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ANNUAL MONITORING REPORT

YEAR(S):

1999

WESTGATE SUBDIVISION

GRIMES BATTERY & TASKER ROAD

1999 Quarterly Groundwater Monitoring Report

April 2000

**SHELL EXPLORATION & PRODUCTION COMPANY
HOUSTON, TEXAS**

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1.0 INTRODUCTION

The subject site is located in west Hobbs, New Mexico. Assessment activities (Stage 1 Abatement activities) were conducted on developed and undeveloped property bordered by Tasker Road to the East, the Los Cuatro, Inc. property to the West, Sanger Road to the South, and Princess Jean Drive to the North. Assessment activities also included undeveloped property extending approximately 400 feet west of Cobb Drive. Based on the results of the assessment activities (both Stage 1 and proposed Stage 2 Abatement activities), quarterly groundwater monitoring and remediation activities are being performed.

The Grimes lease is an oil production property that has been in operation since the late 1920's. It consists of producing and injection wells, tank batteries, and associated flowlines. Oil and saltwater were produced from the wells on this lease and transported by flowlines to the Grimes battery. Prior to decommissioning of the Grimes battery in 1993, produced oil from the battery was transported south in a pipeline owned by Shell pipeline (currently known as Equilon Pipeline). The pipeline is decommissioned and terminates at the former battery location.

2.0 3RD QUARTER 1999 GROUNDWATER MONITORING ACTIVITIES

Per NMOCD requirements, there are sixteen groundwater monitoring wells in the Westgate Subdivision that are being monitored quarterly for BTEX using USEPA Method 8260-B and annually for PAHs using USEPA Method 8270-C. Four of the sixteen wells have measurable free product hydrocarbons detected in them. These monitor wells are GMW-1, GMW-3B, GMW-5, and GMW-9.

2.1 LNAPL Thickness and Groundwater Elevations

The sixteen monitor wells were measured from the top of the casing for depth to groundwater, depth to LNAPL, LNAPL thickness, and corrected groundwater elevations prior to sampling (Table 1). Four wells were found to have measurable free product hydrocarbons. They are GMW-1, GMW-3B, GMW-5, and GMW-9 (Table 1). Groundwater gradient and elevations are depicted in Figure Q1. LNAPL thicknesses are depicted in Figure Q2.

Table 1. 3rd Quarter 1999 LNAPL and Groundwater Elevations
Westgate Subdivision - Hobbs, NM

MONITORING WELL	TOP OF CASING (feet)	DATE	DEPTH TO GROUNDWATER (feet)	DEPTH TO LNAPL (feet)	LNAPL THICKNESS X 0.73 (feet)	CORRECTED GROUNDWATER (feet)
GMW-1	3647.84	9/28/99	68.95	67.92	0.752	3579.64
GMW-2	3648.51	9/24/99	67.95	ND	0.00	3580.56
GMW-3B	3648.26	9/28/99	68.83	68.13	0.51	3579.94
GMW-4	3647.79	9/24/99	67.75	ND	0.00	3580.04
GMW-5	3648.41	9/28/99	70.92	69.12	1.31	3578.80
GMW-6	3648.22	9/28/99	68.67	ND	0.00	3579.55
GMW-7	3644.98	9/24/99	66.21	ND	0.00	3578.77
GMW-8	3645.66	9/24/99	66.81	ND	0.00	3578.85
GMW-9	3646.27	9/28/99	66.80	66.75	0.037	3579.51
GMW-10	3645.65	9/24/99	64.88	ND	0.00	3580.77
GMW-11	3644.07	9/24/99	64.16	ND	0.00	3579.91
TMW-1	3646.18	9/24/99	67.69	ND	0.00	3578.49
TMW-2	3643.94	9/24/99	65.81	ND	0.00	3578.13
TMW-3	3643.50	9/24/99	65.38	ND	0.00	3578.12
TMW-4	3643.69	9/24/99	66.24	ND	0.00	3577.45
TMW-5	3643.35	9/24/99	66.02	ND	0.00	3577.33

ND = Not Detected in Monitor Well

2.2 Free Product Recovery

Downhole passive hydrocarbon skimmers were installed in monitor wells GMW-1, GMW-3B and GMW-5, and a passive absorbing skimmer was installed in monitor well GMW-9. Free product was removed regularly from each monitor well (Table 2). All recovered fluids were transported to the Sundance Services NMOCD approved disposal facility near Eunice, NM for recycling and disposal.

Table 2. 3rd Quarter 1999 Product Recovery Report

Location	08/17/1999	08/18/1999	08/20/1999	08/23/1999	08/25/1999	08/31/1999	09/03/1999	09/07/1999	09/13/1999	09/20/1999	09/22/1999	09/28/1999	3 rd Quarter Totals (gallons)	Year-to-Date Totals (gallons)
GMW-1	--	--	--	--	0	0	0	1.5 qt.	1 gal.	0	0	0.05 gal.	1.30	1.30
GMW-3b	--	--	--	--	0	0	0	0	0	0	0.5 gal.	1 gal.	1.50	1.50
GMW-5	0	1 gal.	1 gal.	2.25 qt.	1.75 qt.	0	0	2.5 qt.	1 gal.	0.5 gal.	2 qt.	0	5.50	5.50
GMW-9	--	--	--	--	0	0	0	0	0	0	0	0	0.00	0.00
Totals	0	1 gal.	1 gal.	2.25 qt.	1.75 qt.	0	0	4 qt.	2 gal.	1 gal.	1 gal.	1.05 gal.	8.30	8.30

2.3 Purging and Sampling Activities

All sixteen monitor wells were measured from the top of the casing for depth to groundwater, depth to LNAPL, LNAPL thickness, and corrected groundwater elevations prior to sampling (Table 1). Well numbers GMW-2, GMW-4, GMW-7, GMW-8, GMW-10, GMW-11, TMW-1, TMW-2, TWM-3, TMW-4, and TMW-5 were measured then purged and sampled on September 24, 1999 (Table 1). Monitor wells GMW-1, GMW-3B, GMW-5, GMW-6, and GMW-9 were measured, purged, and sampled on September 28, 1999 (Table 1). All purged fluids were drummed, transported, and disposed of at Sundance Services NMOCD approved disposal facility near Eunice, NM for recycling and disposal.

The groundwater samples were sent to Trace Analysis Laboratories in Lubbock, TX to be analyzed for BTEX (USEPA Method 8260-B) and PAHs (USEPA Method 8270C). The results are summarized in Table 3. Laboratory analytical results, QA/QC, and chain-of-custody reports for the groundwater samples collected and analyzed are included in Appendix I.

Table 3. 3rd and 4th Quarter 1999 Sampling Report

Grimes Monitor Wells (GMW 1-11)

GMW-1

Analyte	Matrix	Method Taken	3 rd Quarter				4 th Quarter			
			Order ID#: 99093012				Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132592	09/28/1999	31	5	T137881	12/20/1999	22	2
Ethylbenzene	Water	S-8260B	T132592	09/28/1999	180	5	T137881	12/20/1999	113	2
Toluene	Water	S-8260B	T132592	09/28/1999	9.3	5	T137881	12/20/1999	28	2
m,p-xylene	Water	S-8260B	T132592	09/28/1999	470	5	T137881	12/20/1999	565	2
o-xylene	Water	S-8260B	T132592	09/28/1999	250	5	T137881	12/20/1999	169	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132592	09/28/1999	0.098*	0.005	T137881	12/20/1999	0.034	0.005
Acenaphthylene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	0.006	0.005
Anthracene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	<0.005	0.005
Indeno[1,2,3-cd]pyrene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132592	09/28/1999	<0.005	0.005	T137881	12/20/1999	<0.005	0.005

*Naphthalene was diluted and re-run; concentration above curve was 0.128 mg/L.

Table 3. 3rd and 4th Quarter 1999 Sampling Report

GMW-2

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99092704				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132324	09/24/1999	<2	2	T137882	12/20/1999	<2	2
Ethylbenzene	Water	S-8260B	T132324	09/24/1999	<2	2	T137882	12/20/1999	<2	2
Toluene	Water	S-8260B	T132324	09/24/1999	<2	2	T137882	12/20/1999	<2	2
m,p-xylene	Water	S-8260B	T132324	09/24/1999	<2	2	T137882	12/20/1999	<2	2
o-xylene	Water	S-8260B	T132324	09/24/1999	<2	2	T137882	12/20/1999	<2	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Acenaphthylene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Anthracene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Indeno[1,2-3-cd]pyrene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132324	09/24/1999	<0.005	0.005	T137882	12/20/1999	<0.005	0.005

Table 3. 3rd and 4th Quarter 1999 Sampling Report

GMW-3B

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99093012				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132590	09/28/1999	8.7	5	T137883	12/20/1999	<10	10
Ethylbenzene	Water	S-8260B	T132590	09/28/1999	100	5	T137883	12/20/1999	30	10
Toluene	Water	S-8260B	T132590	09/28/1999	<5	5	T137883	12/20/1999	<10	10
m,p-xylene	Water	S-8260B	T132590	09/28/1999	400	5	T137883	12/20/1999	202	10
o-xylene	Water	S-8260B	T132590	09/28/1999	180	5	T137883	12/20/1999	52	10
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132590	09/28/1999	0.081	0.005	T137883	12/20/1999	0.020	0.005
Acenaphthylene	Water	S-8270C	T132590	09/28/1999	<0.005	0.005	T137883	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132590	09/28/1999	<0.005	0.005	T137883	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132590	09/28/1999	<0.005	0.005	T137883	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132590	09/28/1999	0.027	0.005	T137883	12/20/1999	0.006	0.005
Anthracene	Water	S-8270C	T132590	09/28/1999	<0.005	0.005	T137883	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132590	09/28/1999	<0.005	0.005	T137883	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132590	09/28/1999	<0.005	0.005	T137883	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132590	09/28/1999	<0.005	0.005	T137883	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132590	09/28/1999	0.006	0.005	T137883	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132590	09/28/1999	<0.005	0.005	T137883	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132590	09/28/1999	<0.005	0.005	T137883	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132590	09/28/1999	<0.005	0.005	T137883	12/20/1999	<0.005	0.005
Indeno[1,2,3-cd]pyrene	Water	S-8270C	T132590	09/28/1999	<0.005	0.005	T137883	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132590	09/28/1999	<0.005	0.005	T137883	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132590	09/28/1999	<0.005	0.005	T137883	12/20/1999	<0.005	0.005

Table 3. 3rd and 4th Quarter 1999 Sampling Report

GMW-4

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99092704				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132325	09/24/1999	<2	2	T137884	12/20/1999	<2	2
Ethylbenzene	Water	S-8260B	T132325	09/24/1999	<2	2	T137884	12/20/1999	<2	2
Toluene	Water	S-8260B	T132325	09/24/1999	<2	2	T137884	12/20/1999	<2	2
m,p-xylene	Water	S-8260B	T132325	09/24/1999	<2	2	T137884	12/20/1999	<2	2
o-xylene	Water	S-8260B	T132325	09/24/1999	<2	2	T137884	12/20/1999	<2	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Acenaphthylene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Anthracene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Indeno[1,2,3-cd]pyrene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132325	09/24/1999	<0.005	0.005	T137884	12/20/1999	<0.005	0.005

Table 3. 3rd and 4th Quarter 1999 Sampling Report

GMW-5

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99093012				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132588	09/28/1999	<50	50	T137896	12/20/1999	24	2
Ethylbenzene	Water	S-8260B	T132588	09/28/1999	400	50	T137896	12/20/1999	254	2
Toluene	Water	S-8260B	T132588	09/28/1999	<50	50	T137896	12/20/1999	27	2
m,p-xylene	Water	S-8260B	T132588	09/28/1999	1,700	50	T137896	12/20/1999	1,969	2
o-xylene	Water	S-8260B	T132588	09/28/1999	690	50	T137896	12/20/1999	458	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132588	09/28/1999	0.595	0.05*	T137896	12/20/1999	0.138	0.025
Acenaphthylene	Water	S-8270C	T132588	09/28/1999	<0.05	0.05*	T137896	12/20/1999	<0.025	0.025
Acenaphthene	Water	S-8270C	T132588	09/28/1999	<0.05	0.05*	T137896	12/20/1999	<0.025	0.025
Fluorene	Water	S-8270C	T132588	09/28/1999	<0.05	0.05*	T137896	12/20/1999	<0.025	0.025
Phenanthrene	Water	S-8270C	T132588	09/28/1999	0.271	0.05*	T137896	12/20/1999	0.042	0.025
Anthracene	Water	S-8270C	T132588	09/28/1999	<0.05	0.05*	T137896	12/20/1999	<0.025	0.025
Fluoranthene	Water	S-8270C	T132588	09/28/1999	<0.05	0.05*	T137896	12/20/1999	<0.025	0.025
Pyrene	Water	S-8270C	T132588	09/28/1999	<0.05	0.05*	T137896	12/20/1999	<0.025	0.025
Benzo[a]anthracene	Water	S-8270C	T132588	09/28/1999	<0.05	0.05*	T137896	12/20/1999	<0.025	0.025
Chrysene	Water	S-8270C	T132588	09/28/1999	0.061	0.05*	T137896	12/20/1999	<0.025	0.025
Benzo[b]fluoranthene	Water	S-8270C	T132588	09/28/1999	<0.05	0.05*	T137896	12/20/1999	<0.025	0.025
Benzo[k]fluoranthene	Water	S-8270C	T132588	09/28/1999	<0.05	0.05*	T137896	12/20/1999	<0.025	0.025
Benzo[a]pyrene	Water	S-8270C	T132588	09/28/1999	<0.05	0.05*	T137896	12/20/1999	<0.025	0.025
Indeno[1,2,3-cd]pyrene	Water	S-8270C	T132588	09/28/1999	<0.05	0.05*	T137896	12/20/1999	<0.025	0.025
Dibenz[a,h]anthracene	Water	S-8270C	T132588	09/28/1999	<0.05	0.05*	T137896	12/20/1999	<0.025	0.025
Benzo[g,h,i]perylene	Water	S-8270C	T132588	09/28/1999	<0.05	0.05*	T137896	12/20/1999	<0.025	0.025

*Reporting limit corrected from 0.005 to 0.05 due to x10 dilution.

Table 3. 3rd and 4th Quarter 1999 Sampling Report

GMW-6

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99093012				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132589	09/28/1999	<2	2	T137880	12/20/1999	<2	2
Ethylbenzene	Water	S-8260B	T132589	09/28/1999	<2	2	T137880	12/20/1999	<2	2
Toluene	Water	S-8260B	T132589	09/28/1999	<2	2	T137880	12/20/1999	<2	2
m,p-xylene	Water	S-8260B	T132589	09/28/1999	<2	2	T137880	12/20/1999	<2	2
o-xylene	Water	S-8260B	T132589	09/28/1999	<2	2	T137880	12/20/1999	<2	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Acenaphthylene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Anthracene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Indeno[1,2-3-cd]pyrene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132589	09/28/1999	<0.005	0.005	T137880	12/20/1999	<0.005	0.005

Table 3. 3rd and 4th Quarter 1999 Sampling Report

GMW-7

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99092704				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132326	09/24/1999	<2	2	T137885	12/20/1999	<2	2
Ethylbenzene	Water	S-8260B	T132326	09/24/1999	<2	2	T137885	12/20/1999	<2	2
Toluene	Water	S-8260B	T132326	09/24/1999	<2	2	T137885	12/20/1999	<2	2
m,p-xylene	Water	S-8260B	T132326	09/24/1999	<2	2	T137885	12/20/1999	<2	2
o-xylene	Water	S-8260B	T132326	09/24/1999	<2	2	T137885	12/20/1999	<2	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Acenaphthylene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Anthracene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Indeno[1,2,3-cd]pyrene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132326	09/24/1999	<0.005	0.005	T137885	12/20/1999	<0.005	0.005

Table 3. 3rd and 4th Quarter 1999 Sampling Report

GMW-8

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99092704				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132327	09/24/1999	<2	2	T137886	12/20/1999	<2	2
Ethylbenzene	Water	S-8260B	T132327	09/24/1999	<2	2	T137886	12/20/1999	<2	2
Toluene	Water	S-8260B	T132327	09/24/1999	<2	2	T137886	12/20/1999	<2	2
m,p-xylene	Water	S-8260B	T132327	09/24/1999	2.3	2	T137886	12/20/1999	2.60	2
o-xylene	Water	S-8260B	T132327	09/24/1999	<2	2	T137886	12/20/1999	<2	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Acenaphthylene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Anthracene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Indeno[1,2,3-cd]pyrene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132327	09/24/1999	<0.005	0.005	T137886	12/20/1999	<0.005	0.005

Table 3. 3rd and 4th Quarter 1999 Sampling Report

GMW-9

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99093012				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132591	09/28/1999	<5	5	T137887	12/20/1999	<2	2
Ethylbenzene	Water	S-8260B	T132591	09/28/1999	60	5	T137887	12/20/1999	25.01	2
Toluene	Water	S-8260B	T132591	09/28/1999	<5	5	T137887	12/20/1999	<2	2
m,p-xylene	Water	S-8260B	T132591	09/28/1999	110	5	T137887	12/20/1999	102.56	2
o-xylene	Water	S-8260B	T132591	09/28/1999	75	5	T137887	12/20/1999	34.47	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132591	09/28/1999	0.035	0.005	T137887	12/20/1999	0.008	0.005
Acenaphthylene	Water	S-8270C	T132591	09/28/1999	<0.005	0.005	T137887	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132591	09/28/1999	<0.005	0.005	T137887	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132591	09/28/1999	<0.005	0.005	T137887	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132591	09/28/1999	0.017	0.005	T137887	12/20/1999	<0.005	0.005
Anthracene	Water	S-8270C	T132591	09/28/1999	<0.005	0.005	T137887	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132591	09/28/1999	<0.005	0.005	T137887	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132591	09/28/1999	<0.005	0.005	T137887	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132591	09/28/1999	<0.005	0.005	T137887	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132591	09/28/1999	0.005	0.005	T137887	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132591	09/28/1999	<0.005	0.005	T137887	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132591	09/28/1999	<0.005	0.005	T137887	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132591	09/28/1999	<0.005	0.005	T137887	12/20/1999	<0.005	0.005
Indeno[1,2,3-cd]pyrene	Water	S-8270C	T132591	09/28/1999	<0.005	0.005	T137887	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132591	09/28/1999	<0.005	0.005	T137887	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132591	09/28/1999	<0.005	0.005	T137887	12/20/1999	<0.005	0.005

Table 3. 3rd and 4th Quarter 1999 Sampling Report

GMW-10

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99092704				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132328	09/24/1999	<2	2	T137888	12/20/1999	<2	2
Ethylbenzene	Water	S-8260B	T132328	09/24/1999	<2	2	T137888	12/20/1999	<2	2
Toluene	Water	S-8260B	T132328	09/24/1999	<2	2	T137888	12/20/1999	<2	2
m,p-xylene	Water	S-8260B	T132328	09/24/1999	<2	2	T137888	12/20/1999	<2	2
o-xylene	Water	S-8260B	T132328	09/24/1999	<2	2	T137888	12/20/1999	<2	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Acenaphthylene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Anthracene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Indeno[1,2,3-cd]pyrene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132328	09/24/1999	<0.005	0.005	T137888	12/20/1999	<0.005	0.005

Table 3. 3rd and 4th Quarter 1999 Sampling Report

GMW-11

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99092704				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132329	09/24/1999	<2	2	T137889	12/20/1999	<2	2
Ethylbenzene	Water	S-8260B	T132329	09/24/1999	<2	2	T137889	12/20/1999	<2	2
Toluene	Water	S-8260B	T132329	09/24/1999	<2	2	T137889	12/20/1999	<2	2
m,p-xylene	Water	S-8260B	T132329	09/24/1999	<2	2	T137889	12/20/1999	<2	2
o-xylene	Water	S-8260B	T132329	09/24/1999	<2	2	T137889	12/20/1999	<2	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Acenaphthylene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Anthracene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Indeno[1,2,3-cd]pyrene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132329	09/24/1999	<0.005	0.005	T137889	12/20/1999	<0.005	0.005

Table 3. 3rd and 4th Quarter 1999 Sampling Report

Tasker Monitor Wells (TMW 1-5)

TMW-1

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99092704				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132330	09/24/1999	<2	2	T137890	12/20/1999	<2	2
Ethylbenzene	Water	S-8260B	T132330	09/24/1999	<2	2	T137890	12/20/1999	<2	2
Toluene	Water	S-8260B	T132330	09/24/1999	<2	2	T137890	12/20/1999	<2	2
m,p-xylene	Water	S-8260B	T132330	09/24/1999	<2	2	T137890	12/20/1999	<2	2
o-xylene	Water	S-8260B	T132330	09/24/1999	<2	2	T137890	12/20/1999	<2	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Acenaphthylene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Anthracene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Indeno[1,2,3-cd]pyrene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132330	09/24/1999	<0.005	0.005	T137890	12/20/1999	<0.005	0.005

Table 3. 3rd and 4th Quarter 1999 Sampling Report

TMW-2

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99092704				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132331	09/24/1999	<2	2	T137891	12/20/1999	<2	2
Ethylbenzene	Water	S-8260B	T132331	09/24/1999	<2	2	T137891	12/20/1999	<2	2
Toluene	Water	S-8260B	T132331	09/24/1999	<2	2	T137891	12/20/1999	<2	2
m,p-xylene	Water	S-8260B	T132331	09/24/1999	<2	2	T137891	12/20/1999	<2	2
o-xylene	Water	S-8260B	T132331	09/24/1999	<2	2	T137891	12/20/1999	<2	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Acenaphthylene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Anthracene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Indeno[1,2,3-cd]pyrene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132331	09/24/1999	<0.005	0.005	T137891	12/20/1999	<0.005	0.005

Table 3. 3rd and 4th Quarter 1999 Sampling Report

TMW-3

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99092704				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132332	09/24/1999	<2	2	T137892	12/20/1999	<2	2
Ethylbenzene	Water	S-8260B	T132332	09/24/1999	<2	2	T137892	12/20/1999	<2	2
Toluene	Water	S-8260B	T132332	09/24/1999	<2	2	T137892	12/20/1999	<2	2
m,p-xylene	Water	S-8260B	T132332	09/24/1999	<2	2	T137892	12/20/1999	<2	2
o-xylene	Water	S-8260B	T132332	09/24/1999	<2	2	T137892	12/20/1999	<2	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Acenaphthylene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Anthracene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Indeno[1,2-3-cd]pyrene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132332	09/24/1999	<0.005	0.005	T137892	12/20/1999	<0.005	0.005

Table 3. 3rd and 4th Quarter 1999 Sampling Report

TMW-4

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99092704				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132333	09/24/1999	<2	2	T137893	12/20/1999	<2	2
Ethylbenzene	Water	S-8260B	T132333	09/24/1999	<2	2	T137893	12/20/1999	<2	2
Toluene	Water	S-8260B	T132333	09/24/1999	<2	2	T137893	12/20/1999	<2	2
m,p-xylene	Water	S-8260B	T132333	09/24/1999	<2	2	T137893	12/20/1999	<2	2
o-xylene	Water	S-8260B	T132333	09/24/1999	<2	2	T137893	12/20/1999	<2	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Acenaphthylene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Anthracene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Indeno[1,2,3-cd]pyrene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132333	09/24/1999	<0.005	0.005	T137893	12/20/1999	<0.005	0.005

Table 3. 3rd and 4th Quarter 1999 Sampling Report

TMW-5

Analyte	Matrix	Method Taken	3 rd Quarter Order ID#: 99092704				4 th Quarter Order ID#: 99122114			
			Sample Number	Date Taken	ug/L		Sample Number	Date Taken	ug/L	
					Result	Detection Limit			Result	Detection Limit
Benzene	Water	S-8260B	T132334	09/24/1999	<2	2	T137894	12/20/1999	<2	2
Ethylbenzene	Water	S-8260B	T132334	09/24/1999	30	2	T137894	12/20/1999	19.69	2
Toluene	Water	S-8260B	T132334	09/24/1999	<2	2	T137894	12/20/1999	<2	2
m,p-xylene	Water	S-8260B	T132334	09/24/1999	<2	2	T137894	12/20/1999	<2	2
o-xylene	Water	S-8260B	T132334	09/24/1999	<2	2	T137894	12/20/1999	<2	2
Analyte	Matrix	Method Taken	Sample Number	Date Taken	mg/L		Sample Number	Date Taken	mg/L	
					Result	Detection Limit			Result	Detection Limit
Naphthalene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Acenaphthylene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Acenaphthene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Fluorene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Phenanthrene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Anthracene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Fluoranthene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Pyrene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Benzo[a]anthracene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Chrysene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Benzo[b]fluoranthene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Benzo[k]fluoranthene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Benzo[a]pyrene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Indeno[1,2,3-cd]pyrene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Dibenz[a,h]anthracene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005
Benzo[g,h,i]perylene	Water	S-8270C	T132334	09/24/1999	<0.005	0.005	T137894	12/20/1999	<0.005	0.005

Benzene was detected in GMW-1 and GMW-3B at concentrations of 31 ug/L and 8.7 ug/L, respectively. Benzene was not detected in any other monitor wells. Toluene was detected in GMW-1 at a concentration of 9.3 ug/L. Ethylbenzene was detected in five samples (GMW-1, GMW-3B, GMW-5, GMW-9, and TMW-5) at concentrations ranging from 400 ug/L to 30 ug/L. Xylenes were detected in five of the samples (GMW-1, GMW-3B, GMW-5, GMW-8, and GMW-9) at concentrations ranging from 1,700 ug/L to 2.3 ug/L (Table 3). Figure Q3 is an isopleth map of Total BTEX concentrations detected in the groundwater samples.

Naphthalene was detected at concentrations ranging from 0.035 ug/L to 0.595 ug/L in samples collected from GMW-1, GMW-3B, GMW-5, and GMW-9. Phenanthrene was detected in the samples collected from GMW-3B, GMW-5, and GMW-9 at concentrations of 0.027 mg/L, 0.271 mg/L, and 0.017 mg/L, respectively. Chrysene was detected in GMW-3B, GMW-5, and GMW-9 at concentrations of 0.006 mg/L, 0.061 mg/L, and 0.005 mg/L, respectively (Table 3).

3.0 4TH QUARTER 1999 GROUNDWATER MONITORING ACTIVITIES

Per NMOCD requirements, there are sixteen groundwater monitoring wells in the Westgate Subdivision that are being monitored quarterly for BTEX using USEPA Method 8260-B and annually for PAHs using USEPA Method 8270-C. Four of the sixteen wells have had measurable free product hydrocarbons detected in them. These wells are GMW-1, GMW-3B, GMW-5, and GMW-9.

3.1 LNAPL Thickness and Groundwater Elevations

The sixteen monitor wells were measured from the top of the casing for depth to groundwater, depth to LNAPL, LNAPL thickness, and corrected groundwater elevations prior to sampling (Table 4). Four wells were found to have measurable free product hydrocarbons. They are GMW-1, GMW-3B, GMW-5, and GMW-9 (Table 4). Groundwater gradient and elevations are depicted in Figure Q4. LNAPL thicknesses are depicted in Figure Q5.

Table 4. 4th Quarter 1999 LNAPL and Groundwater Elevations
Westgate Subdivision - Hobbs, NM

MONITORING WELL	TOP OF CASING (feet)	DATE	DEPTH TO GROUNDWATER (feet)	DEPTH TO LNAPL (feet)	LNAPL THICKNESS X 0.73 (feet)	CORRECTED GROUNDWATER (feet)
GMW-1	3647.84	12/20/99	69.26	68.14	0.82	3579.40
GMW-2	3648.51	12/20/99	68.15	ND	0.00	3580.36
GMW-3B	3648.26	12/20/99	69.00	68.18	0.60	3579.86
GMW-4	3647.79	12/20/99	67.94	ND	0.00	3579.85
GMW-5	3648.41	12/20/99	70.90	68.99	1.39	3578.90
GMW-6	3648.22	12/20/99	68.89	ND	0.00	3579.33
GMW-7	3644.98	12/20/99	66.40	ND	0.00	3578.58
GMW-8	3645.66	12/20/99	67.01	ND	0.00	3578.65
GMW-9	3646.27	12/20/99	66.90	66.86	0.03	3579.40
GMW-10	3645.65	12/20/99	65.09	ND	0.00	3580.56
GMW-11	3644.07	12/20/99	64.39	ND	0.00	3579.68
TMW-1	3646.18	12/20/99	67.87	ND	0.00	3578.31
TMW-2	3643.94	12/20/99	65.99	ND	0.00	3577.95
TMW-3	3643.50	12/20/99	65.56	ND	0.00	3577.94
TMW-4	3643.69	12/20/99	66.46	ND	0.00	3577.23
TMW-5	3643.35	12/20/99	66.28	ND	0.00	3577.07

ND = Not Detected in Monitor Well

3.2 Free Product Recovery

Due to free product viscosity, the downhole passive hydrocarbon skimmers in monitor wells GMW-1, GMW-3B, and GMW-5 were removed and replaced with passive absorbing skimmers in November 1999. GMW-9 already had an absorbing skimmer in place since the third quarter of 1999.

Free product was removed regularly from each monitor well (Table 5). All recovered fluids were transported to the Sundance Services NMOCD approved disposal facility near Eunice, NM for recycling and disposal.

Table 5. 4th Quarter 1999 Product Recovery Report

Location	10/07/1999	10/11/1999	10/14/1999	10/18/1999	10/21/1999	10/28/99	11/02/1999	12/02/1999	12/03/1999	12/07/1999	12/08/1999	12/09/1999	12/13/1999	12/16/1999	12/17/1999	12/21/1999	12/27/1999	12/30/1999	4th Quarter Totals (gallons)	Year-to-Date Totals (gallons)
GMW-1	0	0	0	1 qt.	0	0	0	—	1 gal.	1 gal.	0	—	1 gal.	0	0	0	0	0	3.25	4.55
GMW-3b	0	1 qt.	2 qt.	0.05 gal.	0	0	0	—	1 gal.	1 gal.	0	1 gal.	—	0	0	0	0	0	3.75	5.25
GMW-5	0	1 gal.	1 gal.	1 qt.	0	0.5 gal.	0	2 gal.	—	2 gal.	1 gal.	1 gal.	1 gal.	1 gal.	1 gal.	1 gal.	1 gal.	0.05 gal.	13.80	19.30
GMW-9	0	—	—	—	0	0	0	—	—	—	0	—	—	0	0	0	—	0	0.00	0.00
Totals	0	1.25 gal.	1.5 gal.	0.55 gal.	0	0.5 gal.	0	2 gal.	2 gal.	4 gal.	1 gal.	2 gal.	2 gal.	1 gal.	1 gal.	1 gal.	1 gal.	0.05 gal.	20.80	29.10

3.3 Purging and Sampling Activities

All sixteen monitor wells were measured from the top of the casing for depth to groundwater, depth to LNAPL, LNAPL thickness, and corrected groundwater elevations prior to sampling (Table 4). All monitor wells were then purged and sampled on December 20, 1999 (Table 4). All purged fluids were drummed, transported, and disposed of at Sundance Services NMOCD approved disposal facility near Eunice, NM for recycling and disposal.

The groundwater samples were sent to Trace Analysis Laboratories in Lubbock, TX to be analyzed for BTEX (USEPA Method 8260-B) and PAHs (USEPA Method 8270C). The results are summarized in Table 3. Laboratory analytical results, QA/QC, and chain-of-custody reports for the groundwater samples collected and analyzed are included in Appendix II.

Benzene was detected in GMW-1 and GMW-5 at concentrations of 22 ug/L and 24 ug/L, respectively. Benzene was not detected in any other monitor wells. Toluene was detected in GMW-1 at a concentration of 28 ug/L and in GMW-5 at a concentration of 28 ug/L. Ethylbenzene was detected in five samples (GMW-1, GMW-3B, GMW-5, GMW-9, and TMW-5) at concentrations ranging from 254 ug/L to 19.69 ug/L. Xylenes were detected in five of the samples (GMW-1, GMW-3B, GMW-5, GMW-8, and GMW-9) at concentrations ranging from 1,969 ug/L to 2.6 ug/L (Table 3). Figure Q6 is an isopleth map of Total BTEX concentrations detected in the groundwater samples.

Naphthalene was detected at concentrations ranging from 0.008 ug/L to 0.138 ug/L in samples collected from GMW-1, GMW-3B, GMW-5, and GMW-9. Phenanthrene was detected in the samples collected from GMW-1, GMW-3B, and GMW-5 at concentrations of 0.006 mg/L, 0.006 mg/L, and 0.042 mg/L, respectively (Table 3).

4.0 CONCLUSION

All monitor wells will be sampled quarterly for four quarters in year 2000. Groundwater samples will be analyzed for BTEX using USEPA Method 8260-B for each of four quarters and PAHs annually using USEPA Method 8270-C. Based on sample results for one year (four quarters), sampling frequency will be reviewed and may be revised.

Sampling will be discontinued when eight quarters of sample results indicate analyte concentrations are below New Mexico Water Quality Control Commission, Title 20, Chapter 6, part 2 (20 NMAC 6.2 Standards). If no 20 NMAC 6.2 standard is available for a detected analyte, USEPA standards will be used. Free product recovery will continue until no free product is recovered for an extended period of time.

Sample results will be submitted to NMOCD annually on April 1. All recovered fluids will be recycled and disposed of at an NMOCD approved facility.

Per discussions with the NMOCD in early 2000, it was agreed that Shell would not be required to sample any monitor wells that have free product until such time that free product is no longer detected in the wells. These wells would only be sampled quarterly when no measurable free product exists.

APPENDIX I

TRACE ANALYSIS, INC.
Laboratory Results
3rd Quarter 1999

Westgate Subdivision
Grimes Battery & Tasker Road

April 2000

Shell Exploration & Production Company
Houston, Texas

Prepared by:
BBC International, Inc.

TRACE ANALYSIS, INC.

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Analytical and Quality Control Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/16/99
Page: #1

Sampling Program: Shell Westgate

Order ID Number: 99092704

Sample Description: Shell
Sample location: Hobbs, New Mexico

Enclosed are the Analytical Results and Quality Control Data Reports for the following samples submitted to TraceAnalysis, Inc. for analysis:

Sample Number	Sample Description	Matrix	Date Taken	Time Taken	Date Received
T132324	GMW-2	Water	9/24/99	11:00	9/25/99
T132325	GMW-4	Water	9/24/99	11:30	9/25/99
T132326	GMW-7	Water	9/24/99	12:00	9/25/99
T132327	GMW-8	Water	9/24/99	12:30	9/25/99
T132328	GMW-10	Water	9/24/99	1:00	9/25/99
T132329	GMW-11	Water	9/24/99	1:30	9/25/99
T132330	TMW-1	Water	9/24/99	2:00	9/25/99
T132331	TMW-2	Water	9/24/99	2:30	9/25/99
T132332	TMW-3	Water	9/24/99	3:00	9/25/99
T132333	TMW-4	Water	9/24/99	3:30	9/25/99
T132334	TMW-5	Water	9/24/99	4:00	9/25/99
T132335	Trip Blank	Water			9/25/99

This Quality Control Report is generated on a batch basis. All information contained in this report is for the analytical batch (es) in which your sample (s) were analyzed.

This report shall not be reproduced except in its entirety, without written approval of the laboratory.

These results represent only the samples received in the laboratory.

This report consists of a total of 19 pages.

All data meets quality control criteria with the following exceptions:



Dr. Blair Leftwich
Director

Analytical Results Report

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/16/99
Page: #2

Field Code: GMW-2

Order ID Number: 99092704
Sample Number: T132324

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Ethylbenzene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Toluene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
m,p-xylene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
o-xylene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Surr. Dibromofluoromethane		110	%	S 8260B	09/28/99	09/28/99	JG		NV9289	84-128
Surr. Toluene-d8		108	%	S 8260B	09/28/99	09/28/99	JG		NV9289	93-108
Surr. 4-Bromofluorobenzene		92	%	S 8260B	09/28/99	09/28/99	JG		NV9289	75-110
Naphthalene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	B3160	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Acenaphthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Fluorene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Phenanthrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Chrysene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Surr. Nitrobenzene-d5		80	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	35-114
Surr. 2-Fluorobiphenyl		77	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	43-116
Surr. Terphenyl-d14		41	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	33-141

Analytical Results Report

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/16/99
Page: #3

Field Code: GMW-4

Order ID Number: 99092704
Sample Number: T132325

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Ethylbenzene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Toluene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
m,p-xylene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
o-xylene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Surr. Dibromofluoromethane		111	%	S 8260B	09/28/99	09/28/99	JG		NV9289	84-128
Surr. Toluene-d8		108	%	S 8260B	09/28/99	09/28/99	JG		NV9289	93-108
Surr. 4-Bromofluorobenzene		91	%	S 8260B	09/28/99	09/28/99	JG		NV9289	75-110
Naphthalene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Acenaphthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Fluorene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Phenanthrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Chrysene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Surr. Nitrobenzene-d5		72	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	35-114
Surr. 2-Fluorobiphenyl		69	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	43-116
Surr. Terphenyl-d14		63	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	33-141

Analytical Results Report

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/16/99
Page: #4

Field Code: GMW-7

Order ID Number: 99092704
Sample Number: T132326

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Ethylbenzene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Toluene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
m,p-xylene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
o-xylene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Surr. Dibromofluoromethane		111	%	S 8260B	09/28/99	09/28/99	JG		NV9289	84-128
Surr. Toluene-d8		106	%	S 8260B	09/28/99	09/28/99	JG		NV9289	93-108
Surr. 4-Bromofluorobenzene		92	%	S 8260B	09/28/99	09/28/99	JG		NV9289	75-110
Naphthalene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Acenaphthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Fluorene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Phenanthrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Chrysene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Surr. Nitrobenzene-d5		78	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	35-114
Surr. 2-Fluorobiphenyl		73	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	43-116
Surr. Terphenyl-d14		67	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	33-141

Analytical Results Report

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/16/99

Page: #5

Field Code: GMW-8

Order ID Number: 99092704

Sample Number: T132327

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Ethylbenzene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Toluene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
m,p-xylene		2.3	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
o-xylene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Surr. Dibromofluoromethane		108	%	S 8260B	09/29/99	09/29/99	JG		NV9289	84-128
Surr. Toluene-d8		106	%	S 8260B	09/29/99	09/29/99	JG		NV9289	93-108
Surr. 4-Bromofluorobenzene		102	%	S 8260B	09/29/99	09/29/99	JG		NV9289	75-110
Naphthalene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Acenaphthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Fluorene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Phenanthrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Anthracene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Pyrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Chrysene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Surr. Nitrobenzene-d5		94	%	S 8270C	09/28/99	09/30/99	MA	2520	3160	35-114
Surr. 2-Fluorobiphenyl		84	%	S 8270C	09/28/99	09/30/99	MA	2520	3160	43-116
Surr. Terphenyl-d14		77	%	S 8270C	09/28/99	09/30/99	MA	2520	3160	33-141

Analytical Results Report

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/16/99
Page: #6

Field Code: GMW-10

Order ID Number: 99092704
Sample Number: T132328

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep	QC Batch	Reporting Limit
Benzene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Ethylbenzene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Toluene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
m,p-xylene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
o-xylene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Surr. Dibromofluoromethane		108	%	S 8260B	09/28/99	09/28/99	JG		NV9289	84-128
Surr. Toluene-d8		108	%	S 8260B	09/28/99	09/28/99	JG		NV9289	93-108
Surr. 4-Bromofluorobenzene		90	%	S 8260B	09/28/99	09/28/99	JG		NV9289	75-110
Naphthalene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Acenaphthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Fluorene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Phenanthrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Chrysene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Surr. Nitrobenzene-d5		69	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	35-114
Surr. 2-Fluorobiphenyl		70	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	43-116
Surr. Terphenyl-d14		69	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	33-141

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Field Code: GMW-11

Order ID Number: 99092704
Sample Number: T132329

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Ethylbenzene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Toluene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
m,p-xylene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
o-xylene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Surr. Dibromofluoromethane		110	%	S 8260B	09/28/99	09/28/99	JG		NV9289	84-128
Surr. Toluene-d8		108	%	S 8260B	09/28/99	09/28/99	JG		NV9289	93-108
Surr. 4-Bromofluorobenzene		92	%	S 8260B	09/28/99	09/28/99	JG		NV9289	75-110
Naphthalene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Acenaphthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Fluorene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Phenanthrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Chrysene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Surr. Nitrobenzene-d5		82	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	35-114
Surr. 2-Fluorobiphenyl		73	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	43-116
Surr. Terphenyl-d14		62	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	33-141

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Field Code: TMW-1

Order ID Number: 99092704
Sample Number: T132330

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Ethylbenzene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Toluene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
m,p-xylene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
o-xylene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Surr. Dibromofluoromethane		110	%	S 8260B	09/28/99	09/28/99	JG		NV9289	84-128
Surr. Toluene-d8		108	%	S 8260B	09/28/99	09/28/99	JG		NV9289	93-108
Surr. 4-Bromofluorobenzene		98	%	S 8260B	09/28/99	09/28/99	JG		NV9289	75-110
Naphthalene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Acenaphthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Fluorene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Phenanthrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Anthracene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Pyrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Chrysene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Surr. Nitrobenzene-d5		83	%	S 8270C	09/28/99	09/30/99	MA	2520	3160	35-114
Surr. 2-Fluorobiphenyl		76	%	S 8270C	09/28/99	09/30/99	MA	2520	3160	43-116
Surr. Terphenyl-d14		75	%	S 8270C	09/28/99	09/30/99	MA	2520	3160	33-141

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Field Code: TMW-2

Order ID Number: 99092704
Sample Number: T132331

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Ethylbenzene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Toluene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
m,p-xylene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
o-xylene		<2	ug/L	S 8260B	09/28/99	09/28/99	JG		NV9289	2
Surr. Dibromofluoromethane		104	%	S 8260B	09/28/99	09/28/99	JG		NV9289	84-128
Surr. Toluene-d8		109	%	S 8260B	09/28/99	09/28/99	JG		NV9289	93-108
Surr. 4-Bromofluorobenzene		94	%	S 8260B	09/28/99	09/28/99	JG		NV9289	75-110
Naphthalene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Acenaphthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Fluorene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Phenanthrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Chrysene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Surr. Nitrobenzene-d5		71	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	35-114
Surr. 2-Fluorobiphenyl		63	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	43-116
Surr. Terphenyl-d14		49	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	33-141

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Field Code: TMW-3

Order ID Number: 99092704
Sample Number: T132332

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep	QC Batch	Reporting Limit
Benzene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Ethylbenzene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Toluene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
m,p-xylene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
o-xylene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Surr. Dibromofluoromethane		107	%	S 8260B	09/29/99	09/29/99	JG		NV9289	84-128
Surr. Toluene-d8		107	%	S 8260B	09/29/99	09/29/99	JG		NV9289	93-108
Surr. 4-Bromofluorobenzene		93	%	S 8260B	09/29/99	09/29/99	JG		NV9289	75-110
Naphthalene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Acenaphthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Fluorene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Phenanthrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Chrysene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	09/28/99	09/29/99	MA	2520	B3160	0.005
Surr. Nitrobenzene-d5		76	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	35-114
Surr. 2-Fluorobiphenyl		73	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	43-116
Surr. Terphenyl-d14		71	%	S 8270C	09/28/99	09/29/99	MA	2520	B3160	33-141

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Field Code: TMW-4

Order ID Number: 99092704
Sample Number: T132333

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Ethylbenzene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Toluene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
m,p-xylene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
o-xylene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Surr. Dibromofluoromethane		110	%	S 8260B	09/29/99	09/29/99	JG		NV9289	84-128
Surr. Toluene-d8		108	%	S 8260B	09/29/99	09/29/99	JG		NV9289	93-108
Surr. 4-Bromofluorobenzene		94	%	S 8260B	09/29/99	09/29/99	JG		NV9289	75-110
Naphthalene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Acenaphthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Fluorene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Phenanthrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Anthracene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Pyrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Chrysene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Surr. Nitrobenzene-d5		80	%	S 8270C	09/28/99	09/30/99	MA	2520	3160	35-114
Surr. 2-Fluorobiphenyl		72	%	S 8270C	09/28/99	09/30/99	MA	2520	3160	43-116
Surr. Terphenyl-d14		73	%	S 8270C	09/28/99	09/30/99	MA	2520	3160	33-141

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Field Code: TMW-5

Order ID Number: 99092704
Sample Number: T132334

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Ethylbenzene		30	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Toluene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
m,p-xylene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
o-xylene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Surr. Dibromofluoromethane		108	%	S 8260B	09/29/99	09/29/99	JG		NV9289	84-128
Surr. Toluene-d8		105	%	S 8260B	09/29/99	09/29/99	JG		NV9289	93-108
Surr. 4-Bromofluorobenzene		101	%	S 8260B	09/29/99	09/29/99	JG		NV9289	75-110
Naphthalene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Acenaphthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Fluorene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Phenanthrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Anthracene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Pyrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Chrysene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	09/28/99	09/30/99	MA	2520	3160	0.005
Surr. Nitrobenzene-d5		98	%	S 8270C	09/28/99	09/30/99	MA	2520	3160	35-114
Surr. 2-Fluorobiphenyl		85	%	S 8270C	09/28/99	09/30/99	MA	2520	3160	43-116
Surr. Terphenyl-d14		72	%	S 8270C	09/28/99	09/30/99	MA	2520	3160	33-141

Analytical Results Report

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/16/99
Page: #13

Field Code: Trip Blank

Order ID Number: 99092704
Sample Number: T132335

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Ethylbenzene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Toluene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
m,p-xylene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
o-xylene		<2	ug/L	S 8260B	09/29/99	09/29/99	JG		NV9289	2
Surr. Dibromofluoromethane		103	%	S 8260B	09/29/99	09/29/99	JG		NV9289	84-128
Surr. Toluene-d8		107	%	S 8260B	09/29/99	09/29/99	JG		NV9289	93-108
Surr. 4-Bromofluorobenzene		94	%	S 8260B	09/29/99	09/29/99	JG		NV9289	75-110

Quality Control Report METHOD BLANKS

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/16/99
Page: #14

Order ID Number: 99092704

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Blank Result	Units	Reporting Limit	Date Analyzed	Prep Batch	QC Batch
Benzene		<2	ug/L	2	09/28/99		NV9289
Ethylbenzene		<2	ug/L	2	09/28/99		NV9289
Toluene		<2	ug/L	2	09/28/99		NV9289
m,p-xylene		<2	ug/L	2	09/28/99		NV9289
o-xylene		<2	ug/L	2	09/28/99		NV9289
Surr. Dibromofluoromethane		112	%	84-128	09/28/99		NV9289
Surr. Toluene-d8		109	%	93-108	09/28/99		NV9289
Surr. 4-Bromofluorobenzene		92	%	75-110	09/28/99		NV9289
Benzene		<2	ug/L	2	09/29/99		NV9299
Ethylbenzene		<2	ug/L	2	09/29/99		NV9299
Toluene		<2	ug/L	2	09/29/99		NV9299
m,p-xylene		<2	ug/L	2	09/29/99		NV9299
o-xylene		<2	ug/L	2	09/29/99		NV9299
Surr. Dibromofluoromethane		111	%	84-128	09/29/99		NV9299
Surr. Toluene-d8		107	%	93-108	09/29/99		NV9299
Surr. 4-Bromofluorobenzene		92	%	75-110	09/29/99		NV9299
Naphthalene		<0.005	mg/L	0.005	09/30/99	2520	3160
Acenaphthylene		<0.005	mg/L	0.005	09/30/99	2520	3160
Acenaphthene		<0.005	mg/L	0.005	09/30/99	2520	3160
Fluorene		<0.005	mg/L	0.005	09/30/99	2520	3160
Phenanthrene		<0.005	mg/L	0.005	09/30/99	2520	3160
Anthracene		<0.005	mg/L	0.005	09/30/99	2520	3160
Fluoranthene		<0.005	mg/L	0.005	09/30/99	2520	3160
Pyrene		<0.005	mg/L	0.005	09/30/99	2520	3160
Benzo[a]anthracene		<0.005	mg/L	0.005	09/30/99	2520	3160
Chrysene		<0.005	mg/L	0.005	09/30/99	2520	3160
Benzo[b]fluoranthene		<0.005	mg/L	0.005	09/30/99	2520	3160
Benzo[k]fluoranthene		<0.005	mg/L	0.005	09/30/99	2520	3160
Benzo[a]pyrene		<0.005	mg/L	0.005	09/30/99	2520	3160
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	0.005	09/30/99	2520	3160
Dibenz[a,h]anthracene		<0.005	mg/L	0.005	09/30/99	2520	3160
Benzo[g,h,i]perylene		<0.005	mg/L	0.005	09/30/99	2520	3160
Surr. Nitrobenzene-d5		84	%	35-114	09/30/99	2520	3160
Surr. 2-Fluorobiphenyl		74	%	43-116	09/30/99	2520	3160
Surr. Terphenyl-d14		61	%	33-141	09/30/99	2520	3160

Quality Control Report METHOD BLANKS

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/16/99
Page: #15

Order ID Number: 99092704

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Blank Result	Units	Reporting Limit	Date Analyzed	Prep Batch	QC Batch
Naphthalene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Acenaphthylene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Acenaphthene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Fluorene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Phenanthrene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Anthracene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Fluoranthene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Pyrene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Benzo[a]anthracene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Chrysene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Benzo[b]fluoranthene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Benzo[k]fluoranthene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Benzo[a]pyrene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Dibenz[a,h]anthracene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Benzo[g,h,i]perylene		<0.005	mg/L	0.005	09/29/99	2520	B3160
Surr. Nitrobenzene-d5		77	%	35-114	09/29/99	2520	B3160
Surr. 2-Fluorobiphenyl		76	%	43-116	09/29/99	2520	B3160
Surr. Terphenyl-d14		76	%	33-141	09/29/99	2520	B3160

Quality Control Report

Continuing Calibration Verification Standard

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/16/99
Page: #16

Order ID Number: 99092704

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	CCVS TRUE Concentration	Units	CCVS Found Concentration	CCVS Percent Recovery	Date Analyzed	QC Batch #
Vinyl chloride		100	ug/L	86	86	09/28/99	NV9289
1,1-Dichloroethene		100	ug/L	91	91	09/28/99	NV9289
Chloroform		100	ug/L	90	90	09/28/99	NV9289
1,2-Dichloropropane		100	ug/L	97	97	09/28/99	NV9289
Toluene		100	ug/L	97	97	09/28/99	NV9289
Chlorobenzene		100	ug/L	103	103	09/28/99	NV9289
Ethylbenzene		100	ug/L	109	109	09/28/99	NV9289
Surr. Dibromofluoromethane		100	ug/L	98	98	09/28/99	NV9289
Surr. Toluene-d8		100	ug/L	106	106	09/28/99	NV9289
Surr. 4-Bromofluorobenzene		100	ug/L	101	101	09/28/99	NV9289
Vinyl chloride		100	ug/L	87	87	09/29/99	NV9299
1,1-Dichloroethene		100	ug/L	94	94	09/29/99	NV9299
Chloroform		100	ug/L	90	90	09/29/99	NV9299
1,2-Dichloropropane		100	ug/L	100	100	09/29/99	NV9299
Toluene		100	ug/L	98	98	09/29/99	NV9299
Chlorobenzene		100	ug/L	104	104	09/29/99	NV9299
Ethylbenzene		100	ug/L	110	110	09/29/99	NV9299
Surr. Dibromofluoromethane		100	ug/L	97	97	09/29/99	NV9299
Surr. Toluene-d8		100	ug/L	108	108	09/29/99	NV9299
Surr. 4-Bromofluorobenzene		100	ug/L	101	101	09/29/99	NV9299
Naphthalene		60	mg/L	59.85	100	09/30/99	3160
Acenaphthylene		60	mg/L	57.11	95	09/30/99	3160
Acenaphthene		60	mg/L	57.03	95	09/30/99	3160
Fluorene		60	mg/L	60.62	101	09/30/99	3160
Phenanthrene		60	mg/L	60.83	101	09/30/99	3160
Anthracene		60	mg/L	63.07	105	09/30/99	3160
Fluoranthene		60	mg/L	71.66	119	09/30/99	3160
Pyrene		60	mg/L	48.92	82	09/30/99	3160
Benzo[a]anthracene		60	mg/L	59.25	99	09/30/99	3160
Chrysene		60	mg/L	60.91	102	09/30/99	3160
Benzo[b]fluoranthene		60	mg/L	63.16	105	09/30/99	3160
Benzo[k]fluoranthene		60	mg/L	71.85	120	09/30/99	3160
Benzo[a]pyrene		60	mg/L	64.48	107	09/30/99	3160
Indeno[1,2,3-cd]pyrene		60	mg/L	58.60	98	09/30/99	3160

Quality Control Report Continuing Calibration Verification Standard

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland

Date: 11/16/99
Page: #17

Order ID Number: 99092704

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	CCVS TRUE Concentration	Units	CCVS Found Concentration	CCVS Percent Recovery	Date Analyzed	QC Batch #
Dibenz[a,h]anthracene		60	mg/L	55.85	93	09/30/99	3160
Benzo[g,h,i]perylene		60	mg/L	60.47	101	09/30/99	3160
Surr. Nitrobenzene-d5		60	mg/L	64.52	108	09/30/99	3160
Surr. 2-Fluorobiphenyl		60	mg/L	60.89	101	09/30/99	3160
Surr. Terphenyl-d14		60	mg/L	50.04	83	09/30/99	3160
Naphthalene		60	mg/L	60.05	100	09/28/99	B3160
Acenaphthylene		60	mg/L	61.51	103	09/28/99	B3160
Acenaphthene		60	mg/L	61.05	102	09/28/99	B3160
Fluorene		60	mg/L	62.24	104	09/28/99	B3160
Phenanthrene		60	mg/L	60.36	101	09/28/99	B3160
Anthracene		60	mg/L	58.95	98	09/28/99	B3160
Fluoranthene		60	mg/L	58.28	97	09/28/99	B3160
Pyrene		60	mg/L	60.93	102	09/28/99	B3160
Benzo[a]anthracene		60	mg/L	60.14	100	09/28/99	B3160
Chrysene		60	mg/L	60.54	101	09/28/99	B3160
Benzo[b]fluoranthene		60	mg/L	61.73	103	09/28/99	B3160
Benzo[k]fluoranthene		60	mg/L	63.55	106	09/28/99	B3160
Benzo[a]pyrene		60	mg/L	61.51	103	09/28/99	B3160
Indeno[1,2,3-cd]pyrene		60	mg/L	60.89	101	09/28/99	B3160
Dibenz[a,h]anthracene		60	mg/L	61.96	103	09/28/99	B3160
Benzo[g,h,i]perylene		60	mg/L	60.31	101	09/28/99	B3160
Surr. Nitrobenzene-d5		60	mg/L	62.53	104	09/28/99	B3160
Surr. 2-Fluorobiphenyl		60	mg/L	60.9	102	09/28/99	B3160
Surr. Terphenyl-d14		60	mg/L	61.54	103	09/28/99	B3160

Quality Control Report

Matrix Spike and Matrix Duplicate Spike

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/16/99
Page: #18

Order ID Number: 99092704

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Units	Sample Result	Spike Amount Added	Matrix Spike Result	MSD Percent Recovery	Duplicate		MSD Percent Recovery	MS/MSD RPD	Date Analyzed	QC Batch #
							Spike Amount Added	MSD Result				
1,1-Dichloroethene		ug/L	<2	100	98	98	100	99	99	1	09/28/99	NV9289
Benzene		ug/L	<2	100	93	93	100	93	93	0	09/28/99	NV9289
Trichloroethene		ug/L	<2	100	90	90	100	91	91	1	09/28/99	NV9289
Toluene		ug/L	<2	100	92	95	100	93	93	1	09/28/99	NV9289
Chlorobenzene		ug/L	<2	100	102	102	100	104	104	2	09/28/99	NV9289
Dibromofluoromethane		ug/L	<2	100	107	107	100	108	108	1	09/28/99	NV9289
Toluene-d8		ug/L	<2	100	107	107	100	106	106	1	09/28/99	NV9289
4-Bromofluorobenzene		ug/L	<2	100	91	91	100	90	90	1	09/28/99	NV9289
1,1-Dichloroethene		ug/L	<2	100	98	98	100	99	99	1	09/28/99	NV9289
Benzene		ug/L	<2	100	93	93	100	94	94	1	09/29/99	NV9299
Trichloroethene		ug/L	<2	100	91	91	100	91	91	0	09/29/99	NV9299
Toluene		ug/L	<2	100	91	91	100	93	93	2	09/29/99	NV9299
Chlorobenzene		ug/L	<2	100	101	101	100	102	102	1	09/29/99	NV9299
Dibromofluoromethane		ug/L	<2	100	102	102	100	105	105	3	09/29/99	NV9299
Toluene-d8		ug/L	<2	100	105	105	100	104	104	1	09/29/99	NV9299
4-Bromofluorobenzene		ug/L	<2	100	91	91	100	90	90	1	09/29/99	NV9299
Naphthalene		mg/L	<0.005	80	53.83	67	80	47.69	60	12	09/30/99	3160
Acenaphthylene		mg/L	<0.005	80	59.26	74	80	54.41	68	9	09/30/99	3160
Acenaphthene		mg/L	<0.005	80	57.79	72	80	52.49	66	10	09/30/99	3160
Fluorene		mg/L	<0.005	80	65.72	82	80	61.17	76	7	09/30/99	3160
Phenanthrene		mg/L	<0.005	80	66.72	83	80	62.13	78	7	09/30/99	3160
Anthracene		mg/L	<0.005	80	64.66	81	80	62.85	79	3	09/30/99	3160
Fluoranthene		mg/L	<0.005	80	78.20	98	80	80.53	101	3	09/30/99	3160
Pyrene		mg/L	<0.005	80	56.99	71	80	56.88	71	0	09/30/99	3160
Benzo[a]anthracene		mg/L	<0.005	80	63.30	79	80	61.41	77	3	09/30/99	3160
Chrysene		mg/L	<0.005	80	37.57	47	80	36.02	45	4	09/30/99	3160
Benzo[b]fluoranthene		mg/L	<0.005	80	66.79	83	80	63.76	80	5	09/30/99	3160
Benzo[k]fluoranthene		mg/L	<0.005	80	73.72	92	80	69.38	87	6	09/30/99	3160
Benzo[a]pyrene		mg/L	<0.005	80	71.83	90	80	69.66	87	3	09/30/99	3160
Indeno[1,2,3-cd]pyrene		mg/L	<0.005	80	65.06	81	80	63.76	80	2	09/30/99	3160
Dibenz[a,h]anthracene		mg/L	<0.005	80	39.59	49	80	38.81	49	2	09/30/99	3160
Benzo[g,h,i]perylene		mg/L	<0.005	80	64.84	81	80	63.99	80	1	09/30/99	3160
Nitrobenzene-d5		mg/L	<0.005	80	68.71	86	80	60.39	75	13	09/30/99	3160
Fluorobiphenyl		mg/L	<0.005	80	62.71	78	80	56.71	71	10	09/30/99	3160
Periphenyl-d14		mg/L	<0.005	80	57.02	71	80	56.45	71	1	09/30/99	3160

Quality Control Report

Matrix Spike and Matrix Duplicate Spike

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland

Date: 11/16/99
Page: #19

Order ID Number: 99092704

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Units	Sample Result	Spike Amount Added	Matrix Spike Result	MSD Percent Recovery	Duplicate		MSD Percent Recovery	MS/MSD RPD	Date Analyzed	QC Batch #
							Spike Amount Added	MSD Result				
Naphthalene		mg/L	<0.005	80	53.62	67	80	47.77	60	12	09/28/99	B3160
Acenaphthylene		mg/L	<0.005	80	64.32	80	80	58.00	73	10	09/28/99	B3160
Acenaphthene		mg/L	<0.005	80	61.59	77	80	56.34	70	9	09/28/99	B3160
Fluorene		mg/L	<0.005	80	67.27	84	80	60.44	76	11	09/28/99	B3160
Phenanthrene		mg/L	<0.005	80	66.41	83	80	63.78	80	4	09/28/99	B3160
Anthracene		mg/L	<0.005	80	65.37	82	80	63.80	80	2	09/28/99	B3160
Fluoranthene		mg/L	<0.005	80	61.43	77	80	67.40	84	9	09/28/99	B3160
Pyrene		mg/L	<0.005	80	67.77	85	80	62.30	78	8	09/28/99	B3160
Benzo[a]anthracene		mg/L	<0.005	80	64.13	80	80	61.05	76	5	09/28/99	B3160
Chrysene		mg/L	<0.005	80	37.92	47	80	35.66	45	6	09/28/99	B3160
Benzo[b]fluoranthene		mg/L	<0.005	80	61.51	77	80	57.39	72	7	09/28/99	B3160
Benzo[k]fluoranthene		mg/L	<0.005	80	61.75	77	80	62.53	78	1	09/28/99	B3160
Benzo[a]pyrene		mg/L	<0.005	80	65.33	82	80	63.80	80	2	09/28/99	B3160
Indeno[1,2,3-cd]pyrene		mg/L	<0.005	80	69.06	86	80	64.45	81	7	09/28/99	B3160
Dibenz[a,h]anthracene		mg/L	<0.005	80	44.54	56	80	41.88	52	6	09/28/99	B3160
Benzo[g,h,i]perylene		mg/L	<0.005	80	68.58	86	80	64.56	81	6	09/28/99	B3160
Nitrobenzene-d5		mg/L	<0.005	80	63.86	80	80	56.69	71	12	09/28/99	B3160
2-Fluorobiphenyl		mg/L	<0.005	80	61.83	77	80	57.25	72	8	09/28/99	B3160
Terphenyl-d14		mg/L	<0.005	80	65.33	82	80	61.45	77	6	09/28/99	B3160

132324-25

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Trace Analysis, Inc.

4725 Ripley Dr., Ste A
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Company Name: BBC International, Inc. Phone #: (505) 397-6388
Address: (Street, City, Zip) Fax #:
1324 W. Macland Hobbs, NM 88240 (505) 397-0397
Contact Person: Cliff P. Brunson
Invoice to: Shell E & P Company Attn: Wayne Hamilton
(If different from above) Project Name: Shell Westgate
Project #: Sampler Signature: Cliff P. Brunson
Project Location: Hobbs, NM

LAB # (LAB USE ONLY)	FIELD CODE	# CONTAINERS	Volume/Amount	MATRIX				PRESERVATIVE METHOD				SAMPLING	
				WATER	SOIL	AIR	SLUDGE	HCL	HNO3	ICE	NONE	DATE	TIME
132324	GMW-2	2	VOA	✓							✓	9/24/99	11:00
	GMW-2	1	11:10	✓						✓		9/24/99	"
25	GMW-4	2	VOA	✓							✓	9/24/99	11:30
	GMW-4	1	11:10	✓						✓		9/24/99	"
26	GMW-7	2	VOA	✓							✓	9/24/99	12:00
	GMW-7	1	11:10	✓						✓		9/24/99	"
27	GMW-8	2	VOA	✓							✓	9/24/99	12:30
	GMW-8	1	11:10	✓						✓		9/24/99	"
28	GMW-10	2	VOA	✓							✓	9/24/99	1:00
	GMW-10	1	11:10	✓						✓		9/24/99	"
29	GMW-11	2	VOA	✓							✓	9/24/99	1:30

Relinquished by: Cliff P. Brunson Date: 9/24/99 Time: 5:00
Relinquished by: Wayne Hamilton Date: 9/24/99 Time: 11:30
Relinquished by: Wayne Hamilton Date: 9/24/99 Time: 11:30

CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

LAB Order ID # 99092404

ANALYSIS REQUEST

(Circle or Specify Method No.)

8260B + Bloy	TPH 418, 1/TX1005	PAH 8270C	Total Metals Ag As Ba Cd Cr Pb Se Hg 6010B/200.7	TCLP Metals Ag As Ba Cd Cr Pb Se Hg	TCLP Volatiles	TCLP Semi Volatiles	TCLP Pesticides	RCI	GC-MS Vol. 8260B/624	GC/MS Semi. Vol. 8270C/625	PCB's 8082/608	Pesticides 8081A/608	BOD, TSS, pH	Turn Around Time if different from standard
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	

LAB USE ONLY

Intact Y / N
Headspace Y / N
Temp 14 °
Log-in Review
REMARKS: Agreed upon turnaround
10/5

Submittal of samples constitutes agreement to Terms and Conditions listed on reverse side of C.O.C.

ORIGINAL COPY

Carrier # Cambria

6701 Aberdeen Avenue, Ste. 9
Lubbock, Texas 79424
Tel (806) 794-1296
Fax (806) 794-1298
1 (800) 378-1296

TraceAnalysis, Inc.

4725 Ripley Dr., Ste A
El Paso, Texas 79922-1028
Tel (915) 585-3443
Fax (915) 585-4944
1 (888) 588-3443

CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

LAB Order ID #

Company Name:

Phone #:

Address: (Street, City, Zip)

Fax #:

Contact Person:

Invoice to:
(If different from above)

Project #:

Project Name:

Project Location:

Sampler Signature:

[illegible]

Relinquished by:

Date: _____ Time: _____

Received by:

Date: _____ Time: _____

Relinquished by:

Date: _____ Time: _____

Received by:

Date: _____ Time: _____

Relinquished by:

Date: _____ Time: _____

Received at 1

Date: _____ Time: _____

Received at Laboratory by: Dicki Windhner Date: 9-25-99 Time: 11:30

Submittal of samples constitutes agreement to Terms and Conditions listed on reverse side of C.O.C.

ORIGINAL COPY

Carrier #

95

ANALYSIS REQUEST

(Circle or Specify Method No.)

REMARKS:

LAB USE ONLY

Intact Y / N

Headspace Y / N

Temp 14 °

Log-in Review

TRACE ANALYSIS, INC.

6701 Aberdeen Avenue, Suite 9
4725 Ripley Avenue, Suite A

Lubbock, Texas 79424
El Paso, Texas 79922

800•378•1296
888•588•3443
E-Mail: lab@traceanalysis.com

806•794•1296
915•585•3443

FAX 806•794•1298
FAX 915•585•4944

Analytical and Quality Control Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

CORRECTED

Date: 3/21/00
Page: #1

Sampling Program: Shell Westgate

Order ID Number: 99093012

Sample Description: Shell
Sample location: Hobbs, New Mexico

Enclosed are the Analytical Results and Quality Control Data Reports for the following samples submitted to TraceAnalysis, Inc. for analysis:

Sample Number	Sample Description	Matrix	Date Taken	Time Taken	Date Received
132588	GMW-5	Water	9/28/99	7:30	9/30/99
T132589	GMW-6	Water	9/28/99	8:30	9/30/99
T132590	GMW-3B	Water	9/28/99	9:30	9/30/99
T132591	GMW-9	Water	9/28/99	10:30	9/30/99
T132592	GMW-1	Water	9/28/99	11:30	9/30/99
T132593	Trip Blank	Water	9/28/99	5:00	9/30/99

This Quality Control Report is generated on a batch basis. All information contained in this report is for the analytical batch (es) in which your sample (s) were analyzed.

This report shall not be reproduced except in its entirety, without written approval of the laboratory.

These results represent only the samples received in the laboratory.

This report consists of a total of 13 pages.

All data meets quality control criteria with the following exceptions:

- Corrections:
- 1). Sample 132592 was re-analyzed with a dilution in order to report the concentration within the standard curve.
 - 2). Reporting limit corrected for sample T132588, Method S8270C from 0.005 to 0.05 due to x10 dilution.



Dr. Blair Leftwich
Director

Analytical Results Report

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

CORRECTED

Date: 3/21/00
Page: #2

Field Code: GMW-5

Order ID Number: 99093012
Sample Number: T132588

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<50	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	50
Ethylbenzene		400	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	50
Toluene		<50	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	50
m,p-xylene		1,700	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	50
o-xylene		690	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	50
Surr. Dibromofluoromethane		96	%	S 8260B	10/04/99	10/04/99	JG	2910	3721	84-128
Surr. Toluene-d8		108	%	S 8260B	10/04/99	10/04/99	JG	2910	3721	93-108
Surr. 4-Bromofluorobenzene		93	%	S 8260B	10/04/99	10/04/99	JG	2910	3721	75-110
Naphthalene		0.595	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Acenaphthylene		<0.05	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Acenaphthene		<0.05	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Fluorene		<0.05	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Phenanthrene		0.271	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Anthracene		<0.05	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Fluoranthene		<0.05	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Pyrene		<0.05	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Benzo[a]anthracene		<0.05	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Chrysene		0.061	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Benzo[b]fluoranthene		<0.05	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Benzo[k]fluoranthene		<0.05	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Benzo[a]pyrene		<0.05	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Indeno[1,2,3-cd]pyrene		<0.05	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Dibenz[a,h]anthracene		<0.05	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Benzo[g,h,i]perylene		<0.05	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.05**
Surr. Nitrobenzene-d5		99	%	S 8270C	10/4/99	10/6/99	MA	2551	3201	35-114
Surr. 2-Fluorobiphenyl		131*	%	S 8270C	10/4/99	10/6/99	MA	2551	3201	43-116
Surr. Terphenyl-d14		104	%	S 8270C	10/4/99	10/6/99	MA	2551	3201	33-141

*Out of control limits due to coelution with matrix.

**Reporting limit corrected from 0.005 to 0.05 due to x10 dilution.

Analytical Results Report

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/11/99
Page: #3

Field Code: GMW-6

Order ID Number: 99093012
Sample Number: T132589

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S 8260B	10/01/99	10/01/99	JG	2910	3722	2
Ethylbenzene		<2	ug/L	S 8260B	10/01/99	10/01/99	JG	2910	3722	2
Toluene		<2	ug/L	S 8260B	10/01/99	10/01/99	JG	2910	3722	2
m,p-xylene		<2	ug/L	S 8260B	10/01/99	10/01/99	JG	2910	3722	2
o-xylene		<2	ug/L	S 8260B	10/01/99	10/01/99	JG	2910	3722	2
Surr. Dibromofluoromethane		113	%	S 8260B	10/01/99	10/01/99	JG	2910	3722	84-128
Surr. Toluene-d8		108	%	S 8260B	10/01/99	10/01/99	JG	2910	3722	93-108
Surr. 4-Bromofluorobenzene		89	%	S 8260B	10/01/99	10/01/99	JG	2910	3722	75-110
Naphthalene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Acenaphthene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Fluorene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Phenanthrene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Anthracene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Fluoranthene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Pyrene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Chrysene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Surr. Nitrobenzene-d5		80	%	S 8270C	10/4/99	10/6/99	MA	2551	3201	35-114
Surr. 2-Fluorobiphenyl		79	%	S 8270C	10/4/99	10/6/99	MA	2551	3201	43-116
Surr. Terphenyl-d14		70	%	S 8270C	10/4/99	10/6/99	MA	2551	3201	33-141

Analytical Results Report

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/11/99
Page: #4

Field Code: GMW-3B

Order ID Number: 99093012
Sample Number: T132590

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		8.7	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
Ethylbenzene		100	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
Toluene		<5	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
m,p-xylene		400	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
o-xylene		180	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
Surr. Dibromofluoromethane		103	%	S 8260B	10/04/99	10/04/99	JG	2910	3721	84-128
Surr. Toluene-d8		107	%	S 8260B	10/04/99	10/04/99	JG	2910	3721	93-108
Surr. 4-Bromofluorobenzene		98	%	S 8260B	10/04/99	10/04/99	JG	2910	3721	75-110
Naphthalene		0.081	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Acenaphthene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Fluorene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Phenanthrene		0.027	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Anthracene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Fluoranthene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Pyrene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Chrysene		0.006	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Surr. Nitrobenzene-d5		141*	%	S 8270C	10/4/99	10/6/99	MA	2551	3201	35-114
Surr. 2-Fluorobiphenyl		116	%	S 8270C	10/4/99	10/6/99	MA	2551	3201	43-116
Surr. Terphenyl-d14		67	%	S 8270C	10/4/99	10/6/99	MA	2551	3201	33-141

*Out of control limits due to coelution with matrix.

Analytical Results Report

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/11/99
Page: #5

Field Code: GMW-9

Order ID Number: 99093012
Sample Number: T132591

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<5	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
Ethylbenzene		60	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
Toluene		<5	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
m,p-xylene		110	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
o-xylene		75	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
Surr. Dibromofluoromethane		98	%	S 8260B	10/04/99	10/04/99	JG	2910	3721	84-128
Surr. Toluene-d8		106	%	S 8260B	10/04/99	10/04/99	JG	2910	3721	93-108
Surr. 4-Bromofluorobenzene		96	%	S 8260B	10/04/99	10/04/99	JG	2910	3721	75-110
Naphthalene		0.035	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Acenaphthene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Fluorene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Phenanthrene		0.017	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Anthracene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Fluoranthene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Pyrene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Chrysene		0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	10/4/99	10/6/99	MA	2551	3201	0.005
Surr. Nitrobenzene-d5		121*	%	S 8270C	10/4/99	10/6/99	MA	2551	3201	35-114
Surr. 2-Fluorobiphenyl		123*	%	S 8270C	10/4/99	10/6/99	MA	2551	3201	43-116
Surr. Terphenyl-d14		108	%	S 8270C	10/4/99	10/6/99	MA	2551	3201	33-141

*Out of control limits due to coelution with matrix.

Analytical Results Report

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/11/99
Page: #6

Field Code: GMW-1

Order ID Number: 99093012
Sample Number: T132592

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		31	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
Ethylbenzene		180	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
Toluene		9.3	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
m,p-xylene		470	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
o-xylene		250	ug/L	S 8260B	10/04/99	10/04/99	JG	2910	3721	5
Surr. Dibromofluoromethane		95	%	S 8260B	10/04/99	10/04/99	JG	2910	3721	84-128
Surr. Toluene-d8		107	%	S 8260B	10/04/99	10/04/99	JG	2910	3721	93-108
Surr. 4-Bromofluorobenzene		94	%	S 8260B	10/04/99	10/04/99	JG	2910	3721	75-110
Naphthalene	***	0.098	mg/L	S 8270C	10/04/99	11/03/99	MA	2551	3838	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Acenaphthene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Fluorene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Phenanthrene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Anthracene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Fluoranthene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Pyrene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Chrysene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	10/04/99	10/06/99	MA	2551	3201	0.005
Surr. Nitrobenzene-d5		135*	%	S 8270C	10/04/99	10/06/99	MA	2551	3838	35-114
Surr. 2-Fluorobiphenyl		117	%	S 8270C	10/04/99	10/06/99	MA	2551	3838	43-116
Surr. Terphenyl-d14		150*	%	S 8270C	10/04/99	10/06/99	MA	2551	3838	33-141

***Naphthalene was diluted & re-run. Naphthalene concentration above curve was 0.128 mg/L.

*Out of control limits due to coelution with matrix.

Analytical Results Report

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/11/99
Page: #7

Field Code: Trip Blank

Order ID Number: 99093012
Sample Number: T132593

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S 8260B	10/01/99	10/01/99	JG	2910	3722	2
Ethylbenzene		<2	ug/L	S 8260B	10/01/99	10/01/99	JG	2910	3722	2
Toluene		<2	ug/L	S 8260B	10/01/99	10/01/99	JG	2910	3722	2
m,p-xylene		<2	ug/L	S 8260B	10/01/99	10/01/99	JG	2910	3722	2
o-xylene		<2	ug/L	S 8260B	10/01/99	10/01/99	JG	2910	3722	2
Surr. Dibromofluoromethane		112	%	S 8260B	10/01/99	10/01/99	JG	2910	3722	84-128
Surr. Toluene-d8		108	%	S 8260B	10/01/99	10/01/99	JG	2910	3722	93-108
Surr. 4-Bromofluorobenzene		90	%	S 8260B	10/01/99	10/01/99	JG	2910	3722	75-110

Quality Control Report METHOD BLANK

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/11/99
Page: #8

Order ID Number: 99093012

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Blank Result	Units	Reporting Limit	Date Analyzed	Prep Batch	QC Batch
Benzene		<2	ug/L	2	10/01/99	2910	3722
Ethylbenzene		<2	ug/L	2	10/01/99	2910	3722
Toluene		<2	ug/L	2	10/01/99	2910	3722
m,p-xylene		<2	ug/L	2	10/01/99	2910	3722
o-xylene		<2	ug/L	2	10/01/99	2910	3722
Surr. Dibromofluoromethane		111	%	84-128	10/01/99	2910	3722
Surr. Toluene-d8		109	%	93-108	10/01/99	2910	3722
Surr. 4-Bromofluorobenzene		88	%	75-110	10/01/99	2910	3722
Benzene		<2	ug/L	2	10/04/99	2910	3721
Ethylbenzene		<2	ug/L	2	10/04/99	2910	3721
Toluene		<2	ug/L	2	10/04/99	2910	3721
m,p-xylene		<2	ug/L	2	10/04/99	2910	3721
o-xylene		<2	ug/L	2	10/04/99	2910	3721
Surr. Dibromofluoromethane		115	%	84-128	10/04/99	2910	3721
Surr. Toluene-d8		108	%	93-108	10/04/99	2910	3721
Surr. 4-Bromofluorobenzene		89	%	75-110	10/04/99	2910	3721
Naphthalene		<0.005	mg/L	0.005	10/06/99	2551	3201
Acenaphthylene		<0.005	mg/L	0.005	10/06/99	2551	3201
Acenaphthene		<0.005	mg/L	0.005	10/06/99	2551	3201
Fluorene		<0.005	mg/L	0.005	10/06/99	2551	3201
Phenanthrene		<0.005	mg/L	0.005	10/06/99	2551	3201
Anthracene		<0.005	mg/L	0.005	10/06/99	2551	3201
Fluoranthene		<0.005	mg/L	0.005	10/06/99	2551	3201
Pyrene		<0.005	mg/L	0.005	10/06/99	2551	3201
Benzo[a]anthracene		<0.005	mg/L	0.005	10/06/99	2551	3201
Chrysene		<0.005	mg/L	0.005	10/06/99	2551	3201
Benzo[b]fluoranthene		<0.005	mg/L	0.005	10/06/99	2551	3201
Benzo[k]fluoranthene		<0.005	mg/L	0.005	10/06/99	2551	3201
Benzo[a]pyrene		<0.005	mg/L	0.005	10/06/99	2551	3201
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	0.005	10/06/99	2551	3201
Dibenz[a,h]anthracene		<0.005	mg/L	0.005	10/06/99	2551	3201
Benzo[g,h,i]perylene		<0.005	mg/L	0.005	10/06/99	2551	3201
Surr. Nitrobenzene-d5		80	%	35-114	10/06/99	2551	3201
Surr. 2-Fluorobiphenyl		75	%	43-116	10/06/99	2551	3201
Surr. Terphenyl-d14		96	%	33-141	10/06/99	2551	3201

Quality Control Report METHOD BLANK

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/11/99
Page: #9

Order ID Number: 99093012

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Blank Result	Units	Reporting Limit	Date Analyzed	Prep Batch	QC Batch
Naphthalene		<0.002	mg/L	0.002	11/3/99	2551	3838
Acenaphthylene		<0.002	mg/L	0.002	11/3/99	2551	3838
Acenaphthene		<0.002	mg/L	0.002	11/3/99	2551	3838
Fluorene		<0.002	mg/L	0.002	11/3/99	2551	3838
Phenanthrene		<0.002	mg/L	0.002	11/3/99	2551	3838
Anthracene		<0.002	mg/L	0.002	11/3/99	2551	3838
Fluoranthene		<0.002	mg/L	0.002	11/3/99	2551	3838
Pyrene		<0.002	mg/L	0.002	11/3/99	2551	3838
Benzo[a]anthracene		<0.002	mg/L	0.002	11/3/99	2551	3838
Chrysene		<0.002	mg/L	0.002	11/3/99	2551	3838
Benzo[b]fluoranthene		<0.002	mg/L	0.002	11/3/99	2551	3838
Benzo[k]fluoranthene		<0.002	mg/L	0.002	11/3/99	2551	3838
Benzo[a]pyrene		<0.002	mg/L	0.002	11/3/99	2551	3838
Benzo[a]pyrene		<0.002	mg/L	0.002	11/3/99	2551	3838
Dibenzo[a,h]anthracene		<0.002	mg/L	0.002	11/3/99	2551	3838
Benzo[g,h,i]perylene		<0.002	mg/L	0.002	11/3/99	2551	3838
Surr. Nitrobenzene-d5		72	%	35-114	11/03/99	2551	3838
Surr. 2-Fluorobiphenyl		70	%	43-116	11/03/99	2551	3838
Surr. Terphenyl-d14		69	%	33-141	11/03/99	2551	3838

Quality Control Report

Continuing Calibration Verification Standard

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/11/99
Page: #10

Order ID Number: 99093012

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	CCVS TRUE Concentration	Units	CCVS Found Concentration	CCVS Percent Recovery	Date Analyzed	QC Batch #
Vinyl chloride		100	ug/L	96	96	10/01/99	3722
1,1-Dichloroethene		100	ug/L	96	96	10/01/99	3722
Chloroform		100	ug/L	89	89	10/01/99	3722
1,2-Dichloropropane		100	ug/L	98	98	10/01/99	3722
Toluene		100	ug/L	96	96	10/01/99	3722
Chlorobenzene		100	ug/L	102	102	10/01/99	3722
Ethylbenzene		100	ug/L	109	109	10/01/99	3722
Surr. Dibromofluoromethane		50	ug/L	48	96	10/01/99	3722
Surr. Toluene-d8		50	ug/L	53	106	10/01/99	3722
Surr. 4-Bromofluorobenzene		50	ug/L	49	98	10/01/99	3722
Vinyl chloride		100	ug/L	97	97	10/04/99	3721
1,1-Dichloroethene		100	ug/L	96	96	10/04/99	3721
Chloroform		100	ug/L	92	92	10/04/99	3721
1,2-Dichloropropane		100	ug/L	100	100	10/04/99	3721
Toluene		100	ug/L	98	98	10/04/99	3721
Chlorobenzene		100	ug/L	100	100	10/04/99	3721
Ethylbenzene		100	ug/L	108	108	10/04/99	3721
Surr. Dibromofluoromethane		50	ug/L	49	98	10/04/99	3721
Surr. Toluene-d8		50	ug/L	53	106	10/04/99	3721
Surr. 4-Bromofluorobenzene		50	ug/L	49	98	10/04/99	3721
Naphthalene		60	mg/L	59.16	99	10/06/99	3201
Acenaphthylene		60	mg/L	59.72	100	10/06/99	3201
Acenaphthene		60	mg/L	59.78	100	10/06/99	3201
Fluorene		60	mg/L	59.48	99	10/06/99	3201
Phenanthrene		60	mg/L	58.89	98	10/06/99	3201
Anthracene		60	mg/L	59.48	99	10/06/99	3201
Fluoranthene		60	mg/L	64.26	107	10/06/99	3201
Pyrene		60	mg/L	57.78	96	10/06/99	3201
Benzo[a]anthracene		60	mg/L	58.28	97	10/06/99	3201
Chrysene		60	mg/L	58.86	98	10/06/99	3201
Benzo[b]fluoranthene		60	mg/L	59.31	99	10/06/99	3201
Benzo[k]fluoranthene		60	mg/L	60.80	101	10/06/99	3201
Benzo[a]pyrene		60	mg/L	61.19	102	10/06/99	3201
Indeno[1,2,3-cd]pyrene		60	mg/L	60.69	101	10/06/99	3201

Quality Control Report

Continuing Calibration Verification Standard

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/11/99
Page: #11

Order ID Number: 99093012

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	CCVS TRUE Concentration	Units	CCVS Found Concentration	CCVS Percent Recovery	Date Analyzed	QC Batch #
Dibenz[a,h]anthracene		60	mg/L	57.47	96	10/06/99	3201
Benzo[g,h,i]perylene		60	mg/L	59.75	100	10/06/99	3201
Surr. Nitrobenzene-d5		60	mg/L	63.86	106	10/06/99	3201
Surr. 2-Fluorobiphenyl		60	mg/L	60.95	102	10/06/99	3201
Surr. Terphenyl-d14		60	mg/L	57.28	95	10/06/99	3201
Naphthalene		60	mg/L	62.51	104	11/02/99	3838
Acenaphthylene		60	mg/L	63.53	106	11/02/99	3838
Acenaphthene		60	mg/L	63.27	105	11/02/99	3838
Fluorene		60	mg/L	62.87	105	11/02/99	3838
Phenanthrene		60	mg/L	64.03	107	11/02/99	3838
Anthracene		60	mg/L	64.93	108	11/02/99	3838
Fluoranthene		60	mg/L	51.87	86	11/02/99	3838
Pyrene		60	mg/L	59.49	99	11/02/99	3838
Benzo[a]anthracene		60	mg/L	66.62	111	11/02/99	3838
Chrysene		60	mg/L	63.21	105	11/02/99	3838
Benzo[b]fluoranthene		60	mg/L	63.89	106	11/02/99	3838
Benzo[k]fluoranthene		60	mg/L	61.82	103	11/02/99	3838
Benzo[a]pyrene		60	mg/L	65.69	109	11/02/99	3838
Indeno[1,2,3-cd]pyrene		60	mg/L	66.81	111	11/02/99	3838
Dibenz[a,h]anthracene		60	mg/L	62.38	104	11/02/99	3838
Benzo[g,h,i]perylene		60	mg/L	62.49	104	11/02/99	3838
Surr. Nitrobenzene-d5		60	mg/L	65.97	110	11/02/99	3838
Surr. 2-Fluorobiphenyl		60	mg/L	65.13	109	11/02/99	3838
Surr. Terphenyl-d14		60	mg/L	62.86	105	11/02/99	3838

Quality Control Report

Matrix Spike and Matrix Duplicate Spike

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/11/99
Page: #12

Order ID Number: 99093012

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Units	Sample Result	Spike Amount Added	Matrix Spike Result	MSD Percent Recovery	Duplicate		MSD Percent Recovery	MS/MSD RPD	Date Analyzed	QC Batch #
							Spike Amount Added	MSD Result				
1,1-Dichloroethene	**	ug/L	<2	100	98	98	100	91	91	7	10/04/99	3721
Benzene	**	ug/L	<2	100	98	98	100	94	94	4	10/04/99	3721
Trichloroethene	**	ug/L	<2	100	96	96	100	90	90	6	10/04/99	3721
Toluene	**	ug/L	<2	100	100	100	100	93	93	7	10/04/99	3721
Chlorobenzene	**	ug/L	<2	100	107	107	100	100	100	7	10/04/99	3721
Dibromofluoromethane	**	ug/L	<2	50	55	110	50	49	98	12	10/04/99	3721
Toluene-d8	**	ug/L	<2	50	52	104	50	52	104	0	10/04/99	3721
4-Bromofluorobenzene	**	ug/L	<2	50	44	88	50	43	86	2	10/01/99	3722
1,1-Dichloroethene	**	ug/L	<2	100	90	90	100	91	91	1	10/01/99	3722
Benzene	**	ug/L	<2	100	91	91	100	93	93	2	10/01/99	3722
Trichloroethene	**	ug/L	<2	100	90	90	100	91	91	1	10/01/99	3722
Toluene	**	ug/L	<2	100	91	91	100	93	93	2	10/01/99	3722
Chlorobenzene	**	ug/L	<2	100	102	102	100	103	103	1	10/01/99	3722
Dibromofluoromethane	**	ug/L	<2	50	101	101	50	104	104	3	10/01/99	3722
Toluene-d8	**	ug/L	<2	50	107	107	50	106	106	1	10/01/99	3722
4-Bromofluorobenzene	**	ug/L	<2	50	90	90	50	88	176	2	10/01/99	3722
Naphthalene	**	mg/L	<0.005	80	62.94	79	80	61.53	77	2	10/06/99	3201
Acenaphthylene	**	mg/L	<0.005	80	73.21	92	80	73.48	92	0	10/06/99	3201
Acenaphthene	**	mg/L	<0.005	80	70.93	89	80	70.70	88	0	10/06/99	3201
Fluorene	**	mg/L	<0.005	80	78.22	98	80	79.65	100	2	10/06/99	3201
Phenanthrene	**	mg/L	<0.005	80	75.56	94	80	75.35	94	0	10/06/99	3201
Anthracene	**	mg/L	<0.005	80	73.36	92	80	72.76	91	1	10/06/99	3201
Fluoranthene	**	mg/L	<0.005	80	70.96	89	80	67.95	85	4	10/06/99	3201
Pyrene	**	mg/L	<0.005	80	68.41	86	80	72.52	91	6	10/06/99	3201
Benzo[a]anthracene	**	mg/L	<0.005	80	73.64	92	80	73.89	92	0	10/06/99	3201
Chrysene	**	mg/L	<0.005	80	78.29	98	80	79.51	99	2	10/06/99	3201
Benzo[b]fluoranthene	**	mg/L	<0.005	80	47.64	60	80	46.46	58	3	10/06/99	3201
Benzo[k]fluoranthene	**	mg/L	<0.005	80	44.44	56	80	46.22	58	4	10/06/99	3201
Benzo[a]pyrene	**	mg/L	<0.005	80	48.59	61	80	49.54	62	2	10/06/99	3201
Indeno[1,2,3-cd]pyrene	**	mg/L	<0.005	80	55.01	69	80	54.87	69	0	10/06/99	3201
Dibenz[a,h]anthracene	**	mg/L	<0.005	80	59.08	74	80	60.61	76	3	10/06/99	3201
Benzo[g,h,i]perylene	**	mg/L	<0.005	80	55.63	70	80	57.34	72	3	10/06/99	3201
Nitrobenzene-d5	**	mg/L	<0.005	80	65.34	82	80	63.58	79	3	10/06/99	3201
2-Fluorobiphenyl	**	mg/L	<0.005	80	63.90	80	80	60.91	76	5	10/06/99	3201
Terphenyl-d14	**	mg/L	<0.005	80	69.37	87	80	70.85	89	2	10/06/99	3201

Quality Control Report

Matrix Spike and Matrix Duplicate Spike

BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 11/11/99
Page: #13

Order ID Number: 99093012

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Units	Sample Result	Spike Amount Added	Matrix Spike Result	MSD Percent Recovery	Duplicate		MSD Percent Recovery	MS/MSD RPD	Date Analyzed	QC Batch #
							Spike Amount Added	MSD Result				
Naphthalene	**	mg/L	<0.005	80	62.94	79	80	61.53	77	2	11/02/99	3838
Acenaphthylene	**	mg/L	<0.005	80	73.21	92	80	73.48	92	0	11/02/99	3838
Acenaphthene	**	mg/L	<0.005	80	70.93	89	80	70.70	88	0	11/02/99	3838
Fluorene	**	mg/L	<0.005	80	78.22	98	80	79.65	100	2	11/02/99	3838
Phenanthrene	**	mg/L	<0.005	80	75.56	94	80	75.35	94	0	11/02/99	3838
Anthracene	**	mg/L	<0.005	80	73.36	92	80	72.76	91	1	11/02/99	3838
Fluoranthene	**	mg/L	<0.005	80	70.96	89	80	67.95	85	4	11/02/99	3838
Pyrene	**	mg/L	<0.005	80	68.41	86	80	72.52	91	6	11/02/99	3838
Benzo[a]anthracene	**	mg/L	<0.005	80	73.64	92	80	73.89	92	0	11/02/99	3838
Chrysene	**	mg/L	<0.005	80	78.29	98	80	79.51	99	2	11/02/99	3838
Benzo[b]fluoranthene	**	mg/L	<0.005	80	47.64	60	80	46.46	58	3	11/02/99	3838
Benzo[k]fluoranthene	**	mg/L	<0.005	80	44.44	56	80	46.22	58	4	11/02/99	3838
Benzo[a]pyrene	**	mg/L	<0.005	80	48.59	61	80	49.54	62	2	11/02/99	3838
Indeno[1,2,3-cd]pyrene	**	mg/L	<0.005	80	55.01	69	80	54.87	69	0	11/02/99	3838
Dibenz[a,h]anthracene	**	mg/L	<0.005	80	59.08	74	80	60.61	76	3	11/02/99	3838
Benzo[g,h,i]perylene	**	mg/L	<0.005	80	55.63	70	80	57.34	72	3	11/02/99	3838
Nitrobenzene-d5	**	mg/L	<0.005	80	65.34	82	80	63.58	79	3	11/02/99	3838
2-Fluorobiphenyl	**	mg/L	<0.005	80	63.90	80	80	60.91	76	5	11/02/99	3838
Terphenyl-d14	**	mg/L	<0.005	80	69.37	87	80	70.85	89	2	11/02/99	3838

**LCS used for spike and spike duplicate.

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Tel (915) 585-3443
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LAB Order ID # 99693012

Contact Person: Cliff P. Brunson

Sampler Signature: 

Project Location: Hobbs, NM

Relinquished by: <i>[Signature]</i>	Date: 9-29-99	Time: 3:10	Received by:	Date:	Time:
Relinquished by:	Date:	Time:	Received by:	Date:	Time:
Relinquished by:	Date:	Time:	Received at Laboratory by: <i>Dick Windham</i>	Date: 9-30-99	Time: 9:30a

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APPENDIX II

TRACE ANALYSIS, INC.
Laboratory Results
4th Quarter 1999

Westgate Subdivision
Grimes Battery & Tasker Road

April 2000

Shell Exploration & Production Company
Houston, Texas

Prepared by:
BBC International, Inc.

TRACE ANALYSIS, INC.

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Analytical and Quality Control Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
Page: #1

Sampling Program: Shell Westgate

Order ID Number: 99122114

Sample Description: Shell
Sample location: Hobbs, New Mexico

Enclosed are the Analytical Results and Quality Control Data Reports for the following samples submitted to TraceAnalysis, Inc. for analysis:

Sample Number	Sample Description	Matrix	Date Taken	Time Taken	Date Received
T137880	GMW-6	Water	12/20/99	4:00 PM	12/21/99
T137881	GMW-1	Water	12/20/99	6:15 PM	12/21/99
T137882	GMW-2	Water	12/20/99	6:45 PM	12/21/99
T137883	GMW-3B	Water	12/20/99	5:40 PM	12/21/99
T137884	GMW-4	Water	12/20/99	1:35 PM	12/21/99
T137885	GMW-7	Water	12/20/99	11:45 AM	12/21/99
T137886	GMW-8	Water	12/20/99	5:00 PM	12/21/99
T137887	GMW-9	Water	12/20/99	5:15 PM	12/21/99
T137888	GMW-10	Water	12/20/99	4:30 PM	12/21/99
T137889	GMW-11	Water	12/20/99	9:10 AM	12/21/99
T137890	TMW-1	Water	12/20/99	11:25 AM	12/21/99
T137891	TMW-2	Water	12/20/99	11:00 AM	12/21/99
T137892	TMW-3	Water	12/20/99	10:45 AM	12/21/99
T137893	TMW-4	Water	12/20/99	10:20 AM	12/21/99
T137894	TMW-5	Water	12/20/99	10:00 AM	12/21/99
T137895	Trip Blank	Water	12/20/99		12/21/99
T137896	GMW-5	Water	12/20/99	6:35 PM	12/21/99

This Quality Control Report is generated on a batch basis. All information contained in this report is for the analytical batch (es) in which your sample (s) were analyzed.

This report shall not be reproduced except in its entirety, without written approval of the laboratory.

These results represent only the samples received in the laboratory.

This report consists of a total of 24 pages.

All data meets quality control criteria with the following exceptions:



Dr. Blair Leftwich
Director

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
Page: #2

Field Code: GMW-6

Order ID Number: 99122114
Sample Number: T137880

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Ethylbenzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Toluene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
m,p-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
o-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Surr. Dibromofluoromethane		95	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	83-121
Surr. Toluene-d8		101	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	91-108
Surr. 4-Bromofluorobenzene		83	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	73-100
Naphthalene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Phenanthrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Surr. Nitrobenzene-d5		73	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	35-130
Surr. 2-Fluorobiphenyl		83	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	43-128
Surr. Terphenyl-d14		59	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
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Field Code: GMW-1

Order ID Number: 99122114
Sample Number: T137881

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		22	ug/L	S-8260B	12/28/00	12/28/00	JG	00103	00143	2
Ethylbenzene		113	ug/L	S-8260B	12/28/00	12/28/00	JG	00103	00143	2
Toluene		28	ug/L	S-8260B	12/28/00	12/28/00	JG	00103	00143	2
m,p-xylene		565	ug/L	S-8260B	12/28/00	12/28/00	JG	00103	00143	2
o-xylene		169	ug/L	S-8260B	12/28/00	12/28/00	JG	00103	00143	2
Surr. Dibromofluoromethane		93	%	S-8260B	12/28/00	12/28/00	JG	00103	00143	83-121
Surr. Toluene-d8		101	%	S-8260B	12/28/00	12/28/00	JG	00103	00143	91-108
Surr. 4-Bromofluorobenzene		92	%	S-8260B	12/28/00	12/28/00	JG	00103	00143	73-100
Naphthalene		0.034	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Phenanthrene		0.006	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	LK	00052	00101	0.005
Surr. Nitrobenzene-d5		56	%	S 8270C	12/21/99	12/23/99	LK	00052	00101	35-130
Surr. 2-Fluorobiphenyl		55	%	S 8270C	12/21/99	12/23/99	LK	00052	00101	43-128
Surr. Terphenyl-d14		38	%	S 8270C	12/21/99	12/23/99	LK	00052	00101	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
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Field Code: GMW-2

Order ID Number: 99122114
Sample Number: T137882

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Ethylbenzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Toluene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
m,p-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
o-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Surr. Dibromofluoromethane		96	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	83-121
Surr. Toluene-d8		99	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	91-108
Surr. 4-Bromofluorobenzene		87	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	73-100
Naphthalene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Phenanthrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Surr. Nitrobenzene-d5		71	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	35-130
Surr. 2-Fluorobiphenyl		72	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	43-128
Surr. Terphenyl-d14		66	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
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Field Code: GMW-3B

Order ID Number: 99122114
Sample Number: T137883

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<10	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	10
Ethylbenzene		30	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	10
Toluene		<10	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	10
m,p-xylene		202	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	10
o-xylene		52	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	10
Surr. Dibromofluoromethane		92	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	83-121
Surr. Toluene-d8		103	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	91-108
Surr. 4-Bromofluorobenzene		90	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	73-100
Naphthalene		0.020	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Phenanthrene		0.006	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Surr. Nitrobenzene-d5		65	%	S 8270C	12/21/99	12/23/99	MA	00052	00101	35-130
Surr. 2-Fluorobiphenyl		57	%	S 8270C	12/21/99	12/23/99	MA	00052	00101	43-128
Surr. Terphenyl-d14		36	%	S 8270C	12/21/99	12/23/99	MA	00052	00101	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
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Field Code: GMW-4

Order ID Number: 99122114
Sample Number: T137884

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Ethylbenzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Toluene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
m,p-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
o-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Surr. Dibromofluoromethane		95	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	83-121
Surr. Toluene-d8		101	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	91-108
Surr. 4-Bromofluorobenzene		85	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	73-100
Naphthalene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Phenanthrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Surr. Nitrobenzene-d5		74	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	35-130
Surr. 2-Fluorobiphenyl		73	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	43-128
Surr. Terphenyl-d14		60	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
Page: #7

Field Code: GMW-7

Order ID Number: 99122114
Sample Number: T137885

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Ethylbenzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Toluene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
m,p-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
o-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Surr. Dibromofluoromethane		94	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	83-121
Surr. Toluene-d8		100	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	91-108
Surr. 4-Bromofluorobenzene		85	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	73-100
Naphthalene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Phenanthrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Surr. Nitrobenzene-d5		60	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	35-130
Surr. 2-Fluorobiphenyl		62	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	43-128
Surr. Terphenyl-d14		68	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
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Field Code: GMW-8

Order ID Number: 99122114
Sample Number: T137886

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Ethylbenzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Toluene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
m,p-xylene		2.60	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
o-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Surr. Dibromofluoromethane		94	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	83-121
Surr. Toluene-d8		10	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	91-108
Surr. 4-Bromofluorobenzene		89	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	73-100
Naphthalene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Phenanthrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Surr. Nitrobenzene-d5		58	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	35-130
Surr. 2-Fluorobiphenyl		61	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	43-128
Surr. Terphenyl-d14		72	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
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Field Code: GMW-9

Order ID Number: 99122114
Sample Number: T137887

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Ethylbenzene		25.01	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Toluene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
m,p-xylene		102.56	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
o-xylene		34.47	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Surr. Dibromofluoromethane		92	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	83-121
Surr. Toluene-d8		102	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	91-108
Surr. 4-Bromofluorobenzene		94	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	73-100
Naphthalene		0.008	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Phenanthrene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/23/99	MA	00052	00101	0.005
Surr. Nitrobenzene-d5		48	%	S 8270C	12/21/99	12/23/99	MA	00052	00101	35-130
Surr. 2-Fluorobiphenyl		64	%	S 8270C	12/21/99	12/23/99	MA	00052	00101	43-128
Surr. Terphenyl-d14		35	%	S 8270C	12/21/99	12/23/99	MA	00052	00101	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
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Field Code: GMW-10

Order ID Number: 99122114

Sample Number: T137888

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Ethylbenzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Toluene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
m,p-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
o-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Surr. Dibromofluoromethane		96	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	83-121
Surr. Toluene-d8		100	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	91-108
Surr. 4-Bromofluorobenzene		84	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	73-100
Naphthalene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Phenanthrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Surr. Nitrobenzene-d5		58	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	35-130
Surr. 2-Fluorobiphenyl		57	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	43-128
Surr. Terphenyl-d14		80	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
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Field Code: GMW-11

Order ID Number: 99122114
Sample Number: T137889

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Ethylbenzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Toluene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
m,p-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
o-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Surr. Dibromofluoromethane		97	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	83-121
Surr. Toluene-d8		99	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	91-108
Surr. 4-Bromofluorobenzene		89	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	73-100
Naphthalene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Phenanthrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Surr. Nitrobenzene-d5		65	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	35-130
Surr. 2-Fluorobiphenyl		66	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	43-128
Surr. Terphenyl-d14		59	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
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Field Code: TMW-1

Order ID Number: 99122114
Sample Number: T137890

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Ethylbenzene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Toluene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
m,p-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
o-xylene		<2	ug/L	S-8260B	12/27/99	12/27/99	JG	00094	00129	2
Surr. Dibromofluoromethane		93	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	83-121
Surr. Toluene-d8		100	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	91-108
Surr. 4-Bromofluorobenzene		91	%	S-8260B	12/27/99	12/27/99	JG	00094	00129	73-100
Naphthalene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Phenanthrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Surr. Nitrobenzene-d5		73	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	35-130
Surr. 2-Fluorobiphenyl		73	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	43-128
Surr. Terphenyl-d14		67	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
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Field Code: TMW-2

Order ID Number: 99122114

Sample Number: T137891

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Ethylbenzene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Toluene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
m,p-xylene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
o-xylene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Surr. Dibromofluoromethane		98	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	83-121
Surr. Toluene-d8		100	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	91-108
Surr. 4-Bromofluorobenzene		90	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	73-100
Naphthalene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Phenanthrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Surr. Nitrobenzene-d5		67	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	35-130
Surr. 2-Fluorobiphenyl		66	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	43-128
Surr. Terphenyl-d14		72	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
Page: #14

Field Code: TMW-3

Order ID Number: 99122114
Sample Number: T137892

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Ethylbenzene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Toluene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
m,p-xylene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
o-xylene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Surr. Dibromofluoromethane		94	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	83-121
Surr. Toluene-d8		103	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	91-108
Surr. 4-Bromofluorobenzene		82	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	73-100
Naphthalene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Phenanthrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Surr. Nitrobenzene-d5		61	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	35-130
Surr. 2-Fluorobiphenyl		68	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	43-128
Surr. Terphenyl-d14		77	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
Page: #15

Field Code: TMW-4

Order ID Number: 99122114
Sample Number: T137893

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Ethylbenzene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Toluene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
m,p-xylene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
o-xylene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Surr. Dibromofluoromethane		93	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	83-121
Surr. Toluene-d8		103	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	91-108
Surr. 4-Bromofluorobenzene		85	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	73-100
Naphthalene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Phenanthrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Surr. Nitrobenzene-d5		64	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	35-130
Surr. 2-Fluorobiphenyl		66	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	43-128
Surr. Terphenyl-d14		77	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
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Field Code: TMW-5

Order ID Number: 99122114
Sample Number: T137894

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Ethylbenzene		19.69	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Toluene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
m,p-xylene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
o-xylene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Surr. Dibromofluoromethane		92	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	83-121
Surr. Toluene-d8		101	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	91-108
Surr. 4-Bromofluorobenzene		89	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	73-100
Naphthalene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Acenaphthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluorene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Phenanthrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Chrysene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[b]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[k]fluoranthene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[a]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Dibenz[a,h]anthracene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Benzo[g,h,i]perylene		<0.005	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.005
Surr. Nitrobenzene-d5		66	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	35-130
Surr. 2-Fluorobiphenyl		68	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	43-128
Surr. Terphenyl-d14		58	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	9-142

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
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Order ID Number: 99122114
Sample Number: T137895

Field Code: Trip Blank

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Ethylbenzene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Toluene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
m,p-xylene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
o-xylene		<2	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Surr. Dibromofluoromethane		93	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	83-121
Surr. Toluene-d8		104	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	91-108
Surr. 4-Bromofluorobenzene		84	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	73-100

Analytical Results Report

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
Page: #18

Field Code: GMW-5

Order ID Number: 99122114
Sample Number: T137896

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Analytical Method	Date Prepared	Date Analyzed	Analyst	Prep Batch	QC Batch	Reporting Limit
Benzene		24	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Ethylbenzene		254	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Toluene		27	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
m,p-xylene		1969	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
o-xylene		458	ug/L	S-8260B	12/28/99	12/28/99	JG	00103	00143	2
Surr. Dibromofluoromethane		94	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	83-121
Surr. Toluene-d8		103	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	91-108
Surr. 4-Bromofluorobenzene		95	%	S-8260B	12/28/99	12/28/99	JG	00103	00143	73-100
Naphthalene		0.138	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Acenaphthylene		<0.025	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Acenaphthene		<0.025	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Fluorene		<0.025	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Phenanthrene		0.042	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Anthracene		<0.025	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Fluoranthene		<0.025	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Pyrene		<0.025	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Benzo[a]anthracene		<0.025	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Chrysene		<0.025	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Benzo[b]fluoranthene		<0.025	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Benzo[k]fluoranthene		<0.025	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Benzo[a]pyrene		<0.025	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Indeno[1,2,3-cd]pyrene		<0.025	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Dibenz[a,h]anthracene		<0.025	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Benzo[g,h,i]perylene		<0.025	mg/L	S 8270C	12/21/99	12/22/99	MA	00052	00085	0.025
Surr. Nitrobenzene-d5		90	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	35-130
Surr. 2-Fluorobiphenyl		64	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	43-128
Surr. Terphenyl-d14		36	%	S 8270C	12/21/99	12/22/99	MA	00052	00085	9-142

Quality Control Report METHOD BLANKS

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
Page: #19

Order ID Number: 99122114

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Result	Units	Reporting Limit	Date Analyzed	Prep Batch	QC Batch
Benzene		<2	ug/L	2	12/27/99	00094	00129
Ethylbenzene		<2	ug/L	2	12/27/99	00094	00129
Toluene		<2	ug/L	2	12/27/99	00094	00129
m,p-xylene		<2	ug/L	2	12/27/99	00094	00129
o-xylene		<2	ug/L	2	12/27/99	00094	00129
Surr. Dibromofluoromethane		98	%	83-121	12/27/99	00094	00129
Surr. Toluene-d8		101	%	91-108	12/27/99	00094	00129
Surr. 4-Bromofluorobenzene		89	%	73-100	12/27/99	00094	00129
Benzene		<20	ug/L	20	12/28/99	00103	00143
Ethylbenzene		<2	ug/L	2	12/28/99	00103	00143
Toluene		<2	ug/L	2	12/28/99	00103	00143
m,p-xylene		<2	ug/L	2	12/28/99	00103	00143
o-xylene		<2	ug/L	2	12/28/99	00103	00143
Surr. Dibromofluoromethane		98	%	83-121	12/28/99	00103	00143
Surr. Toluene-d8		99	%	91-108	12/28/99	00103	00143
Surr. 4-Bromofluorobenzene		85	%	73-100	12/28/99	00103	00143
Naphthalene		<0.005	mg/L	0.005	12/22/99	00052	00085
Acenaphthylene		<0.005	mg/L	0.005	12/22/99	00052	00085
Acenaphthene		<0.005	mg/L	0.005	12/22/99	00052	00085
Fluorene		<0.005	mg/L	0.005	12/22/99	00052	00085
Phenanthrene		<0.005	mg/L	0.005	12/22/99	00052	00085
Anthracene		<0.005	mg/L	0.005	12/22/99	00052	00085
Fluoranthene		<0.005	mg/L	0.005	12/22/99	00052	00085
Pyrene		<0.005	mg/L	0.005	12/22/99	00052	00085
Benzo[a]anthracene		<0.005	mg/L	0.005	12/22/99	00052	00085
Chrysene		<0.005	mg/L	0.005	12/22/99	00052	00085
Benzo[b]fluoranthene		<0.005	mg/L	0.005	12/22/99	00052	00085
Benzo[k]fluoranthene		<0.005	mg/L	0.005	12/22/99	00052	00085
Benzo[a]pyrene		<0.005	mg/L	0.005	12/22/99	00052	00085
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	0.005	12/22/99	00052	00085
Dibenz[a,h]anthracene		<0.005	mg/L	0.005	12/22/99	00052	00085
Benzo[g,h,i]perylene		<0.005	mg/L	0.005	12/22/99	00052	00085
Surr. Nitrobenzene-d5		70	%	35-130	12/22/99	00052	00085
Surr. 2-Fluorobiphenyl		73	%	43-128	12/22/99	00052	00085
Surr. Terphenyl-d14		77	%	9-142	12/22/99	00052	00085

Cliff P. Brunson
BBC International, Inc.
324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
Page: #20

Order ID Number: 99122114

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Blank Result	Units	Reporting Limit	Date Analyzed	Prep Batch	QC Batch
Naphthalene		<0.005	mg/L	0.005	12/23/99	00052	00101
Acenaphthylene		<0.005	mg/L	0.005	12/23/99	00052	00101
Acenaphthene		<0.005	mg/L	0.005	12/23/99	00052	00101
Fluorene		<0.005	mg/L	0.005	12/23/99	00052	00101
Phenanthrene		<0.005	mg/L	0.005	12/23/99	00052	00101
Anthracene		<0.005	mg/L	0.005	12/23/99	00052	00101
Fluoranthene		<0.005	mg/L	0.005	12/23/99	00052	00101
Pyrene		<0.005	mg/L	0.005	12/23/99	00052	00101
Benzo[a]anthracene		<0.005	mg/L	0.005	12/23/99	00052	00101
Chrysene		<0.005	mg/L	0.005	12/23/99	00052	00101
Benzo[b]fluoranthene		<0.005	mg/L	0.005	12/23/99	00052	00101
Benzo[k]fluoranthene		<0.005	mg/L	0.005	12/23/99	00052	00101
Benzo[a]pyrene		<0.005	mg/L	0.005	12/23/99	00052	00101
Indeno[1,2,3-cd]pyrene		<0.005	mg/L	0.005	12/23/99	00052	00101
Dibenz[a,h]anthracene		<0.005	mg/L	0.005	12/23/99	00052	00101
Benzo[g,h,i]perylene		<0.005	mg/L	0.005	12/23/99	00052	00101
Surr. Nitrobenzene-d5		71	%	35-130	12/23/99	00052	00101
Surr. 2-Fluorobiphenyl		75	%	43-128	12/23/99	00052	00101
Surr. Terphenyl-d14		68	%	9-142	12/23/99	00052	00101

Quality Control Report

Continuing Calibration Verification Standard

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
Page: #21

Order ID Number: 99122114

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	CCVS TRUE Concentration	Units	CCVS Found Concentration	CCVS Percent Recovery	Date Analyzed	QC Batch #
Vinyl chloride		100	ug/L	101	101	12/27/99	00129
1,1-Dichloroethene		100	ug/L	95	95	12/27/99	00129
Chloroform		100	ug/L	99	99	12/27/99	00129
1,2-Dichloropropane		100	ug/L	104	104	12/27/99	00129
Toluene		100	ug/L	101	101	12/27/99	00129
Chlorobenzene		100	ug/L	101	101	12/27/99	00129
Ethylbenzene		100	ug/L	97	97	12/27/99	00129
Surr. Dibromofluoromethane		100	%	50.46	99	12/27/99	00129
Surr. Toluene-d8		100	%	49.17	102	12/27/99	00129
Surr. 4-Bromofluorobenzene		100	%	49.88	100	12/27/99	00129
Vinyl chloride		100	ug/L	92	92	12/28/99	00143
1,1-Dichloroethene		100	ug/L	95	95	12/28/99	00143
Chloroform		100	ug/L	97	97	12/28/99	00143
1,2-Dichloropropane		100	ug/L	99	99	12/28/99	00143
Toluene		100	ug/L	100	100	12/28/99	00143
Chlorobenzene		100	ug/L	99	99	12/28/99	00143
Ethylbenzene		100	ug/L	94	94	12/28/99	00143
Surr. Dibromofluoromethane		100	ug/L	49.78	100	12/28/99	00143
Surr. Toluene-d8		100	ug/L	47.94	104	12/28/99	00143
Surr. 4-Bromofluorobenzene		100	ug/L	50.17	100	12/28/99	00143

Cliff P. Brunson
ABC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
Page: #22

Sample Description: Shell
Sample location: Hobbs, New Mexico

Order ID Number: 99122114

Parameter	Flag	CCVS TRUE Concentration	Units	CCVS Found Concentration	CCVS Percent Recovery	Date Analyzed	QC Batch #
Naphthalene		60	mg/L	60.16	100	12/22/99	00085
Acenaphthylene		60	mg/L	60.81	101	12/22/99	00085
Acenaphthene		60	mg/L	60.97	102	12/22/99	00085
Fluorene		60	mg/L	60.00	100	12/22/99	00085
Phenanthrene		60	mg/L	58.89	98	12/22/99	00085
Anthracene		60	mg/L	60.33	101	12/22/99	00085
Fluoranthene		60	mg/L	55.64	93	12/22/99	00085
Pyrene		60	mg/L	61.80	103	12/22/99	00085
Benzo[a]anthracene		60	mg/L	62.09	103	12/22/99	00085
Chrysene		60	mg/L	60.43	101	12/22/99	00085
Benzo[b]fluoranthene		60	mg/L	64.90	108	12/22/99	00085
Benzo[k]fluoranthene		60	mg/L	61.35	102	12/22/99	00085
Benzo[a]pyrene		60	mg/L	61.92	103	12/22/99	00085
Indeno[1,2,3-cd]pyrene		60	mg/L	68.82	115	12/22/99	00085
Dibenz[a,h]anthracene		60	mg/L	65.11	109	12/22/99	00085
Benzo[g,h,i]perylene		60	mg/L	60.99	102	12/22/99	00085
Surr. Nitrobenzene-d5		60	mg/L	60.74	101	12/22/99	00085
Surr. 2-Fluorobiphenyl		60	mg/L	62.82	105	12/22/99	00085
Surr. Terphenyl-d14		60	mg/L	61.30	102	12/22/99	00085
Naphthalene		60	mg/L	60.85	101	12/23/99	00101
Acenaphthylene		60	mg/L	62.53	104	12/23/99	00101
Acenaphthene		60	mg/L	62.12	104	12/23/99	00101
Fluorene		60	mg/L	60.83	101	12/23/99	00101
Phenanthrene		60	mg/L	60.47	101	12/23/99	00101
Anthracene		60	mg/L	61.64	103	12/23/99	00101
Fluoranthene		60	mg/L	61.37	102	12/23/99	00101
Pyrene		60	mg/L	64.22	107	12/23/99	00101
Benzo[a]anthracene		60	mg/L	61.49	102	12/23/99	00101
Chrysene		60	mg/L	60.63	101	12/23/99	00101
Benzo[b]fluoranthene		60	mg/L	61.57	103	12/23/99	00101
Benzo[k]fluoranthene		60	mg/L	57.73	96	12/23/99	00101
Benzo[a]pyrene		60	mg/L	63.22	105	12/23/99	00101
Indeno[1,2,3-cd]pyrene		60	mg/L	69.92	117	12/23/99	00101
Dibenz[a,h]anthracene		60	mg/L	65.67	109	12/23/99	00101
Benzo[g,h,i]perylene		60	mg/L	64.24	107	12/23/99	00101
Surr. Nitrobenzene-d5		60	mg/L	61.50	103	12/23/99	00101
Surr. 2-Fluorobiphenyl		60	mg/L	62.10	104	12/23/99	00101
Surr. Terphenyl-d14		60	mg/L	63.03	105	12/23/99	00101

Quality Control Report

Matrix Spike and Matrix Duplicate Spike

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 3/21/00
Page: #23

Order ID Number: 99122114

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Units	Sample Result	Spike Amount Added	Matrix Spike Result	MSD Percent Recovery	Duplicate		MSD Percent Recovery	MS/MSD RPD	Date Analyzed	QC Batch #
							Spike Amount Added	MSD Result				
1,1-Dichloroethene		ug/L	<2	100	86	86	100	86	86	1	12/27/99	00129
Benzene		ug/L	<2	100	93	93	100	92	92	0	12/27/99	00129
Trichloroethene		ug/L	<2	100	93	93	100	93	93	0	12/27/99	00129
Toluene		ug/L	<2	100	93	93	100	94	94	0	12/27/99	00129
Chlorobenzene		ug/L	<2	100	95	95	100	95	95	0	12/27/99	00129
Dibromofluoromethane		ug/L	<2	100	50.40	101	100	49.14	98	3	12/27/99	00129
Toluene-d8		ug/L	<2	100	49.95	100	100	49.49	99	1	12/27/99	00129
4-Bromofluorobenzene		ug/L	<2	100	45.70	91	100	45.75	92	0	12/27/99	00129
1,1-Dichloroethene		ug/L	<2	100	80.74	81	100	86.42	86	7	12/27/99	00129
Benzene		ug/L	<2	100	86.08	86	100	92.28	92	7	12/27/99	00129
Trichloroethene		ug/L	<2	100	88.91	89	100	95.07	95	7	12/27/99	00129
Toluene		ug/L	<2	100	88.32	88	100	94.6	95	7	12/27/99	00129
Chlorobenzene		ug/L	<2	100	89.31	89	100	94.62	95	6	12/27/99	00129
Dibromofluoromethane		ug/L	<2	100	49.85	100	100	49.94	100	0	12/27/99	00129
Toluene-d8		ug/L	<2	100	48.92	98	100	48.51	97	1	12/27/99	00129
4-Bromofluorobenzene		ug/L	<2	100	44.34	89	100	44.75	90	1	12/27/99	00129
1,1-Dichloroethene		ug/L	<2	100	80.74	81	100	86.42	86	7	12/28/99	00143
Benzene		ug/L	<2	100	86.08	86	100	92.28	92	7	12/28/99	00143
Trichloroethene		ug/L	<2	100	88.91	89	100	95.07	95	7	12/28/99	00143
Toluene		ug/L	<2	100	88.32	88	100	94.6	95	7	12/28/99	00143
Chlorobenzene		ug/L	<2	100	89.31	89	100	94.62	95	6	12/28/99	00143
Dibromofluoromethane		ug/L	<2	100	49.85	100	100	49.94	100	0	12/28/99	00143
Toluene-d8		ug/L	<2	100	48.92	98	100	48.51	97	1	12/28/99	00143
4-Bromofluorobenzene		ug/L	<2	100	44.34	89	100	44.75	90	1	12/28/99	00143
Naphthalene		mg/L	<0.005	80	56.66	71	80	57.17	71	1	12/22/99	00085
Acenaphthylene		mg/L	<0.005	80	64.38	80	80	65.61	82	2	12/22/99	00085
Acenaphthene		mg/L	<0.005	80	62.65	78	80	63.61	80	2	12/22/99	00085
Fluorene		mg/L	<0.005	80	61.89	77	80	62.35	78	1	12/22/99	00085
Phenanthrene		mg/L	<0.005	80	67.26	84	80	67.20	84	0	12/22/99	00085
Anthracene		mg/L	<0.005	80	63.21	79	80	64.45	81	2	12/22/99	00085
Fluoranthene		mg/L	<0.005	80	61.85	77	80	58.81	74	5	12/22/99	00085
Pyrene		mg/L	<0.005	80	65.29	82	80	64.42	81	1	12/22/99	00085
Benzo[a]anthracene		mg/L	<0.005	80	61.13	76	80	62.15	78	2	12/22/99	00085
Chrysene		mg/L	<0.005	80	90.25	113	80	91.68	115	2	12/22/99	00085
Benzo[b]fluoranthene		mg/L	<0.005	80	58.95	74	80	61.90	77	5	12/22/99	00085

Quality Control Report

Matrix Spike and Matrix Duplicate Spike

Cliff P. Brunson
BBC International, Inc.
1324 W. Marland
Hobbs, NM 88240

Date: 03/21/00
Page: #24

Order ID Number: 99122114

Sample Description: Shell
Sample location: Hobbs, New Mexico

Parameter	Flag	Units	Sample Result	Spike Amount Added	Matrix Spike Result	MSD Percent Recovery	Duplicate		MSD Percent Recovery	MS/MSD RPD	Date Analyzed	QC Batch #
							Spike Amount Added	MSD Result				
Benzo[k]fluoranthene		mg/L	<0.005	80	56.04	70	80	60.77	76	8	12/22/99	00085
Benzo[a]pyrene		mg/L	<0.005	80	58.54	73	80	63.72	80	8	12/22/99	00085
Indeno[1,2,3-cd]pyrene		mg/L	<0.005	80	56.44	71	80	61.89	77	9	12/22/99	00085
Dibenz[a,h]anthracene		mg/L	<0.005	80	85.25	107	80	92.45	116	8	12/22/99	00085
Benzo[g,h,i]perylene		mg/L	<0.005	80	55.13	69	80	60.15	75	9	12/22/99	00085
Nitrobenzene-d5		mg/L	<0.005	80	63.55	79	80	63.84	80	0	12/22/99	00085
2-Fluorobiphenyl		mg/L	<0.005	80	67.34	84	80	66.79	83	1	12/22/99	00085
Terphenyl-d14		mg/L	<0.005	80	30.71	38	80	35.33	44	14	12/22/99	00085
Naphthalene		mg/L	<0.005	80	56.66	71	80	57.17	71	1	12/22/99	00101
1-Naphthylene		mg/L	<0.005	80	64.38	80	80	65.61	82	2	12/22/99	00101
Acenaphthene		mg/L	<0.005	80	62.65	78	80	63.61	80	2	12/22/99	00101
Fluorene		mg/L	<0.005	80	61.89	77	80	62.35	78	1	12/22/99	00101
Phenanthrene		mg/L	<0.005	80	67.26	84	80	67.20	84	0	12/22/99	00101
Anthracene		mg/L	<0.005	80	63.21	79	80	64.45	81	2	12/22/99	00101
Fluoranthene		mg/L	<0.005	80	61.85	77	80	58.81	74	5	12/22/99	00101
Pyrene		mg/L	<0.005	80	65.29	82	80	64.42	81	1	12/22/99	00101
Benzo[a]anthracene		mg/L	<0.005	80	61.13	76	80	62.15	78	2	12/22/99	00101
Chrysene		mg/L	<0.005	80	90.25	113	80	91.68	115	2	12/22/99	00101
Benzo[b]fluoranthene		mg/L	<0.005	80	58.95	74	80	61.90	77	5	12/22/99	00101
Benzo[k]fluoranthene		mg/L	<0.005	80	56.04	70	80	60.77	76	8	12/22/99	00101
Benzo[a]pyrene		mg/L	<0.005	80	58.54	73	80	63.72	80	8	12/22/99	00101
Indeno[1,2,3-cd]pyrene		mg/L	<0.005	80	56.44	71	80	61.89	77	9	12/22/99	00101
Dibenz[a,h]anthracene		mg/L	<0.005	80	85.25	107	80	92.45	116	8	12/22/99	00101
Benzo[g,h,i]perylene		mg/L	<0.005	80	55.13	69	80	60.15	75	9	12/22/99	00101
Nitrobenzene-d5		mg/L	<0.005	80	63.55	79	80	63.84	80	0	12/22/99	00101
2-Fluorobiphenyl		mg/L	<0.005	80	67.34	84	80	66.79	83	1	12/22/99	00101
Terphenyl-d14		mg/L	<0.005	80	30.71	38	80	35.33	44	14	12/22/99	00101

6701 Aberdeen Avenue, Ste. 9
Lubbock, Texas 79424
Tel (806) 794-1296
Fax (806) 794-1298
1 (800) 378-1296

TraceAnalysis, Inc.

4723 Ripley Dr., Ste A
El Paso, Texas 79922-1028
Tel (915) 585-3443
Fax (915) 585-4944
1 (888) 588-3443

Company Name:

BBC International, Inc. (505) 397-6388

Address: (Street, City, Zip)

1324 W. Marland, Hobbs, NM 88240 (505) 397-0397

Contact Person:

Clipp P Brunson

Invoice to:

(If different from above) Shell E + P Company ATTN: Wayne Hamilton

Project #:

Project Name:

Shell Westgate

Project Location:

Hobbs, NM
Sampler Signature: *Wayne Hamilton*

LAB # (LAB USE ONLY)	FIELD CODE	# CONTAINERS	Volume/Amount	MATRIX				PRESERVATIVE METHOD				DATE	SAMPLING TIME
				WATER	SOIL	AIR	SLUDGE	HCL	HNO3	ICE	NONE		
137880	HP-B-1 Gmw-6	1	1.1ka	✓						✓		12/20/99	4:00pm
81	Gmw-1	1	1.1ka	✓						✓		"	6:15pm
	Gmw-1	2	UOA	✓								"	6:15pm
82	Gmw-2	1	1.1ka	✓				✓				"	4:45pm
	Gmw-2	2	UOA	✓						✓		"	4:45pm
83	Gmw-3B	1	1.1ka	✓				✓				"	5:40pm
	Gmw-3B	2	UOA	✓						✓		"	5:40pm
84	Gmw-4	1	1.1ka	✓				✓				"	1:35pm
	Gmw-4	2	UOA	✓						✓		"	1:35pm

Relinquished by:

Date:

Received by:

Date:

Time:

Relinquished by:

Date:

Received by:

Date:

Time:

Relinquished by:

Date:

Received at Laboratory by:

Date:

Time:

Submittal of samples constitutes agreement to Terms and Conditions listed on reverse side of C.O.C.

ORIGINAL COPY

CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

LAB Order ID #

99122114

ANALYSIS REQUEST

(Circle or Specify Method No.)

MTBE 8021B/602	TPH 418.1/TX1005	PAH 8270C	Total Metals Ag As Ba Cd Cr Pb Se Hg 6010B/200.7	TCLP Metals Ag As Ba Cd Cr Pb Se Hg	TCLP Volatiles	TCLP Semi Volatiles	TCLP Pesticides	RCI	GC-MS Vol. 8260B/624	GC/MS Semi. Vol. 8270C/625	PCB's 8082/608	Pesticides 8081A/608	BOD, TSS, pH	Turn Around Time if different from standard
8260 + BTEX	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	

REMARKS:

LAB USE ONLY

Intact ☒ N

Headspace ☒ Y ☒ N

Temp 40.0 °

Log-in Review *MS*

Carrier #

6701 Aberdeen Avenue, Ste. 9
Lubbock, Texas 79424
Tel (806) 794-1296
Fax (806) 794-1298
1 (800) 378-1296

TraceAnalysis, Inc.

4725 Ripley Dr., Ste A
El Paso, Texas 79922-1028
Tel (915) 585-3443
Fax (915) 585-4944
1 (888) 588-3443

Company Name:

BBC International Tax

Address: _____ (Street, City, Zip)

1324 W. Marland Hobbs, UM 88340 (505) 397-0397

Contact Person: CLIFF P. BRUNSON

Invoice to:

(If different from above) Shell + P Company AT+N: Wayne Ham: 1 tons

Project Name:

Project Name: Shell Westcott

Sampler Signature:

James Earl Ray

METHOD	MATRIX	SAMPLING

LAB # (LAB USE ONLY)	FIELD CODE	# CONTAIN	Volume/Am	WATER	SOIL	AIR	SLUDGE	HCL	HNO3	ICE	NONE	DATE	TIME
137880	Gmw-6	2	VOA	✓								12/24/04	4:10pm
85	Gmw-7	1	11.7eq	✓						✓		"	4:45pm
	Gmw-7	2	VOA	✓							✓	"	11:45pm
86	Gmw-8	1	11.7eq	✓						✓		"	5:00pm
	Gmw-8	2	VOA	✓							✓	"	5:00pm
87	Gmw-9	1	11.7eq	✓						✓		"	5:15pm
	Gmw-9	2	VOA	✓							✓	"	5:15pm
88	Gmw-10	1	11.7eq	✓						✓		"	4:30pm
	Gmw-10	2	VOA	✓							✓	"	4:30pm
89	Gmw-11	1	11.7eq	✓						✓		"	9:10pm
	Gmw-11	2	VOA	✓							✓	"	9:10pm

Relinquished by:

DATE:

17.7.99 12:30

Date: _____ Time: _____

Required by:

Date: _____ Time: _____

Conclusion:

/

10

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	67	68	69	70	71	72	73	74	75	76	77	78	79	80	81	82	83	84	85	86	87	88	89	90	91	92	93	94	95	96	97	98	99	100	101	102	103	104	105	106	107	108	109	110	111	112	113	114	115	116	117	118	119	120	121	122	123	124	125	126	127	128	129	130	131	132	133	134	135	136	137	138	139	140	141	142	143	144	145	146	147	148	149	150	151	152	153	154	155	156	157	158	159	160	161	162	163	164	165	166	167	168	169	170	171	172	173	174	175	176	177	178	179	180	181	182	183	184	185	186	187	188	189	190	191	192	193	194	195	196	197	198	199	200	201	202	203	204	205	206	207	208	209	210	211	212	213	214	215	216	217	218	219	220	221	222	223	224	225	226	227	228	229	230	231	232	233	234	235	236	237	238	239	240	241	242	243	244	245	246	247	248	249	250	251	252	253	254	255	256	257	258	259	260	261	262	263	264	265	266	267	268	269	270	271	272	273	274	275	276	277	278	279	280	281	282	283	284	285	286	287	288	289	290	291	292	293	294	295	296	297	298	299	300	301	302	303	304	305	306	307	308	309	310	311	312	313	314	315	316	317	318	319	320	321	322	323	324	325	326	327	328	329	330	331	332	333	334	335	336	337	338	339	340	341	342	343	344	345	346	347	348	349	350	351	352	353	354	355	356	357	358	359	360	361	362	363	364	365	366	367	368	369	370	371	372	373	374	375	376	377	378	379	380	381	382	383	384	385	386	387	388	389	390	391	392	393	394	395	396	397	398	399	400	401	402	403	404	405	406	407	408	409	410	411	412	413	414	415	416	417	418	419	420	421	422	423	424	425	426	427	428	429	430	431	432	433	434	435	436	437	438	439	440	441	442	443	444	445	446	447	448	449	450	451	452	453	454	455	456	457	458	459	460	461	462	463	464	465	466	467	468	469	470	471	472	473	474	475	476	477	478	479	480	481	482	483	484	485	486	487	488	489	490	491	492	493	494	495	496	497	498	499	500	501	502	503	504	505	506	507	508	509	510	511	512	513	514	515	516	517	518	519	520	521	522	523	52
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Submission of samples constitutes agreement to Terms and Conditions listed on reverse side of C.O.C.

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CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

LAB Order ID #

ANALYSIS REQUEST

(Circle or Specify Method No.)

[illegible]

LAB USE ONLY

Intact Φ/N

SECRET

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Temp 70.7

Log in Design

Log-III Review ~~200~~

Carrier #

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6701 Aberdeen Avenue, Ste. 9
Lubbock, Texas 79424
Tel (806) 794-1296
Fax (806) 794-1298
1 (800) 378-1296

TraceAnalysis, Inc.

4725 Ripley Dr., Ste A
El Paso, Texas 79922-1028
Tel (915) 585-3443
Fax (915) 585-3444
1 (888) 588-3443

CHAIN-OF-CUSTODY AND ANALYSIS REQUEST

LAB Order ID #

99122114

Company Name:

BBC International, Inc.

Phone #:

(505) 397-6388

Address:

(Street, City, Zip)

1384 W. Marland, Hobbs, NM 88240 (505) 397-0397

Contact Person:

Cliff P. Brunson

Invoice to:

(If different from above) Shell E-P Company Attn: Wayne Hamilton

Project #:

Project Name:

Shell Westgate

Project Location:

Hobbs, NM

Sampler Signature:

David Paul Wally

LAB # (LAB USE ONLY)	FIELD CODE	# CONTAINERS	Volume/Amount	MATRIX				PRESERVATIVE METHOD				DATE	TIME
				WATER	SOIL	AIR	SLUDGE	HCL	HNO3	ICE	NONE		
90	TMW-1	2	VOA	✓								12/20/99	11:25am
	TMW-1	1	11:25am	✓								"	11:25am
91	TMW-2	2	VOA	✓								"	11:25am
	TMW-2	1	11:25am	✓								"	11:25am
92	TMW-3	2	VOA	✓								"	10:45am
	TMW-3	1	11:25am	✓								"	10:45am
93	TMW-4	2	VOA	✓								"	10:20am
	TMW-4	1	11:25am	✓								"	10:20am
94	TMW-5	2	VOA	✓								"	10:00am
	TMW-5	1	11:25am	✓								"	10:00am
95	Tri-P BLANK	2	VOA	✓								"	10:00am

Relinquished by:

Date:

Time:

Received by:

Date:

Time:

Received by:

Date:

Time:

REMARKS:

LAB USE ONLY

Relinquished by:

Date:

Time:

Received by:

Date:

Time:

Received by:

Date:

Time:

Intact

Y / N

Headspace

Y / N

Temp

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Log-in Review

Carrier #

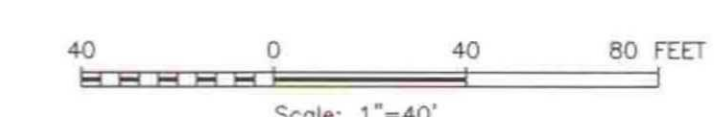
Submittal of samples constitutes agreement to Terms and Conditions listed on reverse side of C.O.C.

ORIGINAL COPY



NOTE:
THE INFORMATION AND
INTERPRETATION CONTAINED
ON THIS MAP ARE PRELIMINARY
AND MAY CHANGE BASED UPON
COMMENTS FROM NMOC.

- LEGEND
- /// DENOTES EXCAVATED AREA
 - DENOTES PROPOSED PARK CURVE-OUT
 - DENOTES EXISTING RESIDENCE
 - DENOTES DIRT LEASE ROAD
 - DENOTES NEW EXCAVATION SITE
 - TSB - DENOTES TASKER SOIL BORING
 - GSB - DENOTES GRIMES SOIL BORING
 - TMW - DENOTES TASKER MONITOR WELL
 - GMW - DENOTES GRIMES MONITOR WELL
 - GBS - DENOTES SURFACE SAMPLES PRIOR TO EXCAVATION
 - GBN - DENOTES SURFACE SAMPLES AFTER EXCAVATION
 - GBS - DENOTES SURFACE SAMPLES AFTER EXCAVATION



BBC INTERNATIONAL, INC. / ARCADIS GERAGHTY & MILLER

GRIMES BATTERY & TASKER ROAD
GROUND WATER ELEVATION/GRADIENT
MEASURED 9/24/99

CONTOURS DEPICTED ON THIS DRAWING BASED ON INTERPRETATION BY S. HALL

SURVEYED BY: LAWLESS	DRAWN BY: D. McCARLEY	REV. DATE: 3/28/00
DATE BEGIN: 5/11/98	DATE: 8/13/98	FILE NAME: FIGURE Q1
DATE END: 9/1/98	CHECKED BY:	SHEET 1 OF 1
PROJECT #: 98110738	DISK #: BBC	Scale: 1"=40'

D-947
FIGURE Q1

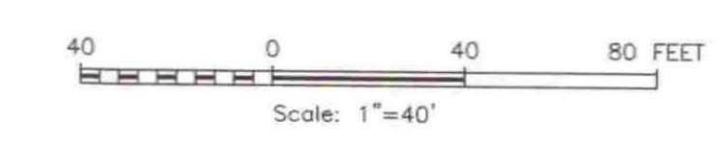
JOHN WEST SURVEYING COMPANY
HOBBBS, NEW MEXICO





NOTE:
THE INFORMATION AND
INTERPRETATION CONTAINED
ON THIS MAP ARE PRELIMINARY
AND MAY CHANGE BASED UPON
COMMENTS FROM NMOCD.

- LEGEND
- /// DENOTES EXCAVATED AREA
 - DENOTES PROPOSED PARK CURVE-OUT
 - DENOTES EXISTING RESIDENCE
 - - - DENOTES DIRT LEASE ROAD
 - DENOTES NEW EXCAVATION SITE
 - TSB - DENOTES TASKER SOIL BORING
 - GSB - DENOTES GRIMES SOIL BORING
 - TMW - DENOTES TASKER MONITOR WELL
 - GMW - DENOTES GRIMES MONITOR WELL
 - GBS- DENOTES SURFACE SAMPLES PRIOR TO EXCAVATION
 - GBN- DENOTES SURFACE SAMPLES AFTER EXCAVATION
 - ND = NOT DETECTED



BBC INTERNATIONAL, INC. / ARCADIS GERAGHTY & MILLER

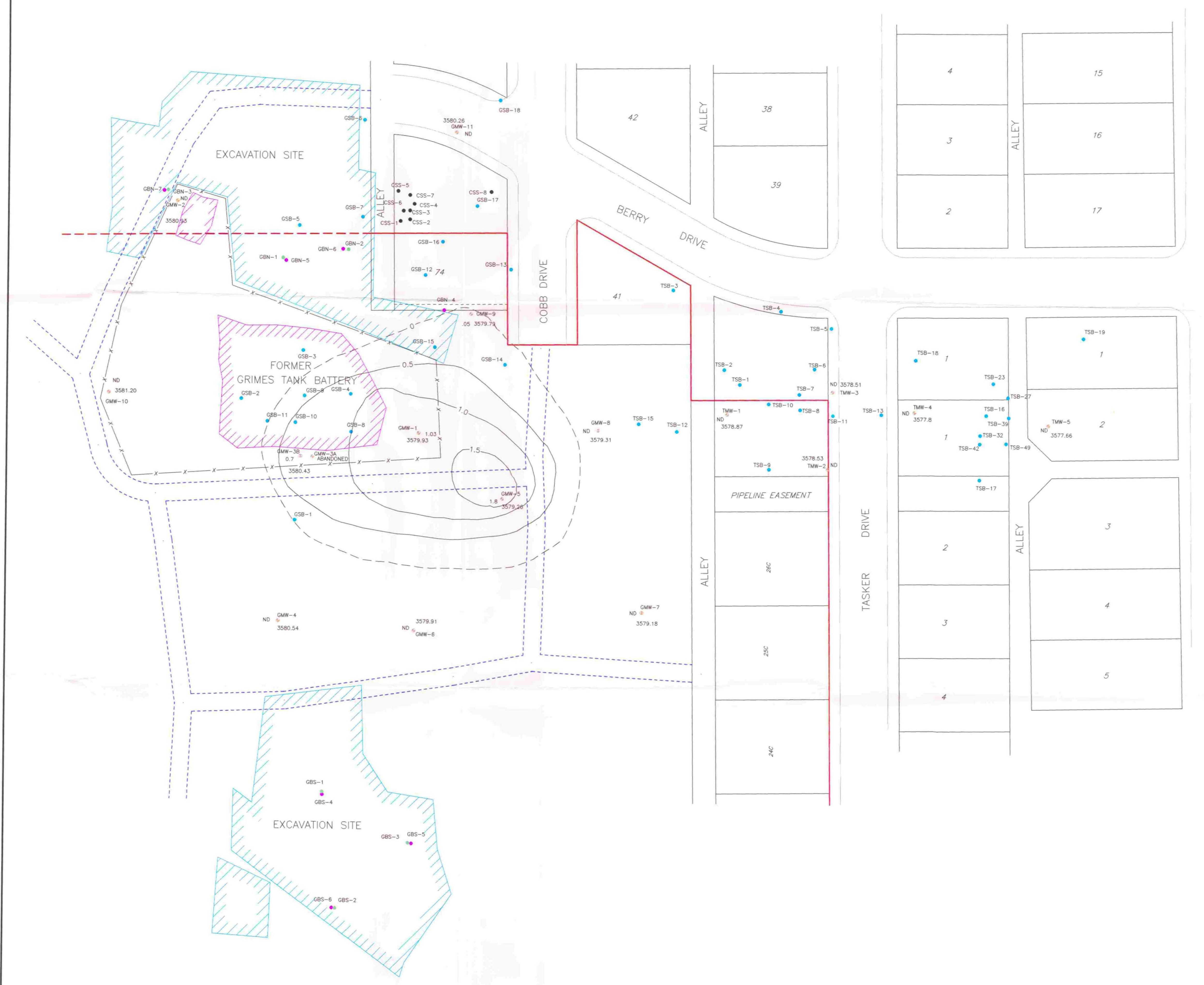
GRIMES BATTERY & TASKER ROAD
LNAPL THICKNESS
(CONTOUR INTERVAL = 0.5 FEET)
DATE MEASURED: 9/24/99

CONTOURS DEPICTED ON THIS DRAWING BASED ON INTERPRETATION BY S. HALL

SURVEYED BY: LAWLESS	DRAWN BY: D. McCARLEY	REV. DATE: 3/28/00
DATE BEGIN: 5/11/98	DATE: 8/13/98	FILE NAME: FIGURE02
DATE END: 8/1/98	CHECKED BY:	SHEET 1 OF 1
PROJECT #: 98110738	DISK #: BBC	Scale: 1"=40'

D-847
FIGURE Q2

JOHN WEST SURVEYING COMPANY
HOBBS, NEW MEXICO



NOTE:
THE INFORMATION AND
INTERPRETATION CONTAINED
ON THIS MAP ARE PRELIMINARY
AND MAY CHANGE BASED UPON
COMMENTS FROM NMOCD.

LEGEND
DENOTES EXCAVATED AREA
DENOTES PROPOSED PARK CARVE-OUT
DENOTES EXISTING RESIDENCE
DENOTES DIRT LEASE ROAD
DENOTES NEW EXCAVATION SITE

TSB - DENOTES TASKER SOIL BORING
GSB - DENOTES GRIMES SOIL BORING
TMW - DENOTES TASKER MONITOR WELL
GMW - DENOTES GRIMES MONITOR WELL
GBS - DENOTES SURFACE SAMPLES PRIOR TO EXCAVATION
GBN - DENOTES SURFACE SAMPLES AFTER EXCAVATION
GBN - DENOTES SURFACE SAMPLES AFTER EXCAVATION
ND = NOT DETECTED

TASKER MONITOR WELL #	UG/L	BENZENE	ETHYLBENZENE	TOLUENE	M,P-XYLENE	O-XYLENE
TMW-1	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
TMW-2	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
TMW-3	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
TMW-4	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
TMW-5	RESULT	<2	30	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2

GRIMES MONITOR WELL #	UG/L	BENZENE	ETHYLBENZENE	TOLUENE	M,P-XYLENE	O-XYLENE
GMW-1	RESULT	31	180	9.3	470	250
	DETECTION LIMIT	5	5	5	5	5
GMW-2	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
GMW-3B	RESULT	8.7	100	<5	400	180
	DETECTION LIMIT	5	5	5	5	5
GMW-4	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
GMW-5	RESULT	<50	400	<50	1,700	690
	DETECTION LIMIT	50	50	50	50	50
GMW-6	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
GMW-7	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
GMW-8	RESULT	<2	<2	<2	2.3	<2
	DETECTION LIMIT	2	2	2	2	2
GMW-9	RESULT	<5	60	<5	110	75
	DETECTION LIMIT	5	5	5	5	5
GMW-10	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
GMW-11	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2

40 0 40 80 FEET
Scale: 1"=40'

BBC INTERNATIONAL, INC. / ARCADIS GERAGHTY & MILLER

GRIMES BATTERY & TASKER ROAD
TOTAL BTEX CONCENTRATIONS IN GROUNDWATER
CONTOUR INTERVAL AS SHOWN
SAMPLE DATE: 9/24/99 AND 9/28/99

CONTOURS DEPICTED ON THIS DRAWING BASED ON INTERPRETATION BY S. HALL

SURVEYED BY: LAWLESS DRAWN BY: D.McCARLEY REV. DATE: 3/28/00
DATE BEGIN: 5/11/98 DATE: 8/13/98 FILE NAME: FIGURE Q3
DATE END: 9/1/98 CHECKED BY: SHEET 1 OF 1
PROJECT #: 98110739 DISK #: BBC Scale: 1"=40'

D-847

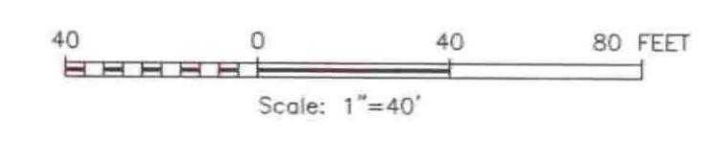
FIGURE Q3

JOHN WEST SURVEYING COMPANY
HOBBS, NEW MEXICO



NOTE:
THE INFORMATION AND
INTERPRETATION CONTAINED
ON THIS MAP ARE PRELIMINARY
AND MAY CHANGE BASED UPON
COMMENTS FROM NMOCD.

- LEGEND**
- /// DENOTES EXCAVATED AREA
 - DENOTES PROPOSED PARK CARVE-OUT
 - DENOTES EXISTING RESIDENCE
 - - - DENOTES DIRT LEASE ROAD
 - DENOTES NEW EXCAVATION SITE
 - TSB - DENOTES TASKER SOIL BORING
 - GSB - DENOTES GRIMES SOIL BORING
 - TMW - DENOTES TASKER MONITOR WELL
 - GMW - DENOTES GRIMES MONITOR WELL
 - GBS - DENOTES SURFACE SAMPLES PRIOR TO EXCAVATION
 - GBN - DENOTES SURFACE SAMPLES AFTER EXCAVATION
 - GBS - DENOTES SURFACE SAMPLES PRIOR TO EXCAVATION
 - GBN - DENOTES SURFACE SAMPLES AFTER EXCAVATION



BBC INTERNATIONAL, INC. / ARCADIS GERAGHTY & MILLER

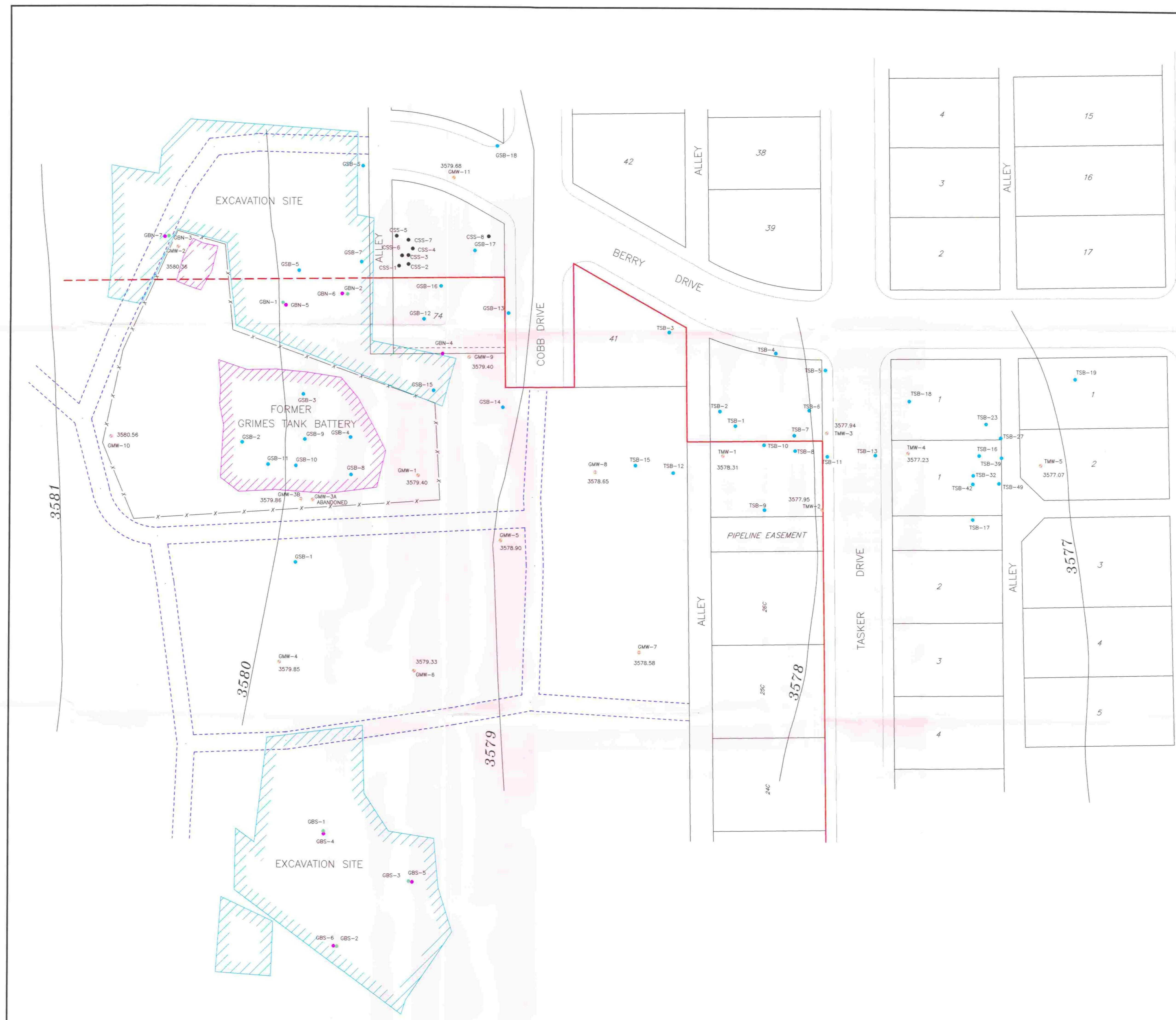
GRIMES BATTERY & TASKER ROAD
GROUND WATER ELEVATION/GRADIENT
MEASURED 12/20/99

CONTOURS DEPICTED ON THIS DRAWING BASED ON INTERPRETATION BY S. HALL

SURVEYED BY: LAWLESS	DRAWN BY: D. McCARLEY	REV. DATE: 3/28/00	D-047
DATE BEGIN: 5/11/98	DATE: 8/13/98	FILE NAME: FIGURE Q4	
DATE END: 9/11/98	CHECKED BY:	SHEET 1 OF 1	
PROJECT #: 98110738	DISK #: BBC	Scale: 1"=40'	

FIGURE Q4

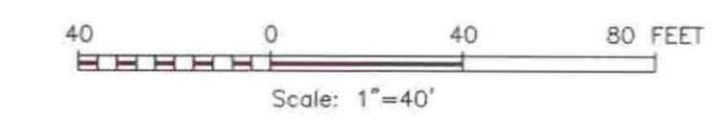
JOHN WEST SURVEYING COMPANY
HOBBS, NEW MEXICO





NOTE:
THE INFORMATION AND
INTERPRETATION CONTAINED
ON THIS MAP ARE PRELIMINARY
AND MAY CHANGE BASED UPON
COMMENTS FROM NMOC.

- LEGEND
- DENOTES EXCAVATED AREA
 - DENOTES PROPOSED PARK CURVE-OUT
 - DENOTES EXISTING RESIDENCE
 - DENOTES DIRT LEASE ROAD
 - DENOTES NEW EXCAVATION SITE
 - TSB - DENOTES TASKER SOIL BORING
 - GSB - DENOTES GRIMES SOIL BORING
 - TMW - DENOTES TASKER MONITOR WELL
 - GMW - DENOTES GRIMES MONITOR WELL
 - GBS - DENOTES SURFACE SAMPLES PRIOR TO EXCAVATION
 - GBN - DENOTES SURFACE SAMPLES PRIOR TO EXCAVATION
 - GBS - DENOTES SURFACE SAMPLES AFTER EXCAVATION
 - GBN - DENOTES SURFACE SAMPLES AFTER EXCAVATION
 - ND = NOT DETECTED



BBC INTERNATIONAL, INC. / ARCADIS GERAGHTY & MILLER

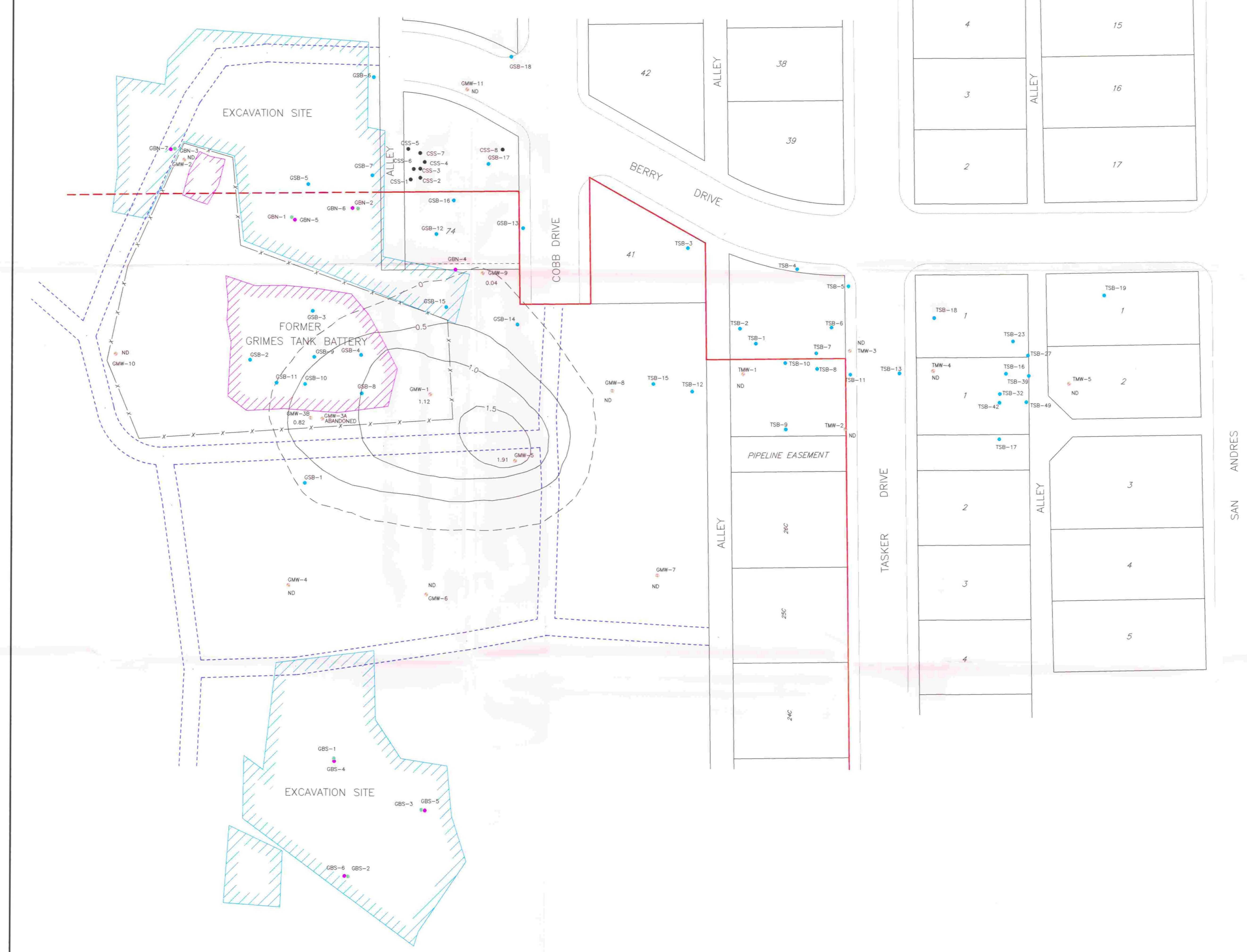
GRIMES BATTERY & TASKER ROAD

LNAPL THICKNESS
(CONTOUR INTERVAL = 0.5 FEET)
DATE MEASURED: 12/20/99

CONTOURS DEPICTED ON THIS DRAWING BASED ON INTERPRETATION BY S. HALL

SURVEYED BY: LAWLESS	DRAWN BY: D. McCARLEY	REV. DATE: 3/28/00	D-847
DATE BEGIN: 5/11/98	DATE: 8/13/98	FILE NAME: FIGURE Q5	FIGURE Q5
DATE END: 9/1/98	CHECKED BY:	SHEET 1 OF 1	
PROJECT #: 08110738	DISK #: BBC	Scale: 1"=40'	

JOHN WEST SURVEYING COMPANY
HOBBBS, NEW MEXICO



NOTE:
THE INFORMATION AND
INTERPRETATION CONTAINED
ON THIS MAP ARE PRELIMINARY
AND MAY CHANGE BASED UPON
COMMENTS FROM NMOCD.

- LEGEND
- /// DENOTES EXCAVATED AREA
 - DENOTES PROPOSED PARK CURVE-OUT
 - DENOTES EXISTING RESIDENCE
 - DENOTES DIRT LEASE ROAD
 - DENOTES NEW EXCAVATION SITE
 - TSB - DENOTES TASKER SOIL BORING
 - GSB - DENOTES GRIMES SOIL BORING
 - TMW - DENOTES TASKER MONITOR WELL
 - GMW - DENOTES GRIMES MONITOR WELL
 - GBS - DENOTES SURFACE SAMPLES PRIOR TO EXCAVATION
 - GBN - DENOTES SURFACE SAMPLES AFTER EXCAVATION
 - GBS - DENOTES SURFACE SAMPLES PRIOR TO EXCAVATION
 - GBN - DENOTES SURFACE SAMPLES AFTER EXCAVATION
 - ND = NOT DETECTED

TASKER MONITOR WELL #	UG/L	BENZENE	ETHYLBENZENE	TOLUENE	M,P-XYLENE	O-XYLENE
TMW-1	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
TMW-2	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
TMW-3	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
TMW-4	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
TMW-5	RESULT	<2	19.69	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2

GRIMES MONITOR WELL #	UG/L	BENZENE	ETHYLBENZENE	TOLUENE	M,P-XYLENE	O-XYLENE
GMW-1	RESULT	22	113	28	565	169
	DETECTION LIMIT	2	2	2	2	2
GMW-2	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
GMW-3B	RESULT	<10	30	<10	202	52
	DETECTION LIMIT	10	10	10	10	10
GMW-4	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
GMW-5	RESULT	24	254	27	1,969	458
	DETECTION LIMIT	2	2	2	2	2
GMW-6	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
GMW-7	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
GMW-8	RESULT	<2	<2	<2	2.60	<2
	DETECTION LIMIT	2	2	2	2	2
GMW-9	RESULT	<2	25.01	<2	102.56	34.47
	DETECTION LIMIT	2	2	2	2	2
GMW-10	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2
GMW-11	RESULT	<2	<2	<2	<2	<2
	DETECTION LIMIT	2	2	2	2	2

Scale: 1"=40'

BBC INTERNATIONAL, INC. / ARCADIS GERAGHTY & MILLER

GRIMES BATTERY & TASKER ROAD
TOTAL BTEX CONCENTRATIONS IN GROUNDWATER
CONTOUR INTERVAL AS SHOWN
SAMPLE DATE: 12/21/99

CONTOURS DEPICTED ON THIS DRAWING BASED ON INTERPRETATION BY S. HALL
SURVEYED BY: LAWLESS DRAWN BY: D.McCARLEY REV. DATE: 3/28/00
DATE BEG: 5/11/98 DATE: 8/13/98 FILE NAME: FIGURE06
DATE END: 9/1/98 CHECKED BY: SHEET 1 OF 1
PROJECT #: 98110738 DISK #: BBC Scale: 1"=40'

JOHN WEST SURVEYING COMPANY
HOBBES, NEW MEXICO

D-047

FIGURE Q6