100 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
40	MP	chlorobenzene	2.807	2.829	-0.8	113	0.00
41		1,1,1,2-tetrachloroethane	1.304	1.301	0.2	111	0.01
42	C	ethylbenzene	4.229	4.116	2.7	111	0.00
43		m&p-xylene	1.666	1.645	1.3	112	0.01
44		o-xylene	3.244	3.159	2.6	110	0.00
45		styrene	2.392	2.426	-1.4	113	0.00
46	P	isopropylbenzene	4.574	4.486	1.9	110	0.00
47	P	bromoform	0.618	0.658	-6.5	113	0.01
48	P	1,1,2,2-tetrachloroethane	0.805	0.713	11.3	96	0.00
49	S	4-bromofluorobenzene	1.881	1.896	-0.8	109	0.00
50	P	1,2,3-trichloropropane	0.211	0.227	-7.3	115	0.00
51		n-propylbenzene	4.869	4.865	0.1	110	0.00
52		bromobenzene	1.114	1.121	-0.6	112	0.00
53		1,3,5-trimethylbenzene	3.216	3.084	4.1	107	0.00
54		2-chlorotoluene	3.248	3.148	3.1	106	0.00
55		4-chlorotoluene	3.318	3.284	1.0	113	0.01
56		tert-butylbenzene	3.672	3.584	2.4	107	0.00
57		1,2,4-trimethylbenzene	3.115	3.071	1.4	109	0.00
58		sec-butylbenzene	4.466	4.485	-0.4	109	0.00
59		4-isopropyltoluene	3.805	3.752	1.4	108	0.00
60		1,3-dichlorobenzene	1.907	1.914	-0.4	109	0.00
61	M	1,4-dichlorobenzene	1.860	1.874	-0.7	111	0.01
62		n-butylbenzene	3.113	3.100	0.4	108	0.00
63		1,2-dichlorobenzene	1.539	1.581	-2.7	113	0.00
64		1,2-dibromo-3-chloropropane	0.121	0.128	-6.1	109	0.00
65		1,2,4-trichlorobenzene	1.169	1.253	-7.2	112	0.00
66		hexachlorobutadiene	1.015	0.952	6.2	102	0.00
67		naphthalene	1.119	1.207	-7.8	114	0.01
68		1,2,3-trichlorobenzene	0.884	0.969	-9.6	114	-0.01

(#) = Out of Range SPCC's out = 0 CCC's out = 0

BOE-C6-0234659

Response Factor Report MS-V4

Method : C:\HPCHEM\1\METHODS\82604.M (RTE Integrator)
Title : EPA 8260\524.2
t Update : Thu Feb 25 18:16:58 1999
ponse via : Initial Calibration

Calibration Files
1 =25FEB27.D 2 =25FEB28.D 3 =25FEB29.D
4 =25FEB30.D 5 =25FEB31.D

		Compound	1	2	3	4	5	Avg	%RSD
1)	I	pentafluorobenzene	----------ISTD----------						
2)		dichlorodifluorometha	0.693	0.692	0.655	0.665	0.577	0.656	7.22
3)	P	chloromethane	0.610	0.543	0.500	0.510	0.492	0.531	9.08
4)	C	vinyl chloride	0.591	0.569	0.527	0.530	0.467	0.537	8.83
5)		bromomethane	0.463	0.478	0.440	0.450	0.415	0.449	5.32
6)	M	chloroethane	0.399	0.381	0.349	0.351	0.330	0.362	7.65
7)		trichlorofluoromethan	1.002	0.965	0.906	0.910	0.775	0.912	9.46
8)		1,1,2-trichloro-1,2,2	1.063	1.007	0.933	0.951	0.811	0.953	9.92
9)	MC	1,1-dichloroethene	0.551	0.528	0.495	0.508	0.456	0.508	7.02
10)		methylene chloride	0.551	0.495	0.456	0.463	0.439	0.481	9.17
11)		MTBE	0.931	0.828	0.766	0.774	0.728	0.805	9.80
12)		trans-1,2-dichloroeth	0.600	0.576	0.542	0.558	0.523	0.560	5.30
13)	MP	1,1-dichloroethane	1.477	1.360	1.267	1.276	1.192	1.314	8.28
14)		2,2-dichloropropane	1.148	1.025	0.943	0.958	0.879	0.991	10.33
15)		cis-1,2-dichloroethen	0.704	0.662	0.622	0.644	0.609	0.648	5.77
16)	C	chloroform	1.234	1,200	1.125	1.152	1.077	1.158	5.32
[illegible]		bromochloromethane	0.313	0.309	0.287	0.290	0.271	0.294	5.88
1[illegible]		1,1,1-trichloroethane	1.195	1.111	1.032	1.060	0.968	1.073	7.99
19)		1,1-dichloropropene	1.132	1.027	0.955	0.976	0.882	0.994	9.37
20)		carbon tetrachloride	1.047	1.048	0.997	1.020	0.912	1.005	5.58
21)	S	1,2-dichloroethane-d4	0.434	0.411	0.388	0.383	0.375	0.398	6.02
22)		1,2-dichloroethane	0.554	0.546	0.511	0.514	0.475	0.520	6.03
23)	M	benzene	2.135	1.951	1.842	1.885	1.772	1.917	7.21
24)	I	1,4-difluorobenzene	----------ISTD----------						
25)	M	trichloroethene	0.421	0.384	0.358	0.356	0.333	0.370	9.08
26)	C	1,2-dichloropropane	0.398	0.376	0.347	0.344	0.326	0.358	8.02
27)	M	bromodichloromethane	0.491	0.493	0.466	0.467	0.435	0.470	5.04
28)		dibromomethane	0.187	0.171	0.158	0.158	0.149	0.165	8.99
29)		2-CEVE	0.099	0.105	0.104	0.106	0.101	0.103	2.83
30)		cis-1,3-dichloroprope	0.459	0.451	0.424	0.424	0.400	0.431	5.47
31)	S	toluene-d8	0.909	0.909	0.900	0.903	0.905	0.905	0.43
32)	MC	toluene	0.641	0.588	0.551	0.558	0.537	0.575	7.20
33)		trans-1,3-dichloropen	0.292	0.305	0.289	0.291	0.275	0.290	3.70
34)		1,1,2-trichloroethane	0.179	0.161	0.148	0.147	0.137	0.154	10.50
35)		1,3-dichloropropane	0.356	0.324	0.299	0.296	0.277	0.310	9.74
36)		tetrachloroethene	0.462	0.419	0.389	0.392	0.361	0.404	9.42
37)		dibromochloromethane	0.284	0.306	0.294	0.295	0.276	0.291	3.93
38)		1,2-dibromoethane	0.244	0.239	0.222	0.221	0.205	0.226	6.95
39)	I	chlorobenzene-d5	----------ISTD----------						
4[illegible]	MP	chlorobenzene	3.060	2.883	2.719	2.799	2.574	2.807	6.47
4[illegible]		1,1,1,2-tetrachloroet	1.333	1.336	1.274	1.334	1.243	1.304	3.32
42)	C	ethylbenzene	4.893	4.369	4.024	4.144	3.716	4.229	10.40
43)		m&p-xylene	1.839	1.657	1.599	1.691	1.545	1.666	6.68
44)		o-xylene	3.662	3.363	3.109	3.187	2.899	3.244	8.85
45)		styrene	2.556	2.438	2.324	2.414	2.227	2.392	5.18
46)	P	isopropylbenzene	5.144	4.749	4.430	4.534	4.015	4.574	9.09
47)	P	bromoform	0.551	0.625	0.632	0.664	0.619	0.618	6.68

48)	P	1,1,2,2-tetrachloroet	0.848	0.855	0.808	0.801	0.711	0.805	7.12
49)	S	4-bromofluorobenzene	1.853	1.870	1.884	1.933	1.867	1.881	1.65
50)	P	1,2,3-trichloropropan	0.205	0.222	0.214	0.219	0.196	0.211	4.98
51)		n-propylbenzene	5.272	5.088	4.786	4.904	4.296	4.869	7.59
52)		bromobenzene	1.227	1.141	1.091	1.110	1.001	1.114	7.34
53)		1,3,5-trimethylbenzen	3.687	3.354	3.125	3.147	2.767	3.216	10.49
54)		2-chlorotoluene	3.712	3.316	3.240	3.058	2.917	3.248	9.31
55)		4-chlorotoluene	3.649	3.477	3.164	3.452	2.847	3.318	9.50
56)		tert-butylbenzene	4.016	3.833	3.625	3.688	3.198	3.672	8.30
57)		1,2,4-trimethylbenzen	3.522	3.246	3.055	3.064	2.689	3.115	9.77
58)		sec-butylbenzene	4.770	4.667	4.455	4.556	3.879	4.466	7.81
59)		4-isopropyltoluene	4.064	4.010	3.790	3.840	3.322	3.805	7.70
60)		1,3-dichlorobenzene	2.092	1.978	1.899	1.907	1.659	1.907	8.32
61)	M	1,4-dichlorobenzene	2.087	1.950	1.827	1.838	1.598	1.860	9.69
62)		n-butylbenzene	3.279	3.309	3.118	3.163	2.693	3.113	7.95
63)		1,2-dichlorobenzene	1.679	1.649	1.522	1.523	1.322	1.539	9.16
64)		1,2-dibromo-3-chlorop	0.101	0.124	0.128	0.131	0.119	0.121	9.97
65)		1,2,4-trichlorobenzen	1.065	1.257	1.213	1.224	1.085	1.169	7.47
66)		hexachlorobutadiene	1.059	1.054	1.016	1.061	0.887	1.015	7.29
67)		naphthalene	1.042	1.199	1.150	1.162	1.044	1.119	6.43
68)		1,2,3-trichlorobenzen	0.787	0.950	0.921	0.939	0.824	0.884	8.32

(#) = Out of Range

82604.M Fri Feb 26 15:42:03 1999

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\1\DATA\FEB99\FEB25\25FEB33.D Vial: 33
Acq On : 26 Feb 1999 5:21 am Operator: M. CHAVEZ
Sample : 524.2/8260 ICV A Inst : MS-V4
Misc : 25 ML;25 UG/L; VO-8-3219 Multiplr: 1.00
Integration Params: 82604.M

Method : C:\HPCHEM\1\METHODS\82604.M (RTE Integrator)
Title : EPA 8260\524.2
Last Update : Thu Feb 25 18:16:58 1999
Response via : Multiple Level Calibration

Min. RRF : 0.100 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 20% Max. Rel. Area : 150%

		Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1	I	pentafluorobenzene	1.000	1.000	0.0	100	0.00
2		dichlorodifluoromethane	0.656	0.598	8.8	91	0.00
3	P	chloromethane	0.531	0.502	5.5	100	0.00
4	C	vinyl chloride	0.537	0.552	-2.8	104	0.00
5		bromomethane	0.449	0.445	0.9	101	0.00
6	M	chloroethane	0.362	0.361	0.3	103	0.00
7		trichlorofluoromethane	0.912	1.008	-10.5	111	0.00
8		1,1,2-trichloro-1,2,2-trifl	0.953	0.996	-4.5	106	0.00
9	MC	1,1-dichloroethene	0.508	0.533	-4.9	107	0.00
10		methylene chloride	0.481	0.478	0.6	104	0.00
11		MTBE	0.805	0.780	3.1	101	0.00
12		trans-1,2-dichloroethene	0.560	0.640	-14.3	118	0.00
[illegible]	P	1,1-dichloroethane	1.314	1.322	-0.6	104	0.00
[illegible]		2,2-dichloropropane	0.991	0.950	4.1	100	0.00
15		cis-1,2-dichloroethene	0.648	0.626	3.4	100	0.02
16	C	chloroform	1.158	1.173	-1.3	104	0.00
17		bromochloromethane	0.294	0.300	-2.0	104	0.02
18		1,1,1-trichloroethane	1.073	1.085	-1.1	105	0.00
19		1,1-dichloropropene	0.994	1.026	-3.2	107	0.00
20		carbon tetrachloride	1.005	1.039	-3.4	104	0.01
21	S	1,2-dichloroethane-d4	0.398	0.382	4.0	98	0.00
22		1,2-dichloroethane	0.520	0.517	0.6	101	0.00
23	M	benzene	1.917	2.005	-4.6	108	0.00
24	I	1,4-difluorobenzene	1.000	1.000	0.0	102	0.00
25	M	trichloroethene	0.370	0.381	-3.0	109	0.00
26	C	1,2-dichloropropane	0.358	0.350	2.2	103	0.00
27	M	bromodichloromethane	0.470	0.463	1.5	101	0.00
28		dibromomethane	0.165	0.157	4.8	101	0.00
29		2-CEVE	0.103	0.096	6.8	94	0.00
30		cis-1,3-dichloropropene	0.431	0.415	3.7	100	0.02
31	S	toluene-d8	0.905	0.893	1.3	101	0.02
32	MC	toluene	0.575	0.592	-3.0	109	0.03
33		trans-1,3-dichloropene	0.290	0.284	2.1	100	0.00
34		1,1,2-trichloroethane	0.154	0.148	3.9	102	-0.01
35		1,3-dichloropropane	0.310	0.298	3.9	101	0.00
36		tetrachloroethene	0.404	0.409	-1.2	107	0.00
37		dibromochloromethane	0.291	0.297	-2.1	103	0.00
38		1,2-dibromoethane	0.226	0.222	1.8	102	0.00
39	I	chlorobenzene-d5	1.000	1.000	0.0	97	0.01
40	MP	chlorobenzene	2.807	2.972	-5.9	106	0.00
41		1,1,1,2-tetrachloroethane	1.304	1.354	-3.8	103	0.00
42	C	ethylbenzene	4.229	4.495	-6.3	108	0.00
43		m&p-xylene	1.666	1.763	-5.8	107	0.00

44		o-xylene	3.244	3.381	-4.2	105	0.00
45		styrene	2.392	2.525	-5.6	105	0.00
46	P	isopropylbenzene	4.574	4.813	-5.2	105	0.00
47	P	bromoform	0.618	0.643	-4.0	99	0.00
48	P	1,1,2,2-tetrachloroethane	0.805	0.786	2.4	94	0.00
49	S	4-bromofluorobenzene	1.881	1.924	-2.3	99	0.00
50	P	1,2,3-trichloropropane	0.211	0.215	-1.9	97	0.00
51		n-propylbenzene	4.869	5.248	-7.8	106	0.00
52		bromobenzene	1.114	1.186	-6.5	105	0.00
53		1,3,5-trimethylbenzene	3.216	3.381	-5.1	105	0.00
54		2-chlorotoluene	3.248	3.493	-7.5	104	0.00
55		4-chlorotoluene	3.318	3.465	-4.4	106	0.00
56		tert-butylbenzene	3.672	3.947	-7.5	105	0.00
57		1,2,4-trimethylbenzene	3.115	3.287	-5.5	104	0.00
58		sec-butylbenzene	4.466	4.797	-7.4	104	0.00
59		4-isopropyltoluene	3.805	4.132	-8.6	106	0.00
60		1,3-dichlorobenzene	1.907	2.011	-5.5	103	0.00
61	M	1,4-dichlorobenzene	1.860	1.941	-4.4	103	0.01
62		n-butylbenzene	3.113	3.414	-9.7	106	0.00
63		1,2-dichlorobenzene	1.539	1.613	-4.8	103	0.00
64		1,2-dibromo-3-chloropropane	0.121	0.126	-4.1	96	0.00
65		1,2,4-trichlorobenzene	1.169	1.269	-8.6	101	-0.01
66		hexachlorobutadiene	1.015	1.093	-7.7	104	0.00
67		naphthalene	1.119	1.175	-5.0	99	0.00
68		1,2,3-trichlorobenzene	0.884	0.971	-9.8	102	-0.02

(#) = Out of Range SPCC's out = 0 CCC's out = 0
25FEB29.D 82604.M Fri Feb 26 15:46:35 1999

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT
(Precision & Accuracy)
Method 8260

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1 - 99-02656-8, 99-02656-9TB

Constituents	QC Sample ID	Sample Result	MS Result	MSD Result	MS Spike Level	MSD Spike Level	Units	Spike R.P.D.	Precision Control Limits	MS % Rec	MSD % Rec	Accuracy Control Limits
Benzene	2656-2	< 0.5	26.04	28.38	25.00	25.00	µg/L	9.	20	104.	113.	80 - 120
Bromodichloromethane	2656-2	< 0.5	17.58	19.10	25.00	25.00	µg/L	8.	20	70.	76.	80 - 120
Chlorobenzene	2656-2	< 0.5	24.70	26.01	25.00	25.00	µg/L	5.	20	99.	104.	80 - 120
Chloroethane	2656-2	< 0.5	27.53	29.89	25.00	25.00	µg/L	8.	20	110.	120.	80 - 120
1,4-Dichlorobenzene	2656-2	< 0.5	24.02	25.31	25.00	25.00	µg/L	5.	20	96.	101.	80 - 120
1,1-Dichloroethane	2656-2	< 0.5	25.57	27.70	25.00	25.00	µg/L	8.	20	102.	111.	80 - 120
1,1-Dichloroethene	2656-2	< 0.5	26.67	28.94	25.00	25.00	µg/L	8.	20	107.	116.	80 - 120
Toluene	2656-2	< 0.5	24.08	25.69	25.00	25.00	µg/L	6.	20	96.	103.	80 - 120
Trichloroethene	2656-2	< 0.5	24.68	26.14	25.00	25.00	µg/L	6.	20	99.	105.	80 - 120
1,2-Dichloroethane-d4	MS/MSD									96.	99.	76 - 114
Toluene-d8	MS/MSD									96.	97.	88 - 110
4-Bromofluorobenzene	MS/MSD									99.	98.	86 - 115

MS = Matrix Spike; MSD = Matrix Spike Duplicate; RPD = Relative Percent Difference

Quality Control Officer

Anthony Bonanno

4100 Atlas Ct. · Bakersfield, CA 93 · (661) 327-4911 · FAX (661) 327-1918

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT
(Laboratory Control Sample)
Method 8260

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1 - 99-02656-8, 99-02656-9TB

Constituents	QC Sample ID	Sample Result	Spike Level	Units	% Rec	Accuracy Control Limits
Benzene	LCSW	27.61	25.00	µg/L	110.	80 - 120
Bromodichloromethane	LCSW	24.04	25.00	µg/L	96.	80 - 120
Chlorobenzene	LCSW	25.74	25.00	µg/L	103.	80 - 120
Chloroethane	LCSW	29.21	25.00	µg/L	117.	80 - 120
1,4-Dichlorobenzene	LCSW	24.77	25.00	µg/L	99.	80 - 120
1,1-Dichloroethane	LCSW	27.38	25.00	µg/L	109.	80 - 120
1,1-Dichloroethene	LCSW	27.71	25.00	µg/L	111.	80 - 120
Toluene	LCSW	25.13	25.00	µg/L	100.	80 - 120
Trichloroethene	LCSW	27.36	25.00	µg/L	109.	80 - 120
1,2-Dichloroethane-d4	LCSW				95.	76 - 114
Toluene-d8	LCSW				95.	88 - 110
4-Bromofluorobenzene	LCSW				96.	86 - 115

Quality Control Officer

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BOE-C6-0234665

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT
(Preparation & Analysis Information)
METHOD 8015M TPH FUEL FINGERPRINT

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	Preparation Method	Preparation Date	Preparation Technician	Analytical Method	Run Date	Analyst
Stoddard / White Spirits	3510	03/05/99	YMP	8015M	03/07/99	DS
JP 4	3510	03/05/99	YMP	8015M	03/07/99	DS
JP 5	3510	03/05/99	YMP	8015M	03/07/99	DS
JP 6	3510	03/05/99	YMP	8015M	03/07/99	DS
JP 8	3510	03/05/99	YMP	8015M	03/07/99	DS
Kerosene / Jet Fuel	3510	03/05/99	YMP	8015M	03/07/99	DS
Diesel	3510	03/05/99	YMP	8015M	03/07/99	DS
Crude Oil	3510	03/05/99	YMP	8015M	03/07/99	DS
Hydraulic Oil	3510	03/05/99	YMP	8015M	03/07/99	DS
Waste Oil	3510	03/05/99	YMP	8015M	03/07/99	DS
Motor Oil	3510	03/05/99	YMP	8015M	03/07/99	DS

Quality Control Officer

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BOE-C6-0234666

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT
(Instrumental & Blank Parameters)
METHOD 8015M TPH FUEL FINGERPRINT

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	Method Blank Readings	Units
Stoddard / White Spirits	<200.	µg/L
JP 4	<1000.	µg/L
JP 5	<1000.	µg/L
JP 6	<1000.	µg/L
JP 8	<200.	µg/L
Kerosene / Jet Fuel	<200.	µg/L
Diesel	<200.	µg/L
Crude Oil	<1000.	µg/L
Hydraulic Oil	<1000.	µg/L
Waste Oil	<1000.	µg/L
Motor Oil	<1000.	µg/L
Surrogate % Recovery	36.	%

Quality Control Officer

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BOE-C6-0234667

Response Factor Report GC-13

Method : C:\HPCHEM\1\METHODS\8015FFP.M (Chemstation Integrator)
Title : 8015 TPH Diesel GC-13
Last Update : Fri Dec 11 10:45:37 1998

Calibration Files
1 =16DEC10.D 2 =16DEC09.D 3 =16DEC11.D
4 =16DEC07.D 5 =16DEC06.D

	Compound	1	2	3	4	5	Avg	%RSD
*1)	AHM DIESEL	1.094	0.973	0.979	0.992	1.004	1.008 E7	4.87
2)	BH CRUDE/WASTE OIL	4.552	4.611	4.320	4.260	4.034	4.355 E6	5.35
3)	DH MOTOR /HYDRAULIC OIL	9.367	9.562	9.401	9.738	9.987	9.611 E6	2.67
4)	EH KEROSENE	9.938	8.886	8.870	8.989	8.540	9.045 E6	5.83
5)	FH GASOLINE	7.478	7.018	6.744	6.797	6.557	6.919 E6	5.10
6)	JH STODDARD/ MINERAL SPI	2.812	3.483	3.371	3.582	3.431	3.336 E6	9.08
*7)	AS TETRACOSANE (SURR)	0.968	1.010	0.958	1.043	1.023	1.000 E7	3.65

(#) = Out of Range

8015FFP.M Thu Dec 17 08:18:21 1998 DSLGC12

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\DATA\GC13\DEC98\DEC16\16DEC12.D Vial: 12
Acq On : 16 Dec 1998 5:30 pm Operator: SPB
Sample : DIESEL ICV EX-8-0145 Inst : GC-13
Misc : MIX [A] Multiplr: 1.00
IntFile : AUTOINT1.E

Method : C:\HPCHEM\1\METHODS\8015FFP.M (Chemstation Integrator)
Title : 8015 TPH Diesel GC-13
Last Update : Fri Dec 11 10:45:37 1998
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 15% Max. Rel. Area : 150%

Compound	AvgRF	CCRF	%Dev	Area%	Dev(Min)
1 AHM DIESEL	10.084	9.926 E6	1.6	101	0.00
7 AS TETRACOSANE (SURR)	10.004	10.055 E6	-0.5	105	0.00

(#) = Out of Range
16DEC11.D 8015FFP.M Thu Dec 17 08:25:19 1998 DSLGC12

Response Factor Report GC-13

Method : C:\HPCHEM\1\METHODS\8015FFP.M (Chemstation Integrator)
Title : 8015 TPH Diesel GC-13
Last Update : Fri Dec 11 10:45:37 1998

Calibration Files
1 =16DEC18.D 2 =16DEC17.D 3 =16DEC16.D
4 =16DEC15.D 5 =16DEC14.D

	Compound	1	2	3	4	5	Avg	%RSD
1)	AHM DIESEL	1.094	0.973	0.979	0.992	1.004	1.008 E7	4.87
*2)	BH CRUDE/WASTE OIL	5.483	5.596	6.077	6.048	5.841	5.809 E6	4.57
3)	DH MOTOR /HYDRAULIC OIL	9.367	9.562	9.401	9.738	9.987	9.611 E6	2.67
4)	EH KEROSENE	9.938	8.886	8.870	8.989	8.540	9.045 E6	5.83
5)	FH GASOLINE	7.478	7.018	6.744	6.797	6.557	6.919 E6	5.10
6)	JH STODDARD/ MINERAL SPI	2.812	3.483	3.371	3.582	3.431	3.336 E6	9.08
7)	AS TETRACOSANE (SURR)	0.968	1.010	0.958	1.043	1.023	1.000 E7	3.65

(#) = Out of Range

8015FFP.M Thu Dec 17 08:35:30 1998 DSLGC12

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\DATA\GC13\DEC98\DEC16\16DEC20.D Vial: 20
Acq On : 16 Dec 1998 11:33 pm Operator: SPB
Sample : CRUDE ICV EX-8-0052 Inst : GC-13
Misc : MIX [B] Multiplr: 1.00
IntFile : AUTOINT1.E

Method : C:\HPCHEM\1\METHODS\8015FFP.M (Chemstation Integrator)
Title : 8015 TPH Diesel GC-13
Last Update : Fri Dec 11 10:45:37 1998
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 15% Max. Rel. Area : 150%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(Min)
2 BH	CRUDE/WASTE OIL	5.809	5.527 E6	4.9	91	0.00

(#) = Out of Range
16DEC16.D 8015FFP.M Thu Dec 17 08:40:28 1998 DSLGC12

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\DATA\GC13\MAR99\MAR05\05MAR02.D Vial: 2
Acq On : 5 Mar 1999 8:00 pm Operator: EDW
mple : DIESEL CCV #88 Inst : GC-13
sc : MIX [A] Multiplr: 1.00
IntFile : SURR.E

Method : C:\HPCHEM\1\METHODS\8015FFP.M (Chemstation Integrator)
Title : 8015 TPH Diesel GC-13
Last Update : Tue Feb 16 11:36:50 1999
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 15% Max. Rel. Area : 150%

Compound	AvgRF	CCRF	%Dev	Area%	Dev(Min)
1 AHM DIESEL	10.084	9.912 E6	1.7	101	0.00
8 AS TETRACOSANE (SURR)	10.004	10.852 E6	-8.5	113	-0.02

(#) = Out of Range SPCC's out = 0 CCC's out = 0
28DEC14.D 8015FFP.M Fri Mar 05 21:43:46 1999 RPT1

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\DATA\GC13\MAR99\MAR05\05MAR03.D Vial: 3
Acq On : 5 Mar 1999 8:47 pm Operator: EDW
Sample : CRUDE CCV#52 Inst : GC-13
Misc : MIX [A] Multiplr: 1.00
IntFile : SURR.E

Method : C:\HPCHEM\1\METHODS\8015FFP.M (Chemstation Integrator)
Title : 8015 TPH Diesel GC-13
Last Update : Tue Feb 16 11:36:50 1999
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 15% Max. Rel. Area : 150%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(Min)
2 BH	CRUDE/WASTE OIL	5.809	5.867 E6	-1.0	97	0.00

(#) = Out of Range SPCC's out = 0 CCC's out = 0
28DEC14.D 8015FFP.M Fri Mar 05 21:45:38 1999 RPT1

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\DATA\GC13\MAR99\MAR05\05MAR17.D Vial: 17
Acq On : 7 Mar 1999 12:55 pm Operator: EDW
Sample : DIESEL CCV #89 Inst : GC-13
Misc : Multiplr: 1.00
MultFile : SURR.E

Method : C:\HPCHEM\1\METHODS\8015FFP.M (Chemstation Integrator)
Title : 8015 TPH Diesel GC-13
Last Update : Tue Feb 16 11:36:50 1999
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 15% Max. Rel. Area : 150%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(Min)
1	AHM DIESEL	10.084	10.323 E6	-2.4	105	0.00
8	AS TETRACOSANE (SURR)	10.004	11.003 E6	-10.0	115	-0.03

(#) = Out of Range
28DEC14.D 8015FFP.M Wed Mar 10 09:49:53 1999 RPT1

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\DATA\GC13\MAR99\MAR05\05MAR18.D Vial: 18
Acq On : 7 Mar 1999 1:41 pm Operator: EDW
Sample : CRUDE CCV #53 Inst : GC-13
Misc : Multiplr: 1.00
IntFile : SURR.E

Method : C:\HPCHEM\1\METHODS\8015FFP.M (Chemstation Integrator)
Title : 8015 TPH Diesel GC-13
Last Update : Tue Feb 16 11:36:50 1999
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 15% Max. Rel. Area : 150%

Compound	AvgRF	CCRF	%Dev	Area%	Dev(Min)
2 BH CRUDE/WASTE OIL	5.809	6.648 E6	-14.4	109	0.00

(#) = Out of Range
28DEC14.D 8015FFP.M Wed Mar 10 09:52:04 1999 RPT1

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\DATA\GC13\MAR99\MAR05\05MAR28.D Vial: 28
Acq On : 7 Mar 1999 9:26 pm Operator: EDW
Sample : DIESEL CCV #90 Inst : GC-13
Misc : Multiplr: 1.00
ALSFile : SURR.E

Method : C:\HPCHEM\1\METHODS\8015FFP.M (Chemstation Integrator)
Title : 8015 TPH Diesel GC-13
Last Update : Tue Feb 16 11:36:50 1999
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 15% Max. Rel. Area : 150%

Compound	AvgRF	CCRF	%Dev	Area%	Dev(Min)
1 AHM DIESEL	10.084	9.910 E6	1.7	101	0.00
8 AS TETRACOSANE (SURR)	10.004	10.766 E6	-7.6	112	-0.01

(#) = Out of Range
28DEC14.D 8015FFP.M Wed Mar 10 10:34:28 1999 RPT1

Evaluate Continuing Calibration Report

Data File : C:\HPCHEM\DATA\GC13\MAR99\MAR05\05MAR29.D Vial: 29
Acq On : 7 Mar 1999 10:12 pm Operator: EDW
Sample : CRUDE CCV #54 Inst : GC-13
Misc : Multiplr: 1.00
IntFile : SURR.E

Method : C:\HPCHEM\1\METHODS\8015FFP.M (Chemstation Integrator)
Title : 8015 TPH Diesel GC-13
Last Update : Tue Feb 16 11:36:50 1999
Response via : Multiple Level Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
Max. RRF Dev : 15% Max. Rel. Area : 150%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(Min)
2 BH	CRUDE/WASTE OIL	5.809	6.277 E6	-8.1	103	0.00

(#) = Out of Range
28DEC14.D 8015FFP.M Wed Mar 10 10:36:24 1999 RPT1

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT
(Precision & Accuracy)
METHOD 8015M TPH FUEL FINGERPRINT

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	QC Sample ID	Sample Result	MS Result	MSD Result	MS Spike Level	MSD Spike Level	Units	Spike R.P.D.	Precision Control Limits	MS % Rec	MSD % Rec	Accuracy Control Limits
Diesel	DI 3/5	<200.	2220.	2175.	2500.	2500.	µg/L	2.	30	89.	87.	47 - 129
Surrogate % Recovery	MS/MSD									44.	36.	32 - 143

MS = Matrix Spike; MSD = Matrix Spike Duplicate; RPD = Relative Percent Difference

Quality Control Officer

Anthony Bonanno

4100 Atlas Ct. · Bakersfield, CA 93308 · (661) 327-4911 · FAX (661) 327-1918

BOE-C6-0234678

BC LABORATORIES

B C LABORATORIES
QUALITY CONTROL REPORT
(Laboratory Control Sample)
METHOD 8015M TPH FUEL FINGERPRINT

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 04/15/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	QC Sample ID	Sample Result	Spike Level	Units	% Rec	Accuracy Control Limits
Diesel	LCSW	2165.	2500.	µg/L	87.	55 - 128
Surrogate % Recovery	LCSW				47.	32 - 143

Quality Control Officer

Anthony Bonanno

4100 Atlas Ct. · Bakersfield, CA 93308 (661) 327-4911 · FAX (661) 327-1918

BOE-C6-0234679

BC Laboratories, Inc

B C LABORATORIES
QUALITY CONTROL REPORT
(Instrumental & Blank Parameters)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 05/19/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-6

Constituents	Method Blank Readings	Units
Total Aluminum	<50.	µg/L
Total Antimony	<100.	µg/L
Total Arsenic	< 2.	µg/L
Total Barium	<10.	µg/L
Total Beryllium	<10.	µg/L
Total Cadmium	< 5.0	µg/L
Total Chromium	<10.	µg/L
Total Cobalt	<10.	µg/L
Total Copper	<10.	µg/L
Total Iron	<50.	µg/L
Total Lead	< 5.	µg/L
Total Mercury	< 0.2	µg/L
Total Molybdenum	<10.	µg/L
Total Nickel	<50.	µg/L
Total Selenium	< 2.	µg/L
Total Silver	<10.	µg/L
Total Titanium	<10.	µg/L
Total Thallium	< 5.0	µg/L
Total Vanadium	<10.	µg/L
Total Zinc	<50.	µg/L

Quality Control Officer

for Anthony Bonanno

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BC Laboratories, Inc

B C LABORATORIES
QUALITY CONTROL REPORT
(Precision & Accuracy)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 05/19/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-6

Constituents	QC Sample ID	Sample Result	Sample Duplicate	MS Result	MSD Result	MS Spike Level	MSD Spike Level	Units	Sample R.P.D.	Spike R.P.D.	Precision Control Limits	MS % Rec	MSD % Rec	Accuracy Control Limits
Total Aluminum	TOTAL-2656-6	3100.		14400.	13820.	10000.	10000.	µg/L		4.	20	113.	107.	75 - 125
Total Antimony	TOTAL-2656-6	<100.		108.	102.	100.	100.	µg/L		6.	20	108.	102.	75 - 125
Total Arsenic	DISS-2656-4	< 2.	< 2.	20.38	20.42	20.00	20.00	µg/L	<PQL	0.	20	97.	97.	80 - 120
Total Barium	TOTAL-2656-6	190.		1186.	1178.	1000.	1000.	µg/L		1.	20	100.	99.	75 - 125
Total Beryllium	TOTAL-2656-6	<100.		108.	106.	100.	100.	µg/L		2.	20	108.	106.	75 - 125
Total Cadmium	TOTAL-2656-6	< 5.		99.	100.	100.	100.	µg/L		1.	20	99.	100.	75 - 125
Total Chromium	TOTAL-2656-6	32.		986.	970.	1000.	1000.	µg/L		2.	20	95.	94.	75 - 125
Total Cobalt	TOTAL-2656-6	53.		156.	155.	100.	100.	µg/L		1.	20	103.	102.	75 - 125
Total Copper	TOTAL-2656-6	< 10.		935.	918.	1000.	1000.	µg/L		2.	20	94.	92.	75 - 125
Total Iron	TOTAL-2656-6	5100.		15680.	15840.	10000.	10000.	µg/L		1.	20	106.	107.	75 - 125
Total Lead	TOTAL-2656-6	< 5.		109.	106.	100.	100.	µg/L		3.	20	109.	106.	75 - 125
Total Mercury	DISS-02652-4	< 0.2	< 0.2	0.9843	1.001	1.000	1.000	µg/L	<PQL	2.	20	97.	99.	70 - 130
Total Molybdenum	TOTAL-2656-6	< 10.		106.	104.	100.	100.	µg/L		2.	20	106.	104.	75 - 125
Total Nickel	TOTAL-2656-6	< 50.		949.	944.	1000.	1000.	µg/L		1.	20	95.	94.	75 - 125
Total Selenium	DISS-2656-4	< 2.	< 2.	20.	21.9	20.00	20.00	µg/L	<PQL	9.	20	96.	106.	80 - 120
Total Silver	TOTAL-2656-6	< 10.		98.	99.	100.	100.	µg/L		1.	20	98.	99.	75 - 125
Total Titanium	TOTAL-2656-6	19.		NS	NS	NS	NS	µg/L		NS	20	NS	NS	
Total Thallium	TOTAL-2656-6	< 5.		96.	99.	100.	100.	µg/L		3.	20	96.	99.	75 - 125
Total Vanadium	TOTAL-2656-6	11.		971.	956.	1000.	1000.	µg/L		2.	20	96.	95.	75 - 125
Total Zinc	TOTAL-2656-6	< 50.		1051.	961.	1000.	1000.	µg/L		9.	20	105.	96.	75 - 125

MS = Matrix Spike; MSD = Matrix Spike Duplicate; RPD = Relative Percent Difference

Quality Control Officer

for Anthony Bonanno

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BC Laboratories, Inc

B C LABORATORIES
QUALITY CONTROL REPORT
(Laboratory Control Sample)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 05/19/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-6

Constituents	QC Sample ID	Sample Result	Spike Level	Units	% Rec	Accuracy Control Limits
Total Aluminum	TOTAL-LCSW	9740.	10000.	µg/L	97.	85 - 115
Total Antimony	TOTAL-LCSW	110.	100.	µg/L	110.	85 - 115
Total Arsenic	LCSW2-03-0	10.19	10.	µg/L	102.	85 - 115
Total Barium	TOTAL-LCSW	998.	1000.	µg/L	100.	85 - 115
Total Beryllium	TOTAL-LCSW	106.	100.	µg/L	106.	85 - 115
Total Cadmium	TOTAL-LCSW	103.	100.	µg/L	103.	85 - 115
Total Chromium	TOTAL-LCSW	967.	1000.	µg/L	97.	85 - 115
Total Cobalt	TOTAL-LCSW	98.	100.	µg/L	98.	85 - 115
Total Copper	TOTAL-LCSW	980.	1000.	µg/L	98.	85 - 115
Total Iron	TOTAL-LCSW	9970.	10000.	µg/L	100.	85 - 115
Total Lead	TOTAL-LCSW	100.	100.	µg/L	100.	85 - 115
Total Mercury	LCSW1-03-1	0.9676	1.0	µg/L	97.	85 - 115
Total Molybdenum	TOTAL-LCSW	103.	100.	µg/L	103.	85 - 115
Total Nickel	TOTAL-LCSW	979.	1000.	µg/L	98.	85 - 115
Total Selenium	LCSW2-03-0	10.39	10.	µg/L	104.	85 - 115
Total Silver	TOTAL-LCSW	101.	100.	µg/L	101.	85 - 115
Total Titanium	TOTAL-LCSW	983.	1000.	µg/L	98.	85 - 115
Total Thallium	TOTAL-LCSW	97.	100.	µg/L	97.	85 - 115
Total Vanadium	TOTAL-LCSW	963.	1000.	µg/L	96.	85 - 115
Total Zinc	TOTAL-LCSW	986.	1000.	µg/L	99.	85 - 115

Quality Control Officer

Anthony Bonanno

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BC Laboratories, Inc

B C LABORATORIES
QUALITY CONTROL REPORT
(Instrumental & Blank Parameters)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 05/19/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	Method Blank Readings	Units
Dissolved Aluminum	<50.	µg/L
Dissolved Antimony	<100.	µg/L
Dissolved Arsenic	< 2.	µg/L
Dissolved Barium	<100.	µg/L
Dissolved Beryllium	<10.	µg/L
Dissolved Cadmium	<10.	µg/L
Dissolved Chromium	<10.	µg/L
Hexavalent Chromium	< 2.	µg/L
Dissolved Cobalt	<50.	µg/L
Dissolved Copper	<10.	µg/L
Dissolved Iron	<50.	µg/L
Dissolved Lead	< 5.	µg/L
Dissolved Mercury	< 0.2	µg/L
Dissolved Molybdenum	<50.	µg/L
Dissolved Nickel	<50.	µg/L
Dissolved Selenium	< 2.	µg/L
Dissolved Silver	<10.	µg/L
Dissolved Titanium	<10.	µg/L
Dissolved Thallium	< 1.	µg/L
Dissolved Vanadium	<10.	µg/L
Dissolved Zinc	<10.	µg/L
Total Aluminum	<50.	µg/L
Total Antimony	<100.	µg/L
Total Arsenic	< 2.	µg/L
Total Barium	<100.	µg/L
Total Beryllium	<10.	µg/L
Total Cadmium	<10.	µg/L
Total Chromium	<10.	µg/L
Total Cobalt	<50.	µg/L
Total Copper	<10.	µg/L
Total Iron	<50.	µg/L

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BC Laboratories, Inc

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QUALITY CONTROL REPORT
(Instrumental & Blank Parameters)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 05/19/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	Method Blank Readings	Units
Total Lead	< 5.	µg/L
Total Mercury	< 0.2	µg/L
Total Molybdenum	<50.	µg/L
Total Nickel	<50.	µg/L
Total Selenium	< 2.	µg/L
Total Silver	<10.	µg/L
Total Titanium	<10.	µg/L
Total Thallium	< 1.	µg/L
Total Vanadium	<10.	µg/L
Total Zinc	<50.	µg/L

Total QC in this report does not affect sample 99-02656-6.

Quality Control Officer

Anthony Bonanno

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BOE-C6-0234684

BC Laboratories, Inc

B C LABORATORIES
QUALITY CONTROL REPORT
(Precision & Accuracy)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 05/19/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	QC Sample ID	Sample Result	Sample Duplicate	MS Result	MSD Result	MS Spike Level	MSD Spike Level	Units	Sample R.P.D.	Spike R.P.D.	Precision Control Limits	MS % Rec	MSD % Rec	Accuracy Control Limits
Dissolved Aluminum	2656-3	< 50.	< 50.	452.	433.	408.	408.	µg/L	<PQL	4.	20	111.	107.	85 - 115
Dissolved Antimony	2656-3	<100.	<100.	449.	443.	408.	408.	µg/L	<PQL	1.	20	109.	107.	85 - 115
Dissolved Arsenic #1,3	DISS-2652-4	1.42	1.44	20.9	21.	20.	20.	µg/L	<PQL	0.	20	98.	98.	80 - 120
Dissolved Arsenic #4-8	DISS-2656-4	< 2.	< 2.	20.4	20.4	20.	20.	µg/L	<PQL	0.	20	97.	97.	80 - 120
Dissolved Barium	2656-3	120.	120.	328.	324.	204.	204.	µg/L	<PQL	1.	20	102.	100.	85 - 115
Dissolved Beryllium	2656-3	< 10.	< 10.	206.	204.	204.	204.	µg/L	<PQL	1.	20	101.	100.	85 - 115
Dissolved Cadmium	2656-3	< 10.	< 10.	213.	210.	204.	204.	µg/L	<PQL	1.	20	103.	102.	85 - 115
Dissolved Chromium	2656-3	< 10.	< 10.	206.	205.	204.	204.	µg/L	<PQL	0.	20	100.	100.	85 - 115
Hexavalent Chromium	2652-2	< 2.000	< 2.000	52.3	53.	52.6	52.6	µg/L	<PQL	1.	10	99.	101.	85 - 115
Dissolved Cobalt	2656-3	< 50.	< 50.	216.	214.	204.	204.	µg/L	<PQL	1.	20	106.	105.	85 - 115
Dissolved Copper	2656-3	< 10.	< 10.	210.	210.	204.	204.	µg/L	<PQL	0.	20	103.	103.	85 - 115
Dissolved Iron	2656-3	< 50.	< 50.	435.	433.	408.	408.	µg/L	<PQL	0.	20	103.	103.	85 - 115
Dissolved Lead	DISS-2656-1	< 5.	< 5.	22.8	22.8	25.	25.	µg/L	<PQL	0.	20	90.	90.	85 - 115
Dissolved Mercury	DISS-02652-4	< 0.2	< 0.2	0.984	1.	1.	1.	µg/L	<PQL	2.	20	97.	99.	70 - 130
Dissolved Mercury #6	TOTAL-02652-2	< 0.2	< 0.2	1.02	0.912	1.	1.	µg/L	<PQL	11.	20	101.	90.	70 - 130
Dissolved Molybdenum	2656-3	< 50.	< 50.	199.	207.	204.	204.	µg/L	<PQL	4.	20	97.	101.	85 - 115
Dissolved Nickel	2656-3	< 50.	< 50.	424.	424.	408.	408.	µg/L	<PQL	0.	20	104.	104.	85 - 115
Dissolved Selenium	DISS-2652-4	1.6	1.76	21.8	21.6	20.	20.	µg/L	<PQL	1.	20	101.	100.	80 - 120
Dissolved Silver	2656-3	< 10.	< 10.	186.	187.	204.	204.	µg/L	<PQL	1.	20	93.	93.	85 - 115
Dissolved Titanium	2656-3	< 10.	< 10.	203.	202.	204.	204.	µg/L	<PQL	1.	20	101.	100.	85 - 115
Dissolved Thallium	DISS-2656-1	< 1.	< 1.	24.	24.4	25.	25.	µg/L	<PQL	1.	20	96.	97.	85 - 115
Dissolved Vanadium	2656-3	< 10.	< 10.	207.	207.	204.	204.	µg/L	<PQL	0.	20	100.	100.	85 - 115
Dissolved Zinc	2656-3	< 50.	< 50.	239.	236.	204.	204.	µg/L	<PQL	1.	20	109.	108.	85 - 115
Total Aluminum	TOTAL-2656-5	2200.	2190.	4440.	4460.	400.	400.	µg/L	0.	1.	20	H MEAN	H MEAN	80 - 120
Total Antimony	TOTAL-2656-5	<100.	<100.	401.	405.	400.	400.	µg/L	<PQL	1.	20	101.	102.	80 - 120
Total Arsenic	DISS-2652-4	1.42	1.44	20.9	21.	20.	20.	µg/L	<PQL	0.	20	98.	98.	80 - 120
Total Barium	TOTAL-2656-5	184.	185.	378.	381.	200.	200.	µg/L	<PQL	1.	20	97.	99.	80 - 120
Total Beryllium	TOTAL-2656-5	< 10.	< 10.	182.	184.	200.	200.	µg/L	<PQL	1.	20	91.	92.	80 - 120
Total Cadmium	TOTAL-2656-5	< 10.	< 10.	188.	191.	200.	200.	µg/L	<PQL	1.	20	96.	97.	80 - 120
Total Chromium	TOTAL-2656-5	25.4	20.	209.	209.	200.	200.	µg/L	<PQL	0.	20	92.	92.	80 - 120
Total Cobalt	TOTAL-2656-5	< 50.	< 50.	195.	198.	200.	200.	µg/L	<PQL	1.	20	97.	98.	80 - 120

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BC Laboratories, Inc

B C LABORATORIES
QUALITY CONTROL REPORT
(Precision & Accuracy)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 05/19/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	QC Sample ID	Sample Result	Sample Duplicate	MS Result	MSD Result	MS Spike Level	MSD Spike Level	Units	Sample R.P.D.	Spike R.P.D.	Precision Control Limits	MS % Rec	MSD % Rec	Accuracy Control Limits
Total Copper	TOTAL-2656-5	< 10.	< 10.	201.	202.	200.	200.	µg/L	<PQL	1.	20	100.	101.	80 - 120
Total Iron	TOTAL-2656-5	2420.	2420.	3160.	3200.	400.	400.	µg/L	0.	1.	20	H MEAN	H MEAN	80 - 120
Total Lead	TOTAL-2656-6	< 5.	< 5.	16.8	17.1	20.	20.	µg/L	<PQL	2.	20	84.	85.	80 - 120
Total Mercury	TOTAL-02652-2	< 0.2	< 0.2	1.02	0.912	1.	1.	µg/L	<PQL	11.	20	101.	90.	70 - 130
Total Mercury #6,8	DISS-02652-4	< 0.2	< 0.2	0.984	1.	1.	1.	µg/L	<PQL	2.	20	97.	99.	70 - 130
Total Molybdenum	TOTAL-2656-5	< 50.	< 50.	196.	198.	200.	200.	µg/L	<PQL	1.	20	96.	97.	80 - 120
Total Nickel	TOTAL-2656-5	< 50.	< 50.	367.	370.	400.	400.	µg/L	<PQL	1.	20	90.	91.	80 - 120
Total Selenium	DISS-2652-4	1.6	1.76	21.8	21.6	20.	20.	µg/L	<PQL	1.	20	101.	100.	80 - 120
Total Selenium #4-8	DISS-2656-4	< 2.	< 2.	20.	21.9	20.	20.	µg/L	<PQL	9.	20	96.	106.	80 - 120
Total Silver	TOTAL-2656-5	< 10.	< 10.	183.	184.	200.	200.	µg/L	<PQL	0.	20	93.	94.	80 - 120
Total Titanium	TOTAL-2656-5-0	139.	138.	413.	410.	200.	200.	µg/L	1.	1.	20	137.	135.	80 - 120
Total Thallium	TOTAL-2656-6	< 1.	< 1.	19.3	20.7	20.	20.	µg/L	<PQL	7.	20	96.	103.	80 - 120
Total Vanadium	TOTAL-2656-5	12.	10.	202.	204.	200.	200.	µg/L	<PQL	1.	20	95.	96.	80 - 120
Total Zinc	TOTAL-2656-5	< 50.	< 50.	217.	218.	200.	200.	µg/L	<PQL	1.	20	99.	100.	80 - 120

MS = Matrix Spike; MSD = Matrix Spike Duplicate; RPD = Relative Percent Difference

The matrix spike recoveries for total titanium are outside QC limits.

Quality Control Officer

Anthony Bonanno

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B C LABORATORIES
QUALITY CONTROL REPORT
(Laboratory Control Sample)

ARCADIS GERAGHTY & MILLER, INC.
1400 N. HARBOR BLVD., SUITE 700
FULLERTON, CA 92835-4127
TERESA WILSON

Date of Report: 05/19/99
Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	QC Sample ID	Sample Result	Spike Level	Units	% Rec	Accuracy Control Limits
Dissolved Aluminum	LFB#1-0129	426.7	400.	µg/L	107.	85 - 115
Dissolved Antimony	LFB#1-0129	413.3	400.	µg/L	103.	85 - 115
Dissolved Arsenic	LCSW1-03-0	9.85	10.	µg/L	99.	85 - 115
Dissolved Barium	LFB#1-0129	193.6	200.	µg/L	97.	85 - 115
Dissolved Beryllium	LFB#1-0129	189.9	200.	µg/L	95.	85 - 115
Dissolved Cadmium	LFB#1-0129	197.3	200.	µg/L	99.	85 - 115
Dissolved Chromium	LFB#1-0129	194.	200.	µg/L	97.	85 - 115
Hexavalent Chromium	LCSW-3-4-9	1022.	1000.	µg/L	102.	85 - 115
Dissolved Cobalt	LFB#1-0129	208.2	200.	µg/L	104.	85 - 115
Dissolved Copper	LFB#1-0129	197.2	200.	µg/L	99.	85 - 115
Dissolved Iron	LFB#1-0129	398.7	400.	µg/L	100.	85 - 115
Dissolved Lead	LFB-25-LCS	24.39	25.	µg/L	98.	85 - 115
Dissolved Mercury	LCSW1-03-1	0.9676	1.0	µg/L	97.	85 - 115
Dissolved Molybdenum	LFB#1-0129	204.1	200.	µg/L	102.	85 - 115
Dissolved Nickel	LFB#1-0129	422.4	400.	µg/L	106.	85 - 115
Dissolved Selenium	LCSW1-03-0	9.5	10.	µg/L	95.	85 - 115
Dissolved Silver	LFB#1-0129	183.6	200.	µg/L	92.	85 - 115
Dissolved Titanium	LFB#1-0129	191.5	200.	µg/L	96.	85 - 115
Dissolved Thallium	LFB-25-LCS	24.88	25.	µg/L	100.	85 - 115
Dissolved Vanadium	LFB#1-0129	190.9	200.	µg/L	95.	85 - 115
Dissolved Zinc	LFB#1-0129	218.6	200.	µg/L	109.	85 - 115
Total Aluminum	TOTAL-LCSW	422.8	400.	µg/L	106.	80 - 120
Total Antimony	TOTAL-LCSW	439.3	400.	µg/L	110.	80 - 120
Total Arsenic	LCSW1-03-0	9.85	10.	µg/L	99.	85 - 115
Total Barium	TOTAL-LCSW	199.9	200.	µg/L	100.	80 - 120
Total Beryllium	TOTAL-LCSW	190.9	200.	µg/L	95.	80 - 120
Total Cadmium	TOTAL-LCSW	203.7	200.	µg/L	102.	80 - 120
Total Chromium	TOTAL-LCSW	203.3	200.	µg/L	102.	80 - 120
Total Cobalt	TOTAL-LCSW	212.	200.	µg/L	106.	80 - 120
Total Copper	TOTAL-LCSW	199.4	200.	µg/L	100.	80 - 120
Total Iron	TOTAL-LCSW	396.9	400.	µg/L	99.	80 - 120

All results lis[illegible]ls report are for the exclusive use of the submitting party. BC Laboratories, In[illegible]es no responsibility for report alteration, separation, detachment or third party [illegible]ation.

4100 Atlas Court * Bakersfield, CA 93308 * (661) [illegible]4911 * Fax (661) 327-1918 * www.bclabs.com

BOE-C6-0234687

BC Laboratories, Inc

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Sample Matrix: Groundwater

Samples Affected: 99-02656-1, 99-02656-3 - 99-02656-8

Constituents	QC Sample ID	Sample Result	Spike Level	Units	% Rec	Accuracy Control Limits
Total Lead	TOTAL-LCSW	19.64	20.	µg/L	98.	80 - 120
Total Mercury	LCSW2-03-1	1.04	1.0	µg/L	104.	85 - 115
Total Molybdenum	TOTAL-LCSW	205.4	200.	µg/L	103.	80 - 120
Total Nickel	TOTAL-LCSW	402.4	400.	µg/L	101.	80 - 120
Total Selenium	LCSW1-03-0	9.5	10.	µg/L	95.	85 - 115
Total Silver	TOTAL-LCSW	201.4	200.	µg/L	101.	80 - 120
Total Titanium	TOTAL-LCSW	185.5	200.	µg/L	93.	80 - 120
Total Thallium	TOTAL-LCSW	22.81	20.	µg/L	114.	80 - 120
Total Vanadium	TOTAL-LCSW	200.6	200.	µg/L	100.	80 - 120
Total Zinc	TOTAL-LCSW	214.	200.	µg/L	107.	80 - 120

Total QC in this report does not affect sample 99-02656-6.

Quality Control Officer

Anthony Bonanno

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