92428

Environmental Resources Management, Inc.

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24 February 1992

Ms. Debra Rossi
Remedial Project Manager
U. S. EPA Region III
841 Chestnut Building
Philadelphia, Pa. 19107

File No.: C64-01-00-01

Re: Woodlawn Transfer Station
Cecil County, Maryland
Data Validation Package

Dear Ms. Rossi:

Environmental Resources Management, Inc (ERM) is forwarding to you a revised data validation package for the Woodlawn Transfer Station. In our rush to get to you the validated data package we neglected to include in the Analytical Quality Assurance Report the data for Total Organic Carbon (TOC). The TOC information has been included in this revised report, there has been no change to any other data in the report. Enclosed please find a revised cover page; Attachment 1 Methodology Summary; Attachment 2, Method References; Table 1-1 Summary of Sample Data Reviewed; and Attachment 3, Data Summary Tables Soil Analytical Results. Please replace these pages with the original report. As indicated before, this data is being sent to you in advance of the report at your specific request so that IT Corp can incorporate it into the risk assessment.

If you have any questions, please call me at 410-266-0006.

Sincerely,

Joseph P. Lewandowski

JPL/mwj

cc: B. Belford w/o attachment
K. Gaynor w/o attachment
Diane Sims w/attachment
EPA CRL
Acting Chief Program Support section

Environmental Resources Management, Inc.

855 Springdale Drive • Exton, Pennsylvania 19341 • (215) 524-3500 • Fax One: 524-7335 • Fax Two: 524-7798

5 February 1992

Ms. Debra Rossi
Remedial Project Manager
U.S. EPA Region III
841 Chestnut Building
Philadelphia, PA 19107

File No.: C64-01-00-01

Re: Woodlawn Transfer Station
Cecil County, Maryland
Data Validation Package

Dear Ms. Rossi:

Pursuant to your request, Environmental Resources Management, Inc. (ERM) is forwarding to you the data validation package for the Woodlawn Transfer Station. This additional field work was performed on December 5, 1991 in accordance with Work Plan Addendum No. 2 Septic System Investigation Woodlawn Transfer Station Cecil County, Maryland 8 November 1991 and subsequent comments dated 27 November 1991 in a letter to you from ERM.

This data is being sent to you in advance of the report at your specific request so that IT Corp can incorporate it into the risk assessment.

The comprehensive report for all the site investigation activities will be submitted to you on or before March 13, 1992.

If you have any questions, please call me at (410) 266-0006.

Sincerely,

David R. Blye for:
Joseph P. Lewandowski

JPL/mwj

cc: K. Gaynor w/o attachment
B. Belford w/o attachment

Diann Sims w/attachment
EPA CRL
Acting Chief Program Support Section

ANALYTICAL QUALITY ASSURANCE REPORT
WOODLAWN PROPERTY TRANSFER
CECIL COUNTY, MARYLAND
SOIL SAMPLES
COLLECTED ON 5 DECEMBER 1991

5 February 1992

(Revised 20 February 1992)

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Prepared For:
Woodlawn Property Transfer
Cecil County, Maryland

Prepared By:
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File No.: C64-01-00-01

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SECTION 1
INTRODUCTION

The following analytical quality assurance report is based upon a review of analytical data generated from soil samples and associated blind travel and equipment blanks collected on 5 December 1991 at the Woodlawn Property Transfer site, located in Cecil County, Maryland. A list of the samples that are included in this review are presented in Table 1-1. The analytical methods which were used for these analyses are summarized and referenced in Attachments 1 and 2, respectively. Data summary tables presenting the validated and/or qualified analytical results are included in Attachment 3.

All data for these analyses were reviewed for adherence to the specified analytical protocols. All results have been validated or qualified according to general guidance provided in the "Laboratory Data Validation Functional Guidelines for Evaluating Organic (and Inorganic) Analyses" (US EPA, 2/88 and 7/88).

Table 1-1
Summary Of Sample Data Reviewed
Woodlawn Property Transfer
Cecil County, Maryland

ERM Traffic Report Number	Sample Location	Matrix	Sample Date	Laboratory ID Number	Analyses Performed
41310	SS-2	Soil	12/5/91	34297	[1]
41328	SS-4 (Blind Field Duplicate of SS-2)	Soil	12/5/91	34302	[1]
41313	TSB-5 (2'-4')	Soil	12/5/91	34298	[1]
41314	TSB-5 (4'-6')	Soil	12/5/91	34299	[1]
41321	TSB-6 (4'-6')	Soil	12/5/91	34300	[1]
41327	EB-1 (Eqipment Blank)	Aqueous	12/5/91	34301	[1]
41329	Trip Blank	Aqueous	12/5/91	34303	[2]

[1] - TCL Volatile Organic Compounds, TCL Semivolatile Organic Compounds, TCL Pesticide/PCBs, TAL Inorganics, & Total Organic Carbon (TOC).

[2] - TCL Volatile Organic Compounds.

SECTION 2
ORGANIC DATA

The organic analyses of the soil samples and associated travel and equipment blanks were performed by Gulf State Analytical, Inc., of Houston, Texas. These samples were analyzed for US EPA Contract Laboratory Program (CLP) Target Compound List (TCL) volatile and semivolatile organic compounds and pesticide/PCBs according to the protocols specified in the CLP Statement of Work for Organic Analyses (SOW 3/90). Individual analyses performed for these samples are summarized on the Table 1-1. For the organic fractions analyzed by GC/MS, mass spectral library searches were performed to match sample spectra whose characteristics did not resemble those of the targeted compounds. This was performed for up to ten volatile and twenty semivolatile extraneous peaks. Validated results for these library searches are found in the data summary tables under the heading "Tentatively Identified Compounds" (TICs).

The findings offered in this report are based on a detailed review of the following criteria reported according to the CLP deliverables format: laboratory method and field blank results, surrogate compound spike results, matrix spike/matrix spike duplicate recovery results, laboratory and field duplicate analysis results, bromofluorobenzene (BFB) and decafluorotriphenylphosphine (DFTPP) mass tuning results, initial and continuing calibrations, internal standard area performance, pesticide/PCB resolution check sample results, DDD/Endrin breakdown, pesticide compound retention time shifts, quantitation of results, and qualitative mass spectral interpretation.

The organic analyses were performed acceptably, but require a few qualifying statements. It is recommended that the reported analytical results be used only with the qualifying statements provided below. Any aspects of the data which are not qualified in this report should be considered qualitatively and quantitatively valid as reported based on the criteria evaluated. Validated and/or qualified results for the samples are provided in Attachment 3.

2.1 Soil Organic Data Qualifiers

- The positive results reported for bis(2-ethylhexyl)phthalate, dimethylphthalate, and phenanthrene in the soil samples listed in

Table 2-1 are considered qualitatively invalid due to the levels at which these compounds were present in the associated laboratory laboratory method, equipment, and/or travel blanks. US EPA protocol requires that positive results for common laboratory contaminants, such as bis(2-ethylhexyl)phthalate and dimethylphthalate that are less than or equal to ten times the method, equipment, and/or travel blank contamination levels to be qualified as qualitatively invalid. Also, positive results for uncommon laboratory contaminants, such as phenanthrene that are less than or equal to five times the laboratory method, equipment, and/or travel blank contamination levels to be qualified as qualitatively invalid. This has been indicated by placing "B" qualifiers next to the reported quantitative results for bis(2-ethylhexyl)phthalate, dimethylphthalate, and phenanthrene on the data summary tables for these samples.

- The positive results and/or quantitation limits for semivolatile organic compounds in the soil sample SS-4 should be considered a quantitative estimates and may be higher than reported. The holding times for the extraction of this sample for semivolatile organic compounds exceeded the 14-day extraction technical holding time mandated by SW-846 for soil samples. The holding time for this sample was exceeded by 11 days. Because this sample was extracted outside the allowable holding time, loss or degradation of these specified parameters may have occurred. The positive results for semivolatile organic compounds in this sample are marked with "J" qualifiers on the data summary tables to indicate that they are quantitative estimates. The elevated quantitation limits should be noted when assessing the data for the qualitative absence of nondetected semivolatile organic compounds in this sample.

- The positive results reported for acetone in soil samples TSB-5 (2'-4') and TSB-5 (4'-6') should be considered quantitative estimates. The percent difference (%D) between the initial calibration average relative response factor (RRF) and associated continuing calibration relative response factors (RRFs) exceeded the quality control limit of 25 percent. This indicates lack of instrument stability for the analysis of this compound. ERM has placed "J" qualifiers next to reported quantitative results for acetone in these samples on the data summary table to indicate that they are quantitative estimates.

TABLE 2-1
SOIL SAMPLES WITH QUALITATIVELY INVALID ORGANIC RESULTS

Compound	Affected Samples
Bis(2-ethylhexyl)phthalate	SS-2, TSB-6 (4'-6').
Dimethylphthalate	TSB-5 (4'-6').
Phenanthrene	TSB-5 (2'-4'), TSB-5 (4'-6').

- Area counts for the semivolatile internal standards chrysene-d_{12}, perylene-d_{12}, and/or phenanthrene-d_{10}, 1,4-dichlorobenzene-d_4, and acenaphthene-d_{10} were below the quality control limits during the initial semivolatile organic compound analysis of the soil samples listed in Table 2-2. Reanalysis of these samples also resulted in low internal standard area counts for these soil samples. This indicates a substantial drop in instrument sensitivity and/or system performance for the compounds quantitated with these internal standards. Sample results have been reported using the analysis in which the internal standard areas were closer to those of the associated continuing calibration standard. Positive results that are quantitated using these internal standards should be considered quantitative estimates. This has been indicated by placing a "J" qualifier next to the quantitative result on the sample data summary tables. It should be noted that quantitation limits may also be elevated for non-detected semivolatile organic compounds for these soil samples.

- The soil samples listed in Table 2-3 were reanalyzed at dilutions for volatile organic compounds. These dilutions were required because the concentrations of volatile organic compounds toluene and/or xylene (total) detected in the initial analysis exceeded the linear range of the instrument. Positive sample results for these volatile organic compounds in these samples have been reported from diluted analyses. All other results and quantitation limits for these samples are reported from the initial analysis.

- Semivolatile organic compounds and pesticide/PCBs were detected in soil sample SS-4 and its blind field duplicate SS-4 at significantly different concentrations. The relative percent difference (RPD) of these compounds for positive results in the original samples and its blind duplicate were calculated and are summarized in the Table 2-4. The RPD for the semivolatile organic compounds and pesticide/PCBs which were detected only in sample SS-4 could not be calculated and are not shown on Table 2-4.

  The calculated RPDs for the these pesticides/PCBs exceeded ERM's duplicate precision creteria of 35% for soil pesticides/PCBs analyses. These elevated RPDs indicate a lack of sample homogeneity or analytical precision for these compounds. This has been inidicated by placing a "J" qualifier next to the quantitative results for these compounds in the original samples

TABLE 2-2
SOIL SAMPLES WITH LOW INTERNAL STANDARD AREAS FOR SEMIVOLATILE ORGANIC COMPOUNDS

Sample	Internal Standards with Low Areas
SS-2	Phenanthrene-d_{10} Chrysene-d_{12} Perylene-d_{12}
SS-2 RE	Phenanthrene-d_{10} Chrysene-d_{12} Perylene-d_{12}
TSB-5 (2'-4')	Phenanthrene-d_{10} Chrysene-d_{12} Perylene-d_{12}
TSB-5 (2'-4') RE	Phenanthrene-d_{10} Chrysene-d_{12} Perylene-d_{12}
TSB-5 (4'-6')	1,4-Dichlorobenzene Phenanthrene-d_{10} Chrysene-d_{12} Perylene-d_{12}
TSB-5 (4'-6') RE	Phenanthrene-d_{10} Chrysene-d_{12} Perylene-d_{12}
TSB-6 (4'-6')	Chrysene-d_{12} Perylene-d_{12}
TSB-6 (4'-6') RE	Chrysene-d_{12} Perylene-d_{12}

TABLE 2-2 (CONTINUED)
SOIL SAMPLES WITH LOW INTERNAL STANDARD AREAS FOR SEMIVOLATILE ORGANIC COMPOUNDS

Sample	Internal Standards with Low Areas
SS-4	Acenaphthene-d_{10}
	Phenanthrene-d_{10}
	Chrysene-d_{12}
	Perylene-d_{12}
SS-4 RE	Phenanthrene-d_{10}
	Chrysene-d_{12}

TABLE 2-3
SOIL SAMPLES REANALYZED FOR VOLATILES AT DILUTIONS

Sample	Fraction	Dilution Factor
TSB-5 (2'-4')	volatile	2.5 and 5
TSB-5 (4'-6')	volatile	2 and 5

TABLE 2-4
SUMMARY OF BLIND FIELD DUPLICATE SEMIVOLATILE ORGANIC COMPOUNDS AND PESTICIDE/PCBS RESULTS AND PRECISION

Compoud	SS-2	SS-4 (Blind Duplicate)	RPD (%)
Endosulfan I	410 µg/Kg	250 µg/Kg	49
Endosulfan II	280 µg/Kg	180 µg/Kg	44
Alpha Chlordane	180 µg/Kg	100 µg/Kg	57
Benzo(g,h,i)perylene	230 µg/Kg	120 µg/Kg	63

and their blind duplicates, respectively, on the data summary table. ERM conservatively recommends use of the highest concentrations reported for these compounds.

- As required by US EPA protocols, all tentatively identified compounds (TICs) detected in soil samples have been marked with "J" qualifiers in the data summary tables to indicate that they are quantitative estimates. ERM has regrouped the TICs according to chemical classification and reported on the data summary table only those TICs which are demonstrated not to be the result of laboratory contamination or an instrument artifact.
- As required by US EPA protocol compounds which were qualitatively identified at concentrations below their respective Contract Required Quantitation Limits (CRQLs) have been qualified with "J" qualifiers on the data summary tables to indicate that they are quantitative estimates.

SECTION 3
INORGANIC DATA

The inorganic analyses of soil samples and associated travel and field blanks were performed by Gulf State Analytical, Inc., of Houston, Texas. These samples were analyzed for US EPA Contract Laboratory Program (CLP) Target Analyte List (TAL) metals according to the protocols specified in the CLP Statement of Work for Inorganics Analysis (SOW 7/88). Individual analyses performed for these samples are summarized on the Table 1-1.

The findings offered in this report are based on a detailed review of the following criteria reported according the CLP deliverables format: chain of custody documentation, holding times, laboratory method, travel and field blank analyses, matrix spike recoveries, detection limits, laboratory duplicate analyses, laboratory control samples (LCS), initial and continuing calibration verifications, ICP interference check sample results, ICP serial dilution analyses, graphite furnace atomic absorption duplicate burn precision, post-digestion spike recoveries, and quantitation of positive results.

The inorganic analyses were performed acceptably, but require the following qualifying statements. It is recommended that the data be utilized only with the qualifying statements presented below. Any data which are not qualified in this report should be considered qualitatively and quantitatively valid as reported based on the criteria evaluated. Validated and/or qualified results for the samples are provided on the attached sample data summary tables.

3.1 Soil Inorganic Data Qualifiers

- Positive results reported for antimony, beryllium, and sodium in the soil samples listed in Table 3-1 are considered qualitatively invalid due to the concentrations at which these analytes were present in the associated laboratory method, equipment and/or travel blank. US EPA protocol requires that positive results for contaminants, such as antimony, beryllium, and sodium that are less than or equal to five times the laboratory method, equipment or travel blank contamination levels to be qualified as qualitatively invalid. This has been indicated by placing a "B" qualifier next to the reported quantitative results for these analytes in these samples in the data summary tables.

- The positive results and/or detection limits reported for antimony, arsenic and barium in all soil samples should be considered quantitative estimates and may be higher than reported. The associated matrix spike recoveries for these samples were below the established quality control (QC) limits for these analytes. This has been indicated by placing a "J" qualifier next to the reported quantitative results for antimony (excluding samples SS-2 and SS-4 which have already been qualified as "qualitatively invalid"), arsenic and barium for these samples in the data summary tables. The possibility of elevated detection limits for antimony, arsenic and barium should be noted when considering the data for the qualitative absence of these analytes in these samples.
- The positive results reported for chromium, manganese, and silver in all soil samples should be considered a quantitative estimates and may be lower than reported. The associated matrix spike recoveries were above the established quality control (QC) limits for these analytes. Positive results for chromium, manganese, and silver in soil samples have been marked with "J" qualifiers on the data summary tables to indicate that they are quantitative estimates.
- Because the presence of matrix interferencs were indicated during the graphite furnace post-digestion spike analyses, positive results for arsenic in all soil samples and lead in soil sample TSB-5 (2'-4') were determined by the method of standard addition (MSA). The MSA correlation coefficients were acceptable for all samples.
- The positive results reported for zinc in all the soil samples listed should be considered quantitative estimates. The ICP serial dilution analyses associated with these samples exceeded the allowable 10% difference between the undiluted and diluted analytical results for these analytes. This indicates a physical or chemical interference effect. The fact that the positive results for zinc in the soil are quantitative estimates has been indicated by placing a "J" qualifier next to the reported quantitative results for this analyte on the data summary table.
- Inorganic analytes were detected in soil sample SS-4 and its blind field duplicate SS-4 at significantly different concentrations. The relative percent difference (RPD) of these analytess in the original samples and its blind duplicate were calculated and are

summarized in the Table 3-2. The RPD for the analytes which have already been qualified as "qualitatively invalid" or "quantitative estimates" as a result of earlier finding are not included in this Table 3-2.

The calculated RPDs for the these analytes exceeded ERM's duplicate precision creteria of 35% for soil inorganic analyses. These elevated RPDs indicate a lack of sample homogeneity or analytical precision for these analytes. This has been inidicated by placing a "J" qualifier next to the quantitative results for these compounds in the original samples and their blind duplicates, respectively, on the data summary table. ERM conservatively recommends use of the highest concentrations reported for these analytes.

TABLE 3-1
SOIL SAMPLES WITH QUALITATIVELY INVALID INORGANIC RESULTS

Compound	Affected Samples
Antimony	SS-2, SS-4
Beryllium	TSB-5 (2'-4'), TSB-5 (4'-6'), SS-4
Sodium	SS-2, TSB-5 (4'-6'), TSB-6 (4'-6'), SS-4

TABLE 3-2
SUMMARY OF BLIND FIELD DUPLICATE INORGANIC ANALYTE RESULTS AND PRECISION

Compoud	SS-2	SS-4 (Blind Duplicate)	RPD (%)
Calcium	445 mg/Kg	722 mg/Kg	48
Copper	52.4 mg/Kg	37.4 mg/Kg	33
Lead	86.1 mg/Kg	50 mg/Kg	53
Mercury	1.20 mg/Kg	0.50 mg/Kg	63

SECTION 4
SUMMARY

The analyses were performed acceptably, but required a few qualifying statements. This quality assurance report has identified the aspects of the analytical data that have required qualification. A support documentation package containing specific details discussed in this quality assurance report has been filed with the Woodlawn Property Transfer, Cecil County, Maryland site project.

ATTACHMENT 1
METHODOLOGY SUMMARY

METHODOLOGY SUMMARY

Analysis for Moisture

A well-mixed sample is placed in a weighed beaker and dried to constant weight in an oven at 103-105° C. The decrease in weight of the sample is proportional to the moisture content.

Analysis for Volatile Organic Compounds by GC/MS

The soil samples were analyzed for TCL volatile organic compounds by adding five-gram (wet weight) sample aliquot or 5 mL of water sample to reagent water containing surrogate compounds and internal standards and purging the mixture with helium at ambient temperature. The volatile compounds were transferred from the aqueous phase to the vapor phase and trapped onto a sorbent column. After purging, the column was heated and backflushed to desorb the compounds onto a gas chromatographic column. The gas chromatograph was temperature programmed to separate the sample components, which were then detected by a mass spectrometer. The target compounds were qualitatively identified and quantitated through calibration with standards.

Analysis for Semivolatile Organics by GC/MS

Thirty gram (wet weight) of the soil are extracted with 1:1 methylene chloride and acetone by sonic disruption. The extract is decanted and filtered. The extraction is repeated two or more times, decanting after each sonication. Aqueous samples are extracted with methylene chloride at both acidic and basic pH using a separotory funnel. The extract is then concentrated and analyzed by first seprating the extract components using a gas chromatographic column and then detecting them with a mass spectrometer for qualitative and quantitative evaluation.

METHODOLGY SUMMARY (CONT.)

Analysis for Pesticide/PCBs

Thirty grams of the sample was extracted with 1:1 methylene chloride to acetone using sonication technique for soil analyses. The extract was exchanged with hexane. A 1-liter aqueous sample was extracted with a separatory funnel using methylene chloride. The methylene chloride extract was dried, exchanged with hexane, and adjusted to final volume of 10-milliliters. The resulting extract is analyzed by Gas Chromatography using electron capture detector (ECD).

Analysis for Aluminum, Antimony, Barium, Beryllium, Cadmium, Chromium, Cobalt, Copper, Iron, Magnesium, Manganese, Nickel, Silver, Sodium, Vanadium and Zinc by ICP

Prior to analysis 100-milliliter sample aliquots were digested with nitric and hydrochloric acid. One gram sample aliquots were digested for soil analysis. The solution resulting from the metals digestion is analyzed by Inductively Coupled Plasma (ICP) Emission Spectroscopy.

Analysis for Arsenic, Lead, Thallium and Selenium

Prior to analysis 100-milliliter sample aliquots were digested with nitric and hydrogen peroxide for aqueous analysis. One gram sample aliquots were digested for soil analysis. The solution resulting from the metals digestion is analyzed by Graphite Furnace Atomic Absorption (GFAA).

Analysis for Mercury

The sample is prepared by heating at 95°C with nitric acid, sulfuric acid, potassium permanganate, and potassium persulfate. The analysis is performed by Cold Vapor Atomic Absorption.

Analysis for Total Organic Carbon

Organic carbon in a sample is converted to carbon dioxide (CO_2) by catalytic combustion or wet chemical oxidation. The CO_2 formed can be measured directly by an infrared detector. The amount of CO_2 is directly proportional to the concentration of the carbonaceous material in the sample.

ATTACHMENT 2
METHOD REFERENCES

METHOD REFERENCES

Analysis	Reference
Moisture	US EPA 600/4-79-020, Methods for Chemical Analysis of Water and Wastes, Office of R and D, US EPA -EMSL, Cincinnati, Ohio, March 1983, Method 160.3.
TCL Volatile Organic Compounds	US EPA Contract Laboratory Program SOW 3/90.
TCL Semivolatile Organic Compounds	US EPA Contract Laboratory Program SOW 3/90.
TCL Pesticide/PCBs	US EPA Contract Laboratory Program SOW 3/90.
TAL Metals	US EPA Contract Laboratory Program SOW 3/90.
Total Organic Carbon	US EPA 600/4-79-020, Methods for Chemical Analysis of Water and Wastes, Office of R and D, US EPA -EMSL, Cincinnati, Ohio, March 1983, Method 415.1.

ATTACHMENT 3
SAMPLE DATA SUMMARY TABLES

Soil Analytical Results
Woodlawn Property Transfer
Cecil County, Maryland
(All results are reported on a dry weight basis)

Sample Location	SS-2	SS-4†	TSB-5 (2'-4')	TSB-5 (4'-6')	TSB-6 (4'-6')	EB-1 (Equipment Blank)	Trip Blank
ERM T.R. Number	41310	41328*	41313	41314*	41321	41327	41329
Sample Date	12/5/91	12/5/91	12/5/91	12/5/91	12/5/91	12/5/91	12/5/91
Percent Moisture	18.0	17.0	19.4	16.7	15.3	NA	NA
Units	µg/Kg	µg/Kg	µg/Kg	µg/Kg	µg/Kg	µg/L	µg/L
Volatile Organic Compounds	ND	ND				ND	ND
Acetone	12 U	12 U	32 J	41 J	52	10 U	10 U
Toluene	12 U	12 U	200	56	9 J	10 U	10 U
Ethylbenzene	12 U	12 U	120	100	15	10 U	10 U
Xylene (total)	12 U	12 U	980	1800	25	10 U	10 U
Tentatively Identified Volatile Organic Compounds						ND	ND
Trichlorotrifluoroethane isomer	11 J	10 J					
Alkylcyclohexane isomer			56 J	150 J	100 J		
Total Unknown Aliphatic Hydrocarbons			2400 J	700 J	450 J		
Total Alkylbenzene isomer			930 J	700 J	6 J		
Semivolatile Organic Compounds							NA
1,2,4-Trichlorobenzene	400 U	400 U	410 U	59 J	390 U	10 U	
Naphthalene	400 U	130 J	470	560	390 U	10 U	
2-Methylnaphthalene	400 U	46 J	680	560	390 U	10 U	
Dimethylphthalate	400 U	400 U	410 U	48 B	390 U	10 U	
Acenaphthene	400 U	400 U	410 U	84 J	390 U	10 U	
Dibenzofuran	400 U	400 U	410 U	400 U	390 U	10 U	
Fluorene	400 U	400 U	110 J	97 J	390 U	10 U	
Diethylphthalate	400 U	55 J	410 U	400 U	390 U	10 U	
Phenanthrene	400 U	93 J	180 B	200 B	390 U	10 U	
Di-n-butylphthalate	400 U	89 J	150 J	150 J	57 J	10 U	
Fluoranthene	400 U	53 J	410 U	40 J	390 U	10 U	
Pyrene	400 U	400 U	380 J	290 J	390 U	10 U	
Chrysene	400 U	340 J	410 U	400 U	390 U	10 U	
Bis(2-ethylhexyl)phthalate	830 B	3000 J	2200 J	2900 J	1000 B	4 J	
Di-n-octylphthalate	400 U	400 U	410 U	50 J	390 U	10 U	
Benzo(b)fluoranthene	400 U	320 J	410 U	400 U	390 U	10 U	
Benzo(a)pyrene	400 U	310 J	410 U	400 U	390 U	10 U	
Indeno(1,2,3-cd)pyrene	400 U	350 J	410 U	400 U	390 U	10 U	
Benzo(g,h,i)perylene	400 U	520 J	410 U	400 U	390 U	10 U	
Tentatively Identified Semivolatile Organic Compounds							NA
Total Unknown	9700 J	29000 J	800 J		5000 J		
Total Unknown Aliphatic Hydrocarbon	560 J	830 J	21000 J	27000 J	4600 J		
Total Alkylphenol	3600 J	28000 J			780 J		
Alkyl Cyclohexadiene	450 J				500 J		
Substituted 1-H Indene	540 J	1100 J					
Alkyl Naphthalene			1200 J	1800 J			
Tridecane			870 J	1400 J			
Tetradecane			1600 J	1700 J			
Trithiolane isomer						16 J	
Hexathiepane						23 J	
Pesticide/PCBs (µg/Kg)						ND	NA
Alpha-BHC	7.8	10	26.0	8.2 U	3.3		
Beta-BHC	16.6 U	8.2 U	8.4 U	32.0	8.0 U		
Endosulfan I	410 J	250 J	130	490	4.6		
Endosulfan II	280 J	180 J	58	210	3.7		
Endosulfan Sulfate	32.2 U	150 J	16.3 U	15.9 U	15.5 U		
Alpha-Chlordane	180 J	100 J	51	140	56		
Gamma-Chlordane	230 J	120 J	38	85	70		

B: This result is qualitatively invalid because the compound was also detected in a blank at a similar concentration.
J: This result should be considered a quantitative estimate.
ND: Not detected.
NA: Not Analyzed
U - This compound was analyzed but not detected. The numerical value reported represents the quantitation limit of the compound.
* - Results for the semivolatile organic compounds for this sample are reported from the reanalysis.
† - This sample is the blind field duplicate of soil sample SS-2.

APPROVED FOR
RELEASE BY
QUALITY ASSURANCE

Shawn M. Kelly 2/28/92
DATE

AR305596

Soil Analytical Results
Woodlawn Property Transfer
Cecil County, Maryland
(All results are reported on a dry weight basis)

Sample Location	SS-2	SS-4†	TSB-5 (2'-4')	TSB-5 (4'-6')	TSB-6 (4'-6')	EB-1 (Equipment Blank)	Trip Blank
ERM T.R. Number	41319	41328	41313	41314	41321	41327	41329
Sample Date	12/5/91	12/5/91	12/5/91	12/5/91	12/5/91	12/5/91	12/5/91
Percent Moisture	18.8	17.0	19.4	18.7	18.3	ND	NA
Units	mg/Kg	mg/Kg	mg/Kg	mg/Kg	mg/Kg	ug/L	NA
Inorganics							NA
Aluminum	10400	9300	9550	9830	7780	76.6	
Antimony	6 B	8.3 B	12 U	12 U	12 U	60 U	
Arsenic	22.1 J	16.0 J	4.4 J	4.5 J	6.7 J	10.0 U	
Barium	83.9 J	58.2 J	54.0 J	40.8 J	22.9 J	200 U	
Beryllium	0.6	0.3 B	0.3 B	0.3 B	0.1 U	5.0 U	
Cadmium	1.0 U	0.9	1.1	1.0 U	1.0	5.0 U	
Calcium	445 J	722 J	370	579	985	5000 U	
Chromium	23.0 J	18.9 J	14.0 J	14.2 J	10.2 J	10.0 U	
Cobalt	3.5	3.3	3.8	4.8	2.7	50.0 U	
Copper	52.4 J	37.4 J	6.7	8.7	6.4	25.0 U	
Iron	15700	13300	13900	15200	10200	89.7	
Lead	86.1 J	50.0 J	21.4	21.0	22.1	3.0 U	
Magnesium	1160	982	742	755	825	5000 U	
Manganese	61.5 J	117 J	149 J	204 J	113 J	15 U	
Mercury	1.20 J	0.50 J	0.61	0.30	0.04	0.20 U	
Nickel	7.6	6.7	6.5	5.0	4.8	40.0 U	
Potassium	531	501	610	684	465	5000 U	
Selenium	0.8	0.6	0.7	0.5	1.0 U	5.0 U	
Silver	2.0 U	2.0 U	2.0	2.0 U	2.0 U	10.0 U	
Sodium	80 B	52.4 B	661	117 B	66.2 B	5000 U	
Thallium	2.0 U	2.0 U	2.0 U	2.0 U	1.2	10.0 U	
Vanadium	31.6	28.6	34.6	33.6	23.1	50.0 U	
Zinc	77.0 J	67.2 J	24.1 J	30.9 J	31.6 J	20.0 U	
Cyanide	2.0 U	2.0	2.0	2.0 U	2.0 U	10.0 U	
Wet Chemistrey Parameter							NA
Total Organic Carbon	21300	22200	10100	13900	3780	1000 U	

B: This result is qualitatively invalid because the analyte was also detected in a blank at a similar concentration.
J: This result should be considered a quantitative estimate.
ND: Not detected.
NA: Not Analyzed
U - The compound was analyzed but not detected. The numerical value reported represents the quantitation/detection limit of the analyte.
† - This sample is the blind field duplicate of soil sample SS-2.

APPROVED FOR RELEASE BY QUALITY ASSURANCE
DATE

1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

041310 SS-2

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34297

Sample wt/vol.: 5 (g/mL) G Lab File ID: >C346I

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. 18 Date Analyzed: 12/12/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
74-87-3	Chloromethane	12	U
74-83-9	Bromomethane	12	U
75-01-4	Vinyl Chloride	12	U
75-00-3	Chloroethane	12	U
75-09-2	Methylene Chloride	12	U
67-64-1	Acetone	12	U
75-15-0	Carbon Disulfide	12	U
75-35-4	1,1-Dichloroethene	12	U
75-34-3	1,1-Dichloroethane	12	U
540-59-0	1,2 Dichloroethene (total)	12	U
67-66-3	Chloroform	12	U
107-06-2	1,2-Dichloroethane	12	U
78-93-3	2-Butanone	12	U
71-55-6	1,1,1-Trichloroethane	12	U
56-23-5	Carbon Tetrachloride	12	U
75-27-4	Bromodichloromethane	12	U
78-87-5	1,2-Dichloropropane	12	U
10061-01-5	cis-1,3-Dichloropropene	12	U
79-01-6	Trichloroethene	12	U
124-48-1	Dibromochloromethane	12	U
79-00-5	1,1,2-Trichloroethane	12	U
71-43-2	Benzene	12	U
10061-02-6	trans-1,3-Dichloropropene	12	U
75-25-2	Bromoform	12	U
108-10-1	4-Methyl-2-Pentanone	12	U
591-78-6	2-Hexanone	12	U
127-18-4	Tetrachloroethene	12	U
79-34-5	1,1,2,2-Tetrachloroethane	12	U
108-88-3	Toluene	12	U
108-90-7	Chlorobenzene	12	U
100-41-4	Ethylbenzene	12	U
100-42-5	Styrene	12	U
1330-20-7	Xylene(total)	12	U

1E

CLIENT SAMPLE NO.

041310 SS2

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34297

Sample wt/vol.: 5 (g/mL) G Lab File ID: >C346I

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. 18 Date Analyzed: 12/12/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

Number TICs found: 1 CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	76131	Ethane 1,1,2-Trichloro-1,2,2	3.91	11	
2.					
3.					
4.					
5.					
6.					
7.					
8.					
9.					
10.					
11.					
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28.					
29.					
30.					

1A

VOLATILE ORGANICS ANALYSIS DATA SHEET

CLIENT SAMPLE NO.

041313 TSB-5 2'-4'

Lab Name: GULF STATES ANALYTICAL Contract: ____

Lab Code: GSAI Case No.: 5859 SAS No.: ____ SDG No.: ____

Matrix: (soil/water) SOIL Lab Sample ID: 34298

Sample wt/vol.: 5 (g/mL) G Lab File ID: C346J

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. 19 Date Analyzed: 12/12/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: ____ (uL) Soil Aliquot Volume: ____ (uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q	
74-87-3	Chloromethane	12	U	
74-83-9	Bromomethane	12	U	
75-01-4	Vinyl Chloride	12	U	
75-00-3	Chloroethane	12	U	
75-09-2	Methylene Chloride	12	U	
67-64-1	Acetone	32		
75-15-0	Carbon Disulfide	12	U	
75-35-4	1,1-Dichloroethene	12	U	
75-34-3	1,1-Dichloroethane	12	U	
540-59-0	1,2 Dichloroethene (total)	12	U	
67-66-3	Chloroform	12	U	
107-06-2	1,2-Dichloroethane	12	U	
78-93-3	2-Butanone	12	U	
71-55-6	1,1,1-Trichloroethane	12	U	
56-23-5	Carbon Tetrachloride	12	U	
75-27-4	Bromodichloromethane	12	U	
78-87-5	1,2-Dichloropropane	12	U	
10061-01-5	cis-1,3-Dichloropropene	12	U	
79-01-6	Trichloroethene	12	U	
124-48-1	Dibromochloromethane	12	U	
79-00-5	1,1,2-Trichloroethane	12	U	
71-43-2	Benzene	12	U	
10061-02-6	trans-1,3-Dichloropropene	12	U	
75-25-2	Bromoform	12	U	
108-10-1	4-Methyl-2-Pentanone	12	U	
591-78-6	2-Hexanone	12	U	
127-18-4	Tetrachloroethene	12	U	
79-34-5	1,1,2,2-Tetrachloroethane	12	U	
108-88-3	Toluene	360	E	440 200 (? ?)
108-90-7	Chlorobenzene	12	U	
100-41-4	Ethylbenzene	120		
100-42-5	Styrene	12	U	
1330-20-7	Xylene (total)	720	E	980

FORM 1 VOA

1E

CLIENT SAMPLE NO.

041313 TSB5

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract:_____

Lab Code: GSAI Case No.: 5859 SAS No.:_____ SDG No.:_____

Matrix: (soil/water) SOIL Lab Sample ID: 34298

Sample wt/vol.: 5 (g/mL) G Lab File ID: >C346J

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. 19 Date Analyzed: 12/12/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume:_____(uL) Soil Aliquot Volume:_____(uL)

Number TICs found: 10 CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	108872	Methyl cyclohexane	13.98	56	
2.		Aliphatic hydrocarbon	18.28	69	
3.		Alicyclic hydrocarbon	18.72	57	
4.		Aliphatic hydrocarbon	20.35	1000	
5.		Aliphatic hydrocarbon	20.91	180	
6.		Aliphatic hydrocarbon	21.39	260	
7.		Aliphatic hydrocarbon	22.24	540	
8.		Aliphatic hydrocarbon	22.47	310	
9.		Ethyl methyl benzene isomer	22.70	330	
10.		Trimethyl benzene isomer	22.89	600	
11.					
12.					
13.					
14.					
15.					
16.					
17.					
18.					
19.					
20.					
21.					
22.					
23.					
24.					
25.					
26.					
27.					
28.					
29.					
30.					

Total Aliphatic Under 44 = 2400 J
Total Alkyl benzene = 950 J

1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

041313 TSB-5 2'-4'

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 34298DL

Sample wt/vol.: 1 (g/mL) G Lab File ID: >C347L

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. 19 Date Analyzed: 12/13/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 5.0

Soil Extract Volume: (uL) Soil Aliquot Volume: (uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
74-87-3	Chloromethane	62	U
74-83-9	Bromomethane	62	U
75-01-4	Vinyl Chloride	62	U
75-00-3	Chloroethane	62	U
75-09-2	Methylene Chloride	62	U
67-64-1	Acetone	62	U
75-15-0	Carbon Disulfide	62	U
75-35-4	1,1-Dichloroethene	62	U
75-34-3	1,1-Dichloroethane	62	U
540-59-0	1,2 Dichloroethene (total)	62	U
67-66-3	Chloroform	62	U
107-06-2	1,2-Dichloroethane	62	U
78-93-3	2-Butanone	62	U
71-55-6	1,1,1-Trichloroethane	62	U
56-23-5	Carbon Tetrachloride	62	U
75-27-4	Bromodichloromethane	62	U
78-87-5	1,2-Dichloropropane	62	U
10061-01-5	cis-1,3-Dichloropropene	62	U
79-01-6	Trichloroethene	62	U
124-48-1	Dibromochloromethane	62	U
79-00-5	1,1,2-Trichloroethane	62	U
71-43-2	Benzene	62	U
10061-02-6	trans-1,3-Dichloropropene	62	U
75-25-2	Bromoform	62	U
108-10-1	4-Methyl-2-Pentanone	62	U
591-78-6	2-Hexanone	62	U
127-18-4	Tetrachloroethene	62	U
79-34-5	1,1,2,2-Tetrachloroethane	62	U
108-88-3	Toluene	110	D
108-90-7	Chlorobenzene	62	U
100-41-4	Ethylbenzene	160	D
100-42-5	Styrene	62	U
1330-20-7	Xylene(total)	980	D

1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

041313 TSB-5 2'-4'

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 34298DL

Sample wt/vol.: 2 (g/mL) G Lab File ID: >C350I

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. 19 Date Analyzed: 12/16/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 2.5

Soil Extract Volume: (uL) Soil Aliquot Volume: (uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
74-87-3	Chloromethane	31	U
74-83-9	Bromomethane	31	U
75-01-4	Vinyl Chloride	31	U
75-00-3	Chloroethane	31	U
75-09-2	Methylene Chloride	31	U
67-64-1	Acetone	72	D
75-15-0	Carbon Disulfide	31	U
75-35-4	1,1-Dichloroethene	31	U
75-34-3	1,1-Dichloroethane	31	U
540-59-0	1,2 Dichloroethene (total)	31	U
67-66-3	Chloroform	31	U
107-06-2	1,2-Dichloroethane	31	U
78-93-3	2-Butanone	31	U
71-55-6	1,1,1-Trichloroethane	31	U
56-23-5	Carbon Tetrachloride	31	U
75-27-4	Bromodichloromethane	31	U
78-87-5	1,2-Dichloropropane	31	U
10061-01-5	cis-1,3-Dichloropropene	31	U
79-01-6	Trichloroethene	31	U
124-48-1	Dibromochloromethane	31	U
79-00-5	1,1,2-Trichloroethane	31	U
71-43-2	Benzene	31	U
10061-02-6	trans-1,3-Dichloropropene	31	U
75-25-2	Bromoform	31	U
108-10-1	4-Methyl-2-Pentanone	31	U
591-78-6	2-Hexanone	31	U
127-18-4	Tetrachloroethene	31	U
79-34-5	1,1,2,2-Tetrachloroethane	31	U
108-88-3	Toluene	200	D
108-90-7	Chlorobenzene	31	U
100-41-4	Ethylbenzene	430	D
100-42-5	Styrene	31	U
1330-20-7	Xylene(total)	2500	DE

1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

041314 TSB-5 4'-6'

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34299

Sample wt/vol.: 5 (g/mL) G Lab File ID: >C346K

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. 17 Date Analyzed: 12/12/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
74-87-3	Chloromethane	12	U
74-83-9	Bromomethane	12	U
75-01-4	Vinyl Chloride	12	U
75-00-3	Chloroethane	12	U
75-09-2	Methylene Chloride	12	U
67-64-1	Acetone	41	
75-15-0	Carbon Disulfide	12	U
75-35-4	1,1-Dichloroethene	12	U
75-34-3	1,1-Dichloroethane	12	U
540-59-0	1,2 Dichloroethene (total)	12	U
67-66-3	Chloroform	12	U
107-06-2	1,2-Dichloroethane	12	U
78-93-3	2-Butanone	12	U
71-55-6	1,1,1-Trichloroethane	12	U
56-23-5	Carbon Tetrachloride	12	U
75-27-4	Bromodichloromethane	12	U
78-87-5	1,2-Dichloropropane	12	U
10061-01-5	cis-1,3-Dichloropropene	12	U
79-01-6	Trichloroethene	12	U
124-48-1	Dibromochloromethane	12	U
79-00-5	1,1,2-Trichloroethane	12	U
71-43-2	Benzene	12	U
10061-02-6	trans-1,3-Dichloropropene	12	U
75-25-2	Bromoform	12	U
108-10-1	4-Methyl-2-Pentanone	12	U
591-78-6	2-Hexanone	12	U
127-18-4	Tetrachloroethene	12	U
79-34-5	1,1,2,2-Tetrachloroethane	12	U
108-88-3	Toluene	56	
108-90-7	Chlorobenzene	12	U
100-41-4	Ethylbenzene	100	
100-42-5	Styrene	12	U
1330-20-7	Xylene(total)	580	E

1E

CLIENT SAMPLE NO.

041314 TSB5

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34299

Sample wt/vol.: 5 (g/mL) G Lab File ID: >C346K

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. 17 Date Analyzed: 12/12/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: _____ (uL) Soil Aliquot Volume: _____ (uL)

Number TICs found: 10

CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/KG

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	108872	Methyl cyclohexane	13.97	31	
2.		Aliphatic hydrocarbon	18.27	26	
3.		Aliphatic hydrocarbon	20.36	270	
4.	1678928	Propyl cyclohexane	21.24	120	
5.		Aliphatic hydrocarbon	21.37	130	
6.		Aliphatic hydrocarbon	21.58	150	
7.		Aliphatic hydrocarbon	22.20	160	
8.	103651	Propyl benzene	22.46	150	
9.		Ethyl methyl benzene isomer	22.69	260	
10.		Trimethyl benzene isomer	22.90	290	
11.					
12.					
13.					
14.					
15.					
16.					
17.					
18.					
19.					
20.					
21.					
22.					
23.					
24.					
25.					
26.					
27.					
28.					
29.					
30.					

Total Alkyl Cyclohex. = 151
Total Aliphatics = 7
Total Alkylbenz. 150

1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

041314 TSB-5 4'-6'

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34299DL

Sample wt/vol.: 2.5 (g/mL) G Lab File ID: >C350F

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. 17 Date Analyzed: 12/16/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 2.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
74-87-3	Chloromethane	24	U
74-83-9	Bromomethane	24	U
75-01-4	Vinyl Chloride	24	U
75-00-3	Chloroethane	24	U
75-09-2	Methylene Chloride	24	U
67-64-1	Acetone	46	D
75-15-0	Carbon Disulfide	24	U
75-35-4	1,1-Dichloroethene	24	U
75-34-3	1,1-Dichloroethane	24	U
540-59-0	1,2 Dichloroethene (total)	24	U
67-66-3	Chloroform	24	U
107-06-2	1,2-Dichloroethane	24	U
78-93-3	2-Butanone	24	U
71-55-6	1,1,1-Trichloroethane	24	U
56-23-5	Carbon Tetrachloride	24	U
75-27-4	Bromodichloromethane	24	U
78-87-5	1,2-Dichloropropane	24	U
10061-01-5	cis-1,3-Dichloropropene	24	U
79-01-6	Trichloroethene	24	U
124-48-1	Dibromochloromethane	24	U
79-00-5	1,1,2-Trichloroethane	24	U
71-43-2	Benzene	24	U
10061-02-6	trans-1,3-Dichloropropene	24	U
75-25-2	Bromoform	24	U
108-10-1	4-Methyl-2-Pentanone	24	U
591-78-6	2-Hexanone	24	U
127-18-4	Tetrachloroethene	24	U
79-34-5	1,1,2,2-Tetrachloroethane	24	U
108-88-3	Toluene	98	D
108-90-7	Chlorobenzene	24	U
100-41-4	Ethylbenzene	240	D
100-42-5	Styrene	24	U
1330-20-7	Xylene(total)	1300	DE

1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

041314 TSB-5 4'-6'

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34299DL

Sample wt/vol.: 1 (g/mL) G Lab File ID: >C352G

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. 17 Date Analyzed: 12/18/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 5.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
74-87-3	Chloromethane	60	U
74-83-9	Bromomethane	60	U
75-01-4	Vinyl Chloride	60	U
75-00-3	Chloroethane	60	U
75-09-2	Methylene Chloride	60	U
67-64-1	Acetone	60	U
75-15-0	Carbon Disulfide	60	U
75-35-4	1,1-Dichloroethene	60	U
75-34-3	1,1-Dichloroethane	60	U
540-59-0	1,2 Dichloroethene (total)	60	U
67-66-3	Chloroform	60	U
107-06-2	1,2-Dichloroethane	60	U
78-93-3	2-Butanone	60	U
71-55-6	1,1,1-Trichloroethane	60	U
56-23-5	Carbon Tetrachloride	60	U
75-27-4	Bromodichloromethane	60	U
78-87-5	1,2-Dichloropropane	60	U
10061-01-5	cis-1,3-Dichloropropene	60	U
79-01-6	Trichloroethene	60	U
124-48-1	Dibromochloromethane	60	U
79-00-5	1,1,2-Trichloroethane	60	U
71-43-2	Benzene	60	U
10061-02-6	trans-1,3-Dichloropropene	60	U
75-25-2	Bromoform	60	U
108-10-1	4-Methyl-2-Pentanone	60	U
591-78-6	2-Hexanone	60	U
127-18-4	Tetrachloroethene	60	U
79-34-5	1,1,2,2-Tetrachloroethane	60	U
108-88-3	Toluene	120	D
108-90-7	Chlorobenzene	60	U
100-41-4	Ethylbenzene	300	D
100-42-5	Styrene	60	U
1330-20-7	Xylene(total)	1800	D

1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

041321 TSB-6 4'-6'

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34300

Sample wt/vol.: 5 (g/mL) G Lab File ID: >C347K

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. 15 Date Analyzed: 12/13/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
74-87-3	Chloromethane	12	U
74-83-9	Bromomethane	12	U
75-01-4	Vinyl Chloride	12	U
75-00-3	Chloroethane	12	U
75-09-2	Methylene Chloride	12	U
67-64-1	Acetone	52	
75-15-0	Carbon Disulfide	12	U
75-35-4	1,1-Dichloroethene	12	U
75-34-3	1,1-Dichloroethane	12	U
540-59-0	1,2 Dichloroethene (total)	12	U
67-66-3	Chloroform	12	U
107-06-2	1,2-Dichloroethane	12	U
78-93-3	2-Butanone	12	U
71-55-6	1,1,1-Trichloroethane	12	U
56-23-5	Carbon Tetrachloride	12	U
75-27-4	Bromodichloromethane	12	U
78-87-5	1,2-Dichloropropane	12	U
10061-01-5	cis-1,3-Dichloropropene	12	U
79-01-6	Trichloroethene	12	U
124-48-1	Dibromochloromethane	12	U
79-00-5	1,1,2-Trichloroethane	12	U
71-43-2	Benzene	12	U
10061-02-6	trans-1,3-Dichloropropene	12	U
75-25-2	Bromoform	12	U
108-10-1	4-Methyl-2-Pentanone	12	U
591-78-6	2-Hexanone	12	U
127-18-4	Tetrachloroethene	12	U
79-34-5	1,1,2,2-Tetrachloroethane	12	U
108-88-3	Toluene	9	J
108-90-7	Chlorobenzene	12	U
100-41-4	Ethylbenzene	15	
100-42-5	Styrene	12	U
1330-20-7	Xylene(total)	25	

1E

CLIENT SAMPLE NO.

041321 TSB6

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34300

Sample wt/vol.: 5 (g/mL) G Lab File ID: >C347K

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. 15 Date Analyzed: 12/13/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

Number TICs found: 10 CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		Aliphatic hydrocarbon	18.27	10 J	
2.		Trimethyl cyclohexane isomer	18.73	9 J	
3.		Aliphatic hydrocarbon	20.34	18 J	
4.		Ethylmethylcyclohexaneisomer	20.50	13 J	
5.		Dimethyl benzene isomer	20.66	6	
6.		Aliphatic hydrocarbon	20.89	45 J	
7.	1678928	Propyl cyclohexane	21.24	82 J	
8.		Aliphatic hydrocarbon	22.18	150 J	
9.		Aliphatic hydrocarbon	22.46	120 J	
10.		Alicyclic hydrocarbon	22.87	110 J	
11.					
12.					
13.					
14.					
15.					
16.					
17.					
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Total Alkyl Cyclohexanes = 100 J

Total Unkn Ali. HC = 450 J

Total Alkyl benzene = 6 J

1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

041327 EB-1

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) WATER Lab Sample ID: 34301

Sample wt/vol.: 5 (g/mL) ML Lab File ID: >C347H

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. _____ Date Analyzed: 12/13/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
74-87-3	Chloromethane	10	U
74-83-9	Bromomethane	10	U
75-01-4	Vinyl Chloride	10	U
75-00-3	Chloroethane	10	U
75-09-2	Methylene Chloride	10	U
67-64-1	Acetone	10	U
75-15-0	Carbon Disulfide	10	U
75-35-4	1,1-Dichloroethene	10	U
75-34-3	1,1-Dichloroethane	10	U
540-59-0	1,2 Dichloroethene (total)	10	U
67-66-3	Chloroform	10	U
107-06-2	1,2-Dichloroethane	10	U
78-93-3	2-Butanone	10	U
71-55-6	1,1,1-Trichloroethane	10	U
56-23-5	Carbon Tetrachloride	10	U
75-27-4	Bromodichloromethane	10	U
78-87-5	1,2-Dichloropropane	10	U
10061-01-5	cis-1,3-Dichloropropene	10	U
79-01-6	Trichloroethene	10	U
124-48-1	Dibromochloromethane	10	U
79-00-5	1,1,2-Trichloroethane	10	U
71-43-2	Benzene	10	U
10061-02-6	trans-1,3-Dichloropropene	10	U
75-25-2	Bromoform	10	U
108-10-1	4-Methyl-2-Pentanone	10	U
591-78-6	2-Hexanone	10	U
127-18-4	Tetrachloroethene	10	U
79-34-5	1,1,2,2-Tetrachloroethane	10	U
108-88-3	Toluene	10	U
108-90-7	Chlorobenzene	10	U
100-41-4	Ethylbenzene	10	U
100-42-5	Styrene	10	U
1330-20-7	Xylene(total)	10	U

1E

CLIENT SAMPLE NO.

041327 EB1

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) WATER Lab Sample ID: 34301

Sample wt/vol.: 5 (g/mL) ML Lab File ID: >C347H

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. _____ Date Analyzed: 12/13/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

Number TICs found: 0

CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.					
2.					
3.					
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1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

041328 SS-4

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34302

Sample wt/vol.: 5 (g/mL) G Lab File ID: >C346M

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. 17 Date Analyzed: 12/12/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
74-87-3	Chloromethane	12	U
74-83-9	Bromomethane	12	U
75-01-4	Vinyl Chloride	12	U
75-00-3	Chloroethane	12	U
75-09-2	Methylene Chloride	12	U
67-64-1	Acetone	12	U
75-15-0	Carbon Disulfide	12	U
75-35-4	1,1-Dichloroethene	12	U
75-34-3	1,1-Dichloroethane	12	U
540-59-0	1,2 Dichloroethene (total)	12	U
67-66-3	Chloroform	12	U
107-06-2	1,2-Dichloroethane	12	U
78-93-3	2-Butanone	12	U
71-55-6	1,1,1-Trichloroethane	12	U
56-23-5	Carbon Tetrachloride	12	U
75-27-4	Bromodichloromethane	12	U
78-87-5	1,2-Dichloropropane	12	U
10061-01-5	cis-1,3-Dichloropropene	12	U
79-01-6	Trichloroethene	12	U
124-48-1	Dibromochloromethane	12	U
79-00-5	1,1,2-Trichloroethane	12	U
71-43-2	Benzene	12	U
10061-02-6	trans-1,3-Dichloropropene	12	U
75-25-2	Bromoform	12	U
108-10-1	4-Methyl-2-Pentanone	12	U
591-78-6	2-Hexanone	12	U
127-18-4	Tetrachloroethene	12	U
79-34-5	1,1,2,2-Tetrachloroethane	12	U
108-88-3	Toluene	12	U
108-90-7	Chlorobenzene	12	U
100-41-4	Ethylbenzene	12	U
100-42-5	Styrene	12	U
1330-20-7	Xylene(total)	12	U

1E

CLIENT SAMPLE NO.

041328 SS4

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34302

Sample wt/vol.: 5 (g/mL) G Lab File ID: >C346M

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. 17 Date Analyzed: 12/12/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

Number TICs found: 1 CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	76131	Ethane 1,1,2-Trichloro-1,2,2	3.92	10	
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1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

041329 TRIP BLANK

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) WATER Lab Sample ID: 34303

Sample wt/vol.: 5 (g/mL) ML Lab File ID: >C347I

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. Date Analyzed: 12/13/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: (uL) Soil Aliquot Volume: (uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
74-87-3	Chloromethane	10	U
74-83-9	Bromomethane	10	U
75-01-4	Vinyl Chloride	10	U
75-00-3	Chloroethane	10	U
75-09-2	Methylene Chloride	10	U
67-64-1	Acetone	10	U
75-15-0	Carbon Disulfide	10	U
75-35-4	1,1-Dichloroethene	10	U
75-34-3	1,1-Dichloroethane	10	U
540-59-0	1,2 Dichloroethene (total)	10	U
67-66-3	Chloroform	10	U
107-06-2	1,2-Dichloroethane	10	U
78-93-3	2-Butanone	10	U
71-55-6	1,1,1-Trichloroethane	10	U
56-23-5	Carbon Tetrachloride	10	U
75-27-4	Bromodichloromethane	10	U
78-87-5	1,2-Dichloropropane	10	U
10061-01-5	cis-1,3-Dichloropropene	10	U
79-01-6	Trichloroethene	10	U
124-48-1	Dibromochloromethane	10	U
79-00-5	1,1,2-Trichloroethane	10	U
71-43-2	Benzene	10	U
10061-02-6	trans-1,3-Dichloropropene	10	U
75-25-2	Bromoform	10	U
108-10-1	4-Methyl-2-Pentanone	10	U
591-78-6	2-Hexanone	10	U
127-18-4	Tetrachloroethene	10	U
79-34-5	1,1,2,2-Tetrachloroethane	10	U
108-88-3	Toluene	10	U
108-90-7	Chlorobenzene	10	U
100-41-4	Ethylbenzene	10	U
100-42-5	Styrene	10	U
1330-20-7	Xylene(total)	10	U

1E

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

041329
TRIP BLANK

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) WATER Lab Sample ID: 34303

Sample wt/vol.: 5 (g/mL) ML Lab File ID: >C347I

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. _____ Date Analyzed: 12/13/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

Number TICs found: 0

CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
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30.				

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET | 041310SS2 |

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34297

Sample wt/vol.: 30 (g/ml) G Lab File ID: >D361K

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 18 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/KG	Q
108-95-2	Phenol	400	U
111-44-4	bis(2-Chloroethyl)ether	400	U
95-57-8	2-Chlorophenol	400	U
541-73-1	1,3-Dichlorobenzene	400	U
106-46-7	1,4-Dichlorobenzene	400	U
95-50-1	1,2-Dichlorobenzene	400	U
95-48-7	2-Methylphenol	400	U
108-60-1	2,2'-oxybis(1-Chloropropane)	400	U
106-44-5	4-Methylphenol	400	U
621-64-7	N-Nitroso-di-n-propylamine	400	U
67-72-1	Hexachloroethane	400	U
98-95-3	Nitrobenzene	400	U
78-59-1	Isophorone	400	U
88-75-5	2-Nitrophenol	400	U
105-67-9	2,4-Dimethylphenol	400	U
111-91-1	bis(2-Chloroethoxy)methane	400	U
120-83-2	2,4-Dichlorophenol	400	U
120-82-1	1,2,4-Trichlorobenzene	400	U
91-20-3	Naphthalene	400	U
106-47-8	4-Chloroaniline	400	U
87-68-3	Hexachlorobutadiene	400	U
59-50-7	4-Chloro-3-methylphenol	400	U
91-57-6	2-Methylnaphthalene	400	U
77-47-4	Hexachlorocyclopentadiene	400	U
88-06-2	2,4,6-Trichlorophenol	400	U
95-95-4	2,4,5-Trichlorophenol	970	U
91-58-7	2-Chloronaphthalene	400	U
88-74-4	2-Nitroaniline	970	U
131-11-3	Dimethylphthalate	400	U
208-96-8	Acenaphthylene	400	U
606-20-2	2,6-Dinitrotoluene	400	U
99-09-2	3-Nitroaniline	970	U
83-32-9	Acenaphthene	400	U

1F

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

CLIENT SAMPLE NO.

041310 SS-2

Lab Name: GULF STATES ANALYTICAL Contract: ______

Lab Code: GSAI Case No.: 5859 SAS No.: ______ SDG No.: ______

Matrix: (soil/water) SOIL Lab Sample ID: 34297

Sample wt/vol.: 30 (g/mL) G Lab File ID: >D361K

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 18 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

Number TICs found: 23

CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	~~Unknown~~	~~5.13~~	~~2100~~ ✓	~~JB~~ ✓
2.	Unknown	7.18	870 ✓✓	(J) ✓
3.	Unknown	8.33	1500 ✓✓	(J) ✓
4.	~~Aldol condensate~~	~~8.92~~	~~340~~ ✓	~~JA~~
5.	Unknown	9.21	1900 ✓✓	(J) ✓
6.	~~Aldol condensate~~	~~9.74~~	~~8400~~ ✓	~~JAB~~
7.	~~Aldol condensate~~	~~9.90~~	~~600~~ ✓	~~JA~~
8. ~~4436753~~	~~3-Hexene-2,5-dione~~	~~12.48~~	~~600~~ ✓	~~JB~~
9.	~~Unknown~~	~~13.59~~	~~540~~	~~JB~~
10.	~~Unknown~~	~~13.77~~	~~2200~~ ✓	~~JB~~
11.	Unknown ~~aliphatic hydrocarbo~~	15.21	(270) ✓	(J)
12.	Unknown hydrocarbon ✓	21.70	260	J
13. 54832836	1H-Indene, octahydro-2,2,4,4	22.33	540	J
14. 719222	2,5-Cyclohexadiene-1,4dio (2)	23.72	450 ✓	J ✓
15.	Unknown hydrocarbon (1)	23.91	300 ✓	J
16.	Unknown ~~indane~~	24.05	(360) ✓	(J) ✓
17.	Unknown	25.71	400 ✓	(J) ✓
18. 140669	Phenol, 4-(1,1,3,3-tetrameth (2)	26.06	1800	J
19.	Unknown #(2)	27.39	1700 ✓	(J)
20. —	Unknown phenol	27.78	870	J
21. —	Unknown phenol	27.86	960	J
22.	Unknown	27.94	630 ✓	(J)
23.	Unknown	28.17	2100 ✓	(J)
24.				
25.				
26.				
27.				
28.				
29.				
30.				

FORM I SV-TIC 3/90

1) *-ne, 2-6bis (1,1-dimethylethyl) -

2) -# - yl butyl ( ) -

436

Total Unkn conc = 9fc

Total Unk Hydrocar 56

Total Alkyl phenol: 3600

or

AR305617

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET | 041310SS2RE |

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 34297RE

Sample wt/vol.: 30 (g/ml) G Lab File ID: >E362K

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 18 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH:

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
51-28-5	2,4-Dinitrophenol	970	U
100-02-7	4-Nitrophenol	970	U
132-64-9	Dibenzofuran	400	U
121-14-2	2,4-Dinitrotoluene	400	U
84-66-2	Diethylphthalate	400	U
7005-72-3	4-Chlorophenyl-phenylether	400	U
86-73-7	Fluorene	400	U
100-01-6	4-Nitroaniline	970	U
534-52-1	4,6-Dinitro-2-methylphenol	970	U
86-30-6	N-Nitrosodiphenylamine (1)	400	U
101-55-3	4-Bromophenyl-phenylether	400	U
118-74-1	Hexachlorobenzene	400	U
87-86-5	Pentachlorophenol	970	U
85-01-8	Phenanthrene	400	U
120-12-7	Anthracene	400	U
86-74-8	Carbazole	400	U
84-74-2	Di-n-butylphthalate	400	U
206-44-0	Fluoranthene	400	U
129-00-0	Pyrene	110	J
85-68-7	Butylbenzylphthalate	400	U
91-94-1	3,3'-Dichlorobenzidine	400	U
56-55-3	Benzo(a)anthracene	400	U
218-01-9	Chrysene	400	U
117-81-7	Bis(2-Ethylhexyl)phthalate	1100	
117-84-0	Di-n-octylphthalate	400	U
205-99-2	Benzo(b)fluoranthene	400	U
207-08-9	Benzo(k)fluoranthene	400	U
50-32-8	Benzo(a)pyrene	400	U
193-39-5	Indeno(1,2,3-cd)pyrene	170	J
53-70-3	Dibenz(a,h)anthracene	400	U
191-24-2	Benzo(g,h,i)perylene	400	U

(1) - Cannot be separated from Diphenylamine

1B

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

041310SS2RE

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34297RE

Sample wt/vol.: 30 (g/ml) G Lab File ID: >E362K

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 18 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/KG	Q
108-95-2	Phenol	400	U
111-44-4	bis(2-Chloroethyl)ether	400	U
95-57-8	2-Chlorophenol	400	U
541-73-1	1,3-Dichlorobenzene	400	U
106-46-7	1,4-Dichlorobenzene	400	U
95-50-1	1,2-Dichlorobenzene	400	U
95-48-7	2-Methylphenol	400	U
108-60-1	2,2'-oxybis(1-Chloropropane)	400	U
106-44-5	4-Methylphenol	400	U
621-64-7	N-Nitroso-di-n-propylamine	400	U
67-72-1	Hexachloroethane	400	U
98-95-3	Nitrobenzene	400	U
78-59-1	Isophorone	400	U
88-75-5	2-Nitrophenol	400	U
105-67-9	2,4-Dimethylphenol	400	U
111-91-1	bis(2-Chloroethoxy)methane	400	U
120-83-2	2,4-Dichlorophenol	400	U
120-82-1	1,2,4-Trichlorobenzene	400	U
91-20-3	Naphthalene	400	U
106-47-8	4-Chloroaniline	400	U
87-68-3	Hexachlorobutadiene	400	U
59-50-7	4-Chloro-3-methylphenol	400	U
91-57-6	2-Methylnaphthalene	400	U
77-47-4	Hexachlorocyclopentadiene	400	U
88-06-2	2,4,6-Trichlorophenol	400	U
95-95-4	2,4,5-Trichlorophenol	970	U
91-58-7	2-Chloronaphthalene	400	U
88-74-4	2-Nitroaniline	970	U
131-11-3	Dimethylphthalate	400	U
208-96-8	Acenaphthylene	400	U
606-20-2	2,6-Dinitrotoluene	400	U
99-09-2	3-Nitroaniline	970	U
83-32-9	Acenaphthene	400	U

1B

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

041313TSB5

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34298

Sample wt/vol.: 30 (g/ml) G Lab File ID: >D361H

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 19 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/KG	Q
108-95-2	Phenol	410	U
111-44-4	bis(2-Chloroethyl)ether	410	U
95-57-8	2-Chlorophenol	410	U
541-73-1	1,3-Dichlorobenzene	410	U
106-46-7	1,4-Dichlorobenzene	410	U
95-50-1	1,2-Dichlorobenzene	410	U
95-48-7	2-Methylphenol	410	U
108-60-1	2,2'-oxybis(1-Chloropropane)	410	U
106-44-5	4-Methylphenol	410	U
621-64-7	N-Nitroso-di-n-propylamine	410	U
67-72-1	Hexachloroethane	410	U
98-95-3	Nitrobenzene	410	U
78-59-1	Isophorone	410	U
88-75-5	2-Nitrophenol	410	U
105-67-9	2,4-Dimethylphenol	410	U
111-91-1	bis(2-Chloroethoxy)methane	410	U
120-83-2	2,4-Dichlorophenol	410	U
120-82-1	1,2,4-Trichlorobenzene	410	U
91-20-3	Naphthalene	470	✓
106-47-8	4-Chloroaniline	410	U
87-68-3	Hexachlorobutadiene	410	U
59-50-7	4-Chloro-3-methylphenol	410	U
91-57-6	2-Methylnaphthalene	680	
77-47-4	Hexachlorocyclopentadiene	410	U
88-06-2	2,4,6-Trichlorophenol	410	U
95-95-4	2,4,5-Trichlorophenol	990	U
91-58-7	2-Chloronaphthalene	410	U
88-74-4	2-Nitroaniline	990	U
131-11-3	Dimethylphthalate	410	U
208-96-8	Acenaphthylene	410	U
606-20-2	2,6-Dinitrotoluene	410	U
99-09-2	3-Nitroaniline	990	U
83-32-9	Acenaphthene	410	U

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET | 041313TSB5 |

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34298

Sample wt/vol.: 30 (g/ml) G Lab File ID: >D361H

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 19 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
51-28-5	2,4-Dinitrophenol	990	U
100-02-7	4-Nitrophenol	990	U
132-64-9	Dibenzofuran	410	U
121-14-2	2,4-Dinitrotoluene	410	U
84-66-2	Diethylphthalate	410	U
7005-72-3	4-Chlorophenyl-phenylether	410	U
86-73-7	Fluorene	110	J
100-01-6	4-Nitroaniline	990	U
534-52-1	4,6-Dinitro-2-methylphenol	990	U
86-30-6	N-Nitrosodiphenylamine (1)	410	U
101-55-3	4-Bromophenyl-phenylether	410	U
118-74-1	Hexachlorobenzene	410	U
87-86-5	Pentachlorophenol	990	U
85-01-8	Phenanthrene	160	J
120-12-7	Anthracene	410	U
86-74-8	Carbazole	410	U
84-74-2	Di-n-butylphthalate	150	J
206-44-0	Fluoranthene	410	U
129-00-0	Pyrene	380	J
85-68-7	Butylbenzylphthalate	410	U
91-94-1	3,3'-Dichlorobenzidine	410	U
56-55-3	Benzo(a)anthracene	410	U
218-01-9	Chrysene	410	U
117-81-7	Bis(2-Ethylhexyl)phthalate	2200	
117-84-0	Di-n-octylphthalate	410	U
205-99-2	Benzo(b)fluoranthene	410	U
207-08-9	Benzo(k)fluoranthene	410	U
50-32-8	Benzo(a)pyrene	410	U
193-39-5	Indeno(1,2,3-cd)pyrene	410	U
53-70-3	Dibenz(a,h)anthracene	410	U
191-24-2	Benzo(g,h,i)perylene	410	U

(1) - Cannot be separated from Diphenylamine

CLIENT SAMPLE NO.

041313 TSB5

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34298

Sample wt/vol.: 30 (g/mL) G Lab File ID: >D361H

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 19 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

Number TICs found: 21 CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		~~Aldol condensate~~	9.76	2300	JAB
2.		Unknown aliphatic hydrocarbo	12.99	840	J
3.		Unknown aliphatic hydrocarbo	13.08	880	J
4.		~~Unknown~~	~~13.79~~	~~1100~~	~~JB~~
5.		Unknown aliphatic hydrocarbo	13.98	2200	J
6.		Unknown aliphatic hydrocarbo	15.31	1200	J
7.		Unknown aliphatic hydrocarbo	15.51	1200	J
8.		Unknown aliphatic hydrocarbo	15.66	1100	J
9.		Unknown aliphatic hydrocarbo	16.33	2200	J
10.		Unknown	16.50	800	J
11.		Unknown aliphatic hydrocarbo	16.66	740	J
12.		Unknown aliphatic hydrocarbo	18.71	740	J
13.		Unknown aliphatic hydrocarbo	19.89	790	J
14.	629505	Tridecane	20.45	870	J
15.		Unknown aliphatic hydrocarbo	21.88	1100	J
16.	629594	Tetradecane	22.33	1800	J
17.	569415	Naphthalene, 1,8-dimethyl-	23.19	1200	J
18.		Unknown aliphatic hydrocarbo	23.38	2100	J
19.		Unknown aliphatic hydrocarbo	25.73	1000	J
20.		Unknown aliphatic hydrocarbo	26.47	1400	J
21.		Unknown aliphatic hydrocarbo	27.35	3200	J
22.					
23.					
24.					
25.					
26.					
27.					
28.					
29.					
30.					

Total Unknown Hydrocarbon = 21000
- Alkyl Naphthalenes = 1200 J

1B CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET 041313TSB5RE

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 34298RE

Sample wt/vol.: 30 (g/ml) G Lab File ID: >E362H

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 19 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH:

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/KG	Q
108-95-2	Phenol	410	U
111-44-4	bis(2-Chloroethyl)ether	410	U
95-57-8	2-Chlorophenol	410	U
541-73-1	1,3-Dichlorobenzene	410	U
106-46-7	1,4-Dichlorobenzene	410	U
95-50-1	1,2-Dichlorobenzene	410	U
95-48-7	2-Methylphenol	410	U
108-60-1	2,2'-oxybis(1-Chloropropane)	410	U
106-44-5	4-Methylphenol	410	U
621-64-7	N-Nitroso-di-n-propylamine	410	U
67-72-1	Hexachloroethane	410	U
98-95-3	Nitrobenzene	410	U
78-59-1	Isophorone	410	U
88-75-5	2-Nitrophenol	410	U
105-67-9	2,4-Dimethylphenol	410	U
111-91-1	bis(2-Chloroethoxy)methane	410	U
120-83-2	2,4-Dichlorophenol	410	U
120-82-1	1,2,4-Trichlorobenzene	410	U
91-20-3	Naphthalene	460	
106-47-8	4-Chloroaniline	410	U
87-68-3	Hexachlorobutadiene	410	U
59-50-7	4-Chloro-3-methylphenol	410	U
91-57-6	2-Methylnaphthalene	610	
77-47-4	Hexachlorocyclopentadiene	410	U
88-06-2	2,4,6-Trichlorophenol	410	U
95-95-4	2,4,5-Trichlorophenol	990	U
91-58-7	2-Chloronaphthalene	410	U
88-74-4	2-Nitroaniline	990	U
131-11-3	Dimethylphthalate	410	U
208-96-8	Acenaphthylene	410	U
606-20-2	2,6-Dinitrotoluene	410	U
99-09-2	3-Nitroaniline	990	U
83-32-9	Acenaphthene	68	J

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

041313TSB5RE

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 34298RE

Sample wt/vol.: 30 (g/ml) G Lab File ID: >E362H

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 19 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH:

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
51-28-5	2,4-Dinitrophenol	990	U
100-02-7	4-Nitrophenol	990	U
132-64-9	Dibenzofuran	410	U
121-14-2	2,4-Dinitrotoluene	410	U
84-66-2	Diethylphthalate	410	U
7005-72-3	4-Chlorophenyl-phenylether	410	U
86-73-7	Fluorene	76	J
100-01-6	4-Nitroaniline	990	U
534-52-1	4,6-Dinitro-2-methylphenol	990	U
86-30-6	N-Nitrosodiphenylamine (1)	410	U
101-55-3	4-Bromophenyl-phenylether	410	U
118-74-1	Hexachlorobenzene	410	U
87-86-5	Pentachlorophenol	990	U
85-01-8	Phenanthrene	190	J
120-12-7	Anthracene	410	U
86-74-8	Carbazole	410	U
84-74-2	Di-n-butylphthalate	150	J
206-44-0	Fluoranthene	48	J
129-00-0	Pyrene	260	J
85-68-7	Butylbenzylphthalate	190	J
91-94-1	3,3'-Dichlorobenzidine	410	U
56-55-3	Benzo(a)anthracene	410	U
218-01-9	Chrysene	410	U
117-81-7	Bis(2-Ethylhexyl)phthalate	2200	
117-84-0	Di-n-octylphthalate	94	J
205-99-2	Benzo(b)fluoranthene	410	U
207-08-9	Benzo(k)fluoranthene	410	U
50-32-8	Benzo(a)pyrene	410	U
193-39-5	Indeno(1,2,3-cd)pyrene	410	U
53-70-3	Dibenz(a,h)anthracene	410	U
191-24-2	Benzo(g,h,i)perylene	410	U

(1) - Cannot be separated from Diphenylamine

1B

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

041314TSB5

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 34299

Sample wt/vol.: 30 (g/ml) G Lab File ID: >D361L

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 17 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH:

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/KG	Q
108-95-2	Phenol	400	U
111-44-4	bis(2-Chloroethyl)ether	400	U
95-57-8	2-Chlorophenol	400	U
541-73-1	1,3-Dichlorobenzene	400	U
106-46-7	1,4-Dichlorobenzene	400	U
95-50-1	1,2-Dichlorobenzene	400	U
95-48-7	2-Methylphenol	400	U
108-60-1	2,2'-oxybis(1-Chloropropane)	400	U
106-44-5	4-Methylphenol	400	U
621-64-7	N-Nitroso-di-n-propylamine	400	U
67-72-1	Hexachloroethane	400	U
98-95-3	Nitrobenzene	400	U
78-59-1	Isophorone	400	U
88-75-5	2-Nitrophenol	400	U
105-67-9	2,4-Dimethylphenol	400	U
111-91-1	bis(2-Chloroethoxy)methane	400	U
120-83-2	2,4-Dichlorophenol	400	U
120-82-1	1,2,4-Trichlorobenzene	400	U
91-20-3	Naphthalene	580	
106-47-8	4-Chloroaniline	400	U
87-68-3	Hexachlorobutadiene	400	U
59-50-7	4-Chloro-3-methylphenol	400	U
91-57-6	2-Methylnaphthalene	910	
77-47-4	Hexachlorocyclopentadiene	400	U
88-06-2	2,4,6-Trichlorophenol	400	U
95-95-4	2,4,5-Trichlorophenol	960	U
91-58-7	2-Chloronaphthalene	400	U
88-74-4	2-Nitroaniline	960	U
131-11-3	Dimethylphthalate	400	U
208-96-8	Acenaphthylene	400	U
606-20-2	2,6-Dinitrotoluene	400	U
99-09-2	3-Nitroaniline	960	U
83-32-9	Acenaphthene	120	J

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET | 041314TSB5 |

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34299

Sample wt/vol.: 30 (g/ml) G Lab File ID: >D361L

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 17 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
51-28-5	2,4-Dinitrophenol	960	U
100-02-7	4-Nitrophenol	960	U
132-64-9	Dibenzofuran	60	J
121-14-2	2,4-Dinitrotoluene	400	U
84-66-2	Diethylphthalate	400	U
7005-72-3	4-Chlorophenyl-phenylether	400	U
86-73-7	Fluorene	140	J
100-01-6	4-Nitroaniline	960	U
534-52-1	4,6-Dinitro-2-methylphenol	960	U
86-30-6	N-Nitrosodiphenylamine (1)	400	U
101-55-3	4-Bromophenyl-phenylether	400	U
118-74-1	Hexachlorobenzene	400	U
87-86-5	Pentachlorophenol	960	U
85-01-8	Phenanthrene	220	J
120-12-7	Anthracene	400	U
86-74-8	Carbazole	400	U
84-74-2	Di-n-butylphthalate	160	J
206-44-0	Fluoranthene	400	U
129-00-0	Pyrene	400	J
85-68-7	Butylbenzylphthalate	400	U
91-94-1	3,3'-Dichlorobenzidine	400	U
56-55-3	Benzo(a)anthracene	400	U
218-01-9	Chrysene	400	U
117-81-7	Bis(2-Ethylhexyl)phthalate	2800	
117-84-0	Di-n-octylphthalate	400	U
205-99-2	Benzo(b)fluoranthene	400	U
207-08-9	Benzo(k)fluoranthene	400	U
50-32-8	Benzo(a)pyrene	400	U
193-39-5	Indeno(1,2,3-cd)pyrene	400	U
53-70-3	Dibenz(a,h)anthracene	400	U
191-24-2	Benzo(g,h,i)perylene	400	U

(1) - Cannot be separated from Diphenylamine

1F

CLIENT SAMPLE NO.

041314 TSB5

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34299

Sample wt/vol.: 30 (g/mL) G Lab File ID: >D361L

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 17 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

Number TICs found: 21 CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		~~Aldol condensate~~	~~9.76~~	~~2200~~	~~JAB~~
2.		Unknown aliphatic hydrocarbo	11.38	1100 ✓	(J)
3.		Unknown aliphatic hydrocarbo	13.26	1400 ✓	(J)
4.		Unknown aliphatic hydrocarbo	14.00	2200 ✓	(J)
5.		Unknown aliphatic hydrocarbo	15.33	1200 ✓	(J)
6.		Unknown aliphatic hydrocarbo	15.51	1100 ✓	(J)
7.		Unknown aliphatic hydrocarbo	15.68	1000 ✓	(J)
8.		Unknown aliphatic hydrocarbo	16.35	2200 ✓	(J)
9.		Unknown aliphatic hydrocarbo	16.66	1500 ✓	(J)
10.		Unknown aliphatic hydrocarbo	16.91	1100 ✓	(J)
11.		Unknown aliphatic hydrocarbo	17.24	1000 ✓	(J)
12.		Unknown aliphatic hydrocarbo	18.71	1400 ✓	(J)
13.		Unknown aliphatic hydrocarbo	19.49	1500 ✓	(J)
14.		Unknown aliphatic hydrocarbo	19.90	1400 ✓	(J)
15.	629505	Tridecane	20.45	1400 ✓	J
16.		Unknown aliphatic hydrocarbo	21.89	1600 ✓	(J)
17.	629594	Tetradecane	22.34	1700 ✓	J
18.	569415	Naphthalene, 1,8-dimethyl-	23.20	1800 ✓	J
19.		Unknown aliphatic hydrocarbo	23.38	2600 ✓	(J)
20.		Unknown aliphatic hydrocarbo	26.47	1400 ✓	(J)
21.		Unknown aliphatic hydrocarbo	27.35	2800 ✓	(J)
22.					
23.					
24.					
25.					
26.					
27.					
28.					
29.					
30.					

Total Unknown Hyd = 27000 J

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

041314TSB5RE

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 34299RE

Sample wt/vol.: 30 (g/ml) G Lab File ID: >E362L

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 17 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH:

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/KG	Q
108-95-2	Phenol	400	U
111-44-4	bis(2-Chloroethyl)ether	400	U
95-57-8	2-Chlorophenol	400	U
541-73-1	1,3-Dichlorobenzene	400	U
106-46-7	1,4-Dichlorobenzene	400	U
95-50-1	1,2-Dichlorobenzene	400	U
95-48-7	2-Methylphenol	400	U
108-60-1	2,2'-oxybis(1-Chloropropane)	400	U
106-44-5	4-Methylphenol	400	U
621-64-7	N-Nitroso-di-n-propylamine	400	U
67-72-1	Hexachloroethane	400	U
98-95-3	Nitrobenzene	400	U
78-59-1	Isophorone	400	U
88-75-5	2-Nitrophenol	400	U
105-67-9	2,4-Dimethylphenol	400	U
111-91-1	bis(2-Chloroethoxy)methane	400	U
120-83-2	2,4-Dichlorophenol	400	U
120-82-1	1,2,4-Trichlorobenzene	59	J
91-20-3	Naphthalene	560	
106-47-8	4-Chloroaniline	400	U
87-68-3	Hexachlorobutadiene	400	U
59-50-7	4-Chloro-3-methylphenol	400	U
91-57-6	2-Methylnaphthalene	560	
77-47-4	Hexachlorocyclopentadiene	400	U
88-06-2	2,4,6-Trichlorophenol	400	U
95-95-4	2,4,5-Trichlorophenol	960	U
91-58-7	2-Chloronaphthalene	400	U
88-74-4	2-Nitroaniline	960	U
131-11-3	Dimethylphthalate	48	J
208-96-8	Acenaphthylene	400	U
606-20-2	2,6-Dinitrotoluene	400	U
99-09-2	3-Nitroaniline	960	U
83-32-9	Acenaphthene	84	J

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET | 041314TSB5RE |

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34299RE

Sample wt/vol.: 30 (g/ml) G Lab File ID: >E362L

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 17 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
51-28-5	2,4-Dinitrophenol	960	U
100-02-7	4-Nitrophenol	960	U
132-64-9	Dibenzofuran	400	U
121-14-2	2,4-Dinitrotoluene	400	U
84-66-2	Diethylphthalate	400	U
7005-72-3	4-Chlorophenyl-phenylether	400	U
86-73-7	Fluorene	97	J
100-01-6	4-Nitroaniline	960	U
534-52-1	4,6-Dinitro-2-methylphenol	960	U
86-30-6	N-Nitrosodiphenylamine (1)	400	U
101-55-3	4-Bromophenyl-phenylether	400	U
118-74-1	Hexachlorobenzene	400	U
87-86-5	Pentachlorophenol	960	U
85-01-8	Phenanthrene	200	J
120-12-7	Anthracene	400	U
86-74-8	Carbazole	400	U
84-74-2	Di-n-butylphthalate	150	J
206-44-0	Fluoranthene	40	J
129-00-0	Pyrene	290	J
85-68-7	Butylbenzylphthalate	400	U
91-94-1	3,3'-Dichlorobenzidine	400	U
56-55-3	Benzo(a)anthracene	400	U
218-01-9	Chrysene	400	U
117-81-7	Bis(2-Ethylhexyl)phthalate	2900	
117-84-0	Di-n-octylphthalate	50	J
205-99-2	Benzo(b)fluoranthene	400	U
207-08-9	Benzo(k)fluoranthene	400	U
50-32-8	Benzo(a)pyrene	400	U
193-39-5	Indeno(1,2,3-cd)pyrene	400	U
53-70-3	Dibenz(a,h)anthracene	400	U
191-24-2	Benzo(g,h,i)perylene	400	U

(1) - Cannot be separated from Diphenylamine

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

041321TSB6

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 34300

Sample wt/vol.: 30 (g/ml) G Lab File ID: >D361M

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 15 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH:

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/KG	Q
108-95-2	Phenol	390	U
111-44-4	bis(2-Chloroethyl)ether	390	U
95-57-8	2-Chlorophenol	390	U
541-73-1	1,3-Dichlorobenzene	390	U
106-46-7	1,4-Dichlorobenzene	390	U
95-50-1	1,2-Dichlorobenzene	390	U
95-48-7	2-Methylphenol	390	U
108-60-1	2,2'-oxybis(1-Chloropropane)	390	U
106-44-5	4-Methylphenol	390	U
621-64-7	N-Nitroso-di-n-propylamine	390	U
67-72-1	Hexachloroethane	390	U
98-95-3	Nitrobenzene	390	U
78-59-1	Isophorone	390	U
88-75-5	2-Nitrophenol	390	U
105-67-9	2,4-Dimethylphenol	390	U
111-91-1	bis(2-Chloroethoxy)methane	390	U
120-83-2	2,4-Dichlorophenol	390	U
120-82-1	1,2,4-Trichlorobenzene	390	U
91-20-3	Naphthalene	390	U
106-47-8	4-Chloroaniline	390	U
87-68-3	Hexachlorobutadiene	390	U
59-50-7	4-Chloro-3-methylphenol	390	U
91-57-6	2-Methylnaphthalene	390	U
77-47-4	Hexachlorocyclopentadiene	390	U
88-06-2	2,4,6-Trichlorophenol	390	U
95-95-4	2,4,5-Trichlorophenol	940	U
91-58-7	2-Chloronaphthalene	390	U
88-74-4	2-Nitroaniline	940	U
131-11-3	Dimethylphthalate	390	U
208-96-8	Acenaphthylene	390	U
606-20-2	2,6-Dinitrotoluene	390	U
99-09-2	3-Nitroaniline	940	U
83-32-9	Acenaphthene	390	U

1C CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET 041321TSB6

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 34300

Sample wt/vol.: 30 (g/ml) G Lab File ID: >D361M

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 15 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH:

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
51-28-5	2,4-Dinitrophenol	940	U
100-02-7	4-Nitrophenol	940	U
132-64-9	Dibenzofuran	390	U
121-14-2	2,4-Dinitrotoluene	390	U
84-66-2	Diethylphthalate	390	U
7005-72-3	4-Chlorophenyl-phenylether	390	U
86-73-7	Fluorene	390	U
100-01-6	4-Nitroaniline	940	U
534-52-1	4,6-Dinitro-2-methylphenol	940	U
86-30-6	N-Nitrosodiphenylamine (1)	390	U
101-55-3	4-Bromophenyl-phenylether	390	U
118-74-1	Hexachlorobenzene	390	U
87-86-5	Pentachlorophenol	940	U
85-01-8	Phenanthrene	390	U
120-12-7	Anthracene	390	U
86-74-8	Carbazole	390	U
84-74-2	Di-n-butylphthalate	57	J
206-44-0	Fluoranthene	390	U
129-00-0	Pyrene	390	U
85-68-7	Butylbenzylphthalate	390	U
91-94-1	3,3'-Dichlorobenzidine	390	U
56-55-3	Benzo(a)anthracene	390	U
218-01-9	Chrysene	390	U
117-81-7	Bis(2-Ethylhexyl)phthalate	1000	
117-84-0	Di-n-octylphthalate	390	U
205-99-2	Benzo(b)fluoranthene	390	U
207-08-9	Benzo(k)fluoranthene	390	U
50-32-8	Benzo(a)pyrene	390	U
193-39-5	Indeno(1,2,3-cd)pyrene	390	U
53-70-3	Dibenz(a,h)anthracene	390	U
191-24-2	Benzo(g,h,i)perylene	390	U

(1) - Cannot be separated from Diphenylamine

1F

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

CLIENT SAMPLE NO.

041321 TSB6

Lab Name: GULF STATES ANALYTICAL Contract: ____

Lab Code: GSAI Case No.: 5859 SAS No.: ____ SDG No.: ____

Matrix: (soil/water) SOIL Lab Sample ID: 34300

Sample wt/vol.: 30 (g/mL) G Lab File ID: >E362M

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 15 decanted:(Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/29/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

Number TICs found: 21

CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/KG

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	Unknown	7.09	380	J
2.	Unknown	8.23	400	J
3.	~~Aldol condensate~~	~~9.67~~	~~6500~~	JAB
4.	Unknown	12.40	660	J
5.	Unknown	13.51	830	J
6.	Unknown	13.69	1800	J
7.	Unknown	14.78	560	J
8.	Unknown aliphatic hydrocarbo	15.21	440	J
9.	Unknown aliphatic hydrocarbo	15.40	330	J
10.	Unknown	16.38	350	J
11.	Unknown aliphatic hydrocarbo	17.61	290	J
12.	Unknown aliphatic hydrocarbo	18.62	430	J
13.	Unknown aliphatic hydrocarbo	19.40	350	J
14.	Unknown aliphatic hydrocarbo	19.81	450	J
15.	Unknown aliphatic hydrocarbo	21.80	470	J
16.	Unknown aliphatic hydrocarbo	23.32	570	J
17. 719222	2,5-Cyclohexadiene-1,4-dio	23.65	500 ✓	J
18.	Unknown aliphatic hydrocarbo	27.30	790	J
19.	Unknown phenol	27.59	460 ✓	J
20.	Unknown phenol	27.71	320 ✓	J
21.	Unknown aliphatic hydrocarbo	28.84	480	J
22.				
23.				
24.				
25.				
26.				
27.				
28.				
29.				
30.				

FORM I SV-TIC 3/90

581

Total Unknown = 5000 J
Total Unk. HYD = 4600 J
Total phenol = 780 J

AR305632

1B

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

041321TSB6RE

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34300RE

Sample wt/vol.: 30 (g/ml) G Lab File ID: >E362M

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 15 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/29/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/KG	Q
108-95-2	Phenol	390	U
111-44-4	bis(2-Chloroethyl)ether	390	U
95-57-8	2-Chlorophenol	390	U
541-73-1	1,3-Dichlorobenzene	390	U
106-46-7	1,4-Dichlorobenzene	390	U
95-50-1	1,2-Dichlorobenzene	390	U
95-48-7	2-Methylphenol	390	U
108-60-1	2,2'-oxybis(1-Chloropropane)	390	U
106-44-5	4-Methylphenol	390	U
621-64-7	N-Nitroso-di-n-propylamine	390	U
67-72-1	Hexachloroethane	390	U
98-95-3	Nitrobenzene	390	U
78-59-1	Isophorone	390	U
88-75-5	2-Nitrophenol	390	U
105-67-9	2,4-Dimethylphenol	390	U
111-91-1	bis(2-Chloroethoxy)methane	390	U
120-83-2	2,4-Dichlorophenol	390	U
120-82-1	1,2,4-Trichlorobenzene	390	U
91-20-3	Naphthalene	390	U
106-47-8	4-Chloroaniline	390	U
87-68-3	Hexachlorobutadiene	390	U
59-50-7	4-Chloro-3-methylphenol	390	U
91-57-6	2-Methylnaphthalene	390	U
77-47-4	Hexachlorocyclopentadiene	390	U
88-06-2	2,4,6-Trichlorophenol	390	U
95-95-4	2,4,5-Trichlorophenol	940	U
91-58-7	2-Chloronaphthalene	390	U
88-74-4	2-Nitroaniline	940	U
131-11-3	Dimethylphthalate	390	U
208-96-8	Acenaphthylene	390	U
606-20-2	2,6-Dinitrotoluene	390	U
99-09-2	3-Nitroaniline	940	U
83-32-9	Acenaphthene	390	U

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

041321TSB6RE

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34300RE

Sample wt/vol.: 30 (g/ml) G Lab File ID: >E362M

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 15 decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/29/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
51-28-5	2,4-Dinitrophenol	940	U
100-02-7	4-Nitrophenol	940	U
132-64-9	Dibenzofuran	390	U
121-14-2	2,4-Dinitrotoluene	390	U
84-66-2	Diethylphthalate	390	U
7005-72-3	4-Chlorophenyl-phenylether	390	U
86-73-7	Fluorene	390	U
100-01-6	4-Nitroaniline	940	U
534-52-1	4,6-Dinitro-2-methylphenol	940	U
86-30-6	N-Nitrosodiphenylamine (1)	390	U
101-55-3	4-Bromophenyl-phenylether	390	U
118-74-1	Hexachlorobenzene	390	U
87-86-5	Pentachlorophenol	940	U
85-01-8	Phenanthrene	390	U
120-12-7	Anthracene	390	U
86-74-8	Carbazole	390	U
84-74-2	Di-n-butylphthalate	54	J
206-44-0	Fluoranthene	390	U
129-00-0	Pyrene	55	J
85-68-7	Butylbenzylphthalate	390	U
91-94-1	3,3'-Dichlorobenzidine	390	U
56-55-3	Benzo(a)anthracene	390	U
218-01-9	Chrysene	390	U
117-81-7	Bis(2-Ethylhexyl)phthalate	1300	
117-84-0	Di-n-octylphthalate	390	U
205-99-2	Benzo(b)fluoranthene	390	U
207-08-9	Benzo(k)fluoranthene	390	U
50-32-8	Benzo(a)pyrene	390	U
193-39-5	Indeno(1,2,3-cd)pyrene	390	U
53-70-3	Dibenz(a,h)anthracene	390	U
191-24-2	Benzo(g,h,i)perylene	80	J

(1) - Cannot be separated from Diphenylamine

1B

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

041327 EB1

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) WATER Lab Sample ID: 34301

Sample wt/vol.: 500 (g/ml) ML Lab File ID: >E361J

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: _____ decanted: (Y/N) N Date Extracted: 12/12/91

Concentration Extract Volume: 1000 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/L	Q
108-95-2	Phenol	10	U
111-44-4	bis(2-Chloroethyl)ether	10	U
95-57-8	2-Chlorophenol	10	U
541-73-1	1,3-Dichlorobenzene	10	U
106-46-7	1,4-Dichlorobenzene	10	U
95-50-1	1,2-Dichlorobenzene	10	U
95-48-7	2-Methylphenol	10	U
108-60-1	2,2'-oxybis(1-Chloropropane)	10	U
106-44-5	4-Methylphenol	10	U
621-64-7	N-Nitroso-di-n-propylamine	10	U
67-72-1	Hexachloroethane	10	U
98-95-3	Nitrobenzene	10	U
78-59-1	Isophorone	10	U
88-75-5	2-Nitrophenol	10	U
105-67-9	2,4-Dimethylphenol	10	U
111-91-1	bis(2-Chloroethoxy)methane	10	U
120-83-2	2,4-Dichlorophenol	10	U
120-82-1	1,2,4-Trichlorobenzene	10	U
91-20-3	Naphthalene	10	U
106-47-8	4-Chloroaniline	10	U
87-68-3	Hexachlorobutadiene	10	U
59-50-7	4-Chloro-3-methylphenol	10	U
91-57-6	2-Methylnaphthalene	10	U
77-47-4	Hexachlorocyclopentadiene	10	U
88-06-2	2,4,6-Trichlorophenol	10	U
95-95-4	2,4,5-Trichlorophenol	25	U
91-58-7	2-Chloronaphthalene	10	U
88-74-4	2-Nitroaniline	25	U
131-11-3	Dimethylphthalate	10	U
208-96-8	Acenaphthylene	10	U
606-20-2	2,6-Dinitrotoluene	10	U
99-09-2	3-Nitroaniline	25	U
83-32-9	Acenaphthene	10	U

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

041327 EB1

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) WATER Lab Sample ID: 34301

Sample wt/vol.: 500 (g/ml) ML Lab File ID: >E361J

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: decanted: (Y/N) N Date Extracted: 12/12/91

Concentration Extract Volume: 1000 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH:

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
51-28-5	2,4-Dinitrophenol	25	U
100-02-7	4-Nitrophenol	25	U
132-64-9	Dibenzofuran	10	U
121-14-2	2,4-Dinitrotoluene	10	U
84-66-2	Diethylphthalate	10	U
7005-72-3	4-Chlorophenyl-phenylether	10	U
86-73-7	Fluorene	10	U
100-01-6	4-Nitroaniline	25	U
534-52-1	4,6-Dinitro-2-methylphenol	25	U
86-30-6	N-Nitrosodiphenylamine (1)	10	U
101-55-3	4-Bromophenyl-phenylether	10	U
118-74-1	Hexachlorobenzene	10	U
87-86-5	Pentachlorophenol	25	U
85-01-8	Phenanthrene	10	U
120-12-7	Anthracene	10	U
86-74-8	Carbazole	10	U
84-74-2	Di-n-butylphthalate	10	U
206-44-0	Fluoranthene	10	U
129-00-0	Pyrene	10	U
85-68-7	Butylbenzylphthalate	10	U
91-94-1	3,3'-Dichlorobenzidine	10	U
56-55-3	Benzo(a)anthracene	10	U
218-01-9	Chrysene	10	U
117-81-7	Bis(2-Ethylhexyl)phthalate	4	J
117-84-0	Di-n-octylphthalate	10	U
205-99-2	Benzo(b)fluoranthene	10	U
207-08-9	Benzo(k)fluoranthene	10	U
50-32-8	Benzo(a)pyrene	10	U
193-39-5	Indeno(1,2,3-cd)pyrene	10	U
53-70-3	Dibenz(a,h)anthracene	10	U
191-24-2	Benzo(g,h,i)perylene	10	U

(1) - Cannot be separated from Diphenylamine

1F

CLIENT SAMPLE NO.

041327 EB1

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) WATER Lab Sample ID: 34301

Sample wt/vol.: 500 (g/mL) ML Lab File ID: >E361J

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: . decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 1000 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: _____

Number TICs found: 10 CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		Unknown	7.26	14	JB
2.		Unknown	11.47	11	JB
3.		Unknown	13.77	88	JB
4.		Unknown	13.89	9	JB
5.		Unknown	14.61	12	JB
6.	289167	1,2,4-Trithiolane	16.70	16	J
7.	112345	Ethanol, 2-(2-butoxyehtoxy)-	18.15	14	JB
8.	17233715	Hexathiepane	28.85	23	J
9.		Unknown aliphatic hydrocarbo	37.43	8	JB
10.		Unknown aliphatic hydrocarbo	39.43	14	JB
11.					
12.					
13.					
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17.					
18.					
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CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET | 041328SS4 |

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34302

Sample wt/vol.: 30 (g/ml) G Lab File ID: >E002G

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 17 decanted: (Y/N) N Date Extracted: 12/30/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 01/02/92

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/KG	Q
108-95-2	Phenol	400	U
111-44-4	bis(2-Chloroethyl)ether	400	U
95-57-8	2-Chlorophenol	400	U
541-73-1	1,3-Dichlorobenzene	400	U
106-46-7	1,4-Dichlorobenzene	400	U
95-50-1	1,2-Dichlorobenzene	400	U
95-48-7	2-Methylphenol	400	U
108-60-1	2,2'-oxybis(1-Chloropropane)	400	U
106-44-5	4-Methylphenol	400	U
621-64-7	N-Nitroso-di-n-propylamine	400	U
67-72-1	Hexachloroethane	400	U
98-95-3	Nitrobenzene	400	U
78-59-1	Isophorone	400	U
88-75-5	2-Nitrophenol	400	U
105-67-9	2,4-Dimethylphenol	400	U
111-91-1	bis(2-Chloroethoxy)methane	400	U
120-83-2	2,4-Dichlorophenol	400	U
120-82-1	1,2,4-Trichlorobenzene	400	U
91-20-3	Naphthalene	120	J
106-47-8	4-Chloroaniline	400	U
87-68-3	Hexachlorobutadiene	400	U
59-50-7	4-Chloro-3-methylphenol	400	U
91-57-6	2-Methylnaphthalene	42	J
77-47-4	Hexachlorocyclopentadiene	400	U
88-06-2	2,4,6-Trichlorophenol	400	U
95-95-4	2,4,5-Trichlorophenol	960	U
91-58-7	2-Chloronaphthalene	400	U
88-74-4	2-Nitroaniline	960	U
131-11-3	Dimethylphthalate	400	U
208-96-8	Acenaphthylene	400	U
606-20-2	2,6-Dinitrotoluene	400	U
99-09-2	3-Nitroaniline	960	U
83-32-9	Acenaphthene	400	U

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET | 041328SS4 |

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34302

Sample wt/vol.: 30 (g/ml) G Lab File ID: >E002G

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 17 decanted: (Y/N) N Date Extracted: 12/30/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 01/02/92

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
51-28-5	2,4-Dinitrophenol	960	U
100-02-7	4-Nitrophenol	960	U
132-64-9	Dibenzofuran	400	U
121-14-2	2,4-Dinitrotoluene	400	U
84-66-2	Diethylphthalate	48	J
7005-72-3	4-Chlorophenyl-phenylether	400	U
86-73-7	Fluorene	400	U
100-01-6	4-Nitroaniline	960	U
534-52-1	4,6-Dinitro-2-methylphenol	960	U
86-30-6	N-Nitrosodiphenylamine (1)	400	U
101-55-3	4-Bromophenyl-phenylether	400	U
118-74-1	Hexachlorobenzene	400	U
87-86-5	Pentachlorophenol	960	U
85-01-8	Phenanthrene	60	J
120-12-7	Anthracene	400	U
86-74-8	Carbazole	400	U
84-74-2	Di-n-butylphthalate	63	J
206-44-0	Fluoranthene	55	J
129-00-0	Pyrene	430	
85-68-7	Butylbenzylphthalate	400	U
91-94-1	3,3'-Dichlorobenzidine	400	U
56-55-3	Benzo(a)anthracene	400	U
218-01-9	Chrysene	310	J
117-81-7	Bis(2-Ethylhexyl)phthalate	3100	
117-84-0	Di-n-octylphthalate	400	U
205-99-2	Benzo(b)fluoranthene	290	J
207-08-9	Benzo(k)fluoranthene	52	J
50-32-8	Benzo(a)pyrene	170	J
193-39-5	Indeno(1,2,3-cd)pyrene	400	U
53-70-3	Dibenz(a,h)anthracene	400	U
191-24-2	Benzo(g,h,i)perylene	440	

(1) - Cannot be separated from Diphenylamine

1F

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

CLIENT SAMPLE NO.: 041328 SS4

Lab Name: GULF STATES ANALYTICAL Contract: ________

Lab Code: GSAI Case No.: 5859 SAS No.: ______ SDG No.: ______

Matrix: (soil/water) SOIL Lab Sample ID: 34302

Sample wt/vol.: 30 (g/mL) G Lab File ID: >E002G

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 17 decanted: (Y/N) N Date Extracted: 12/30/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 01/02/92

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

Number TICs found: 21

CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	Unknown	8.05	3600	J
2.	Unknown	8.69	680	J
3.	Unknown	8.93	3800	J
~~4.~~	~~Aldol condensate~~	~~9.51~~	~~17000~~	~~JAB~~
5.	Unknown	13.32	490	J
6. 14203191	1,3-Cyclopentanedione, 2-chl	13.49	2700	J
7.	Unknown aliphatic hydrocarbo	20.38	530	J
8.	Unknown aliphatic hydrocarbo	20.90	300	J
9. 54832836	1H-Indene, octahydro-2,2,4,4	22.05	1100	J
10.	Unknown	22.85	730	J
11.	Unknown	23.61	470	J
12. 140669	Phenol, 4-(1,1,3,3-tetrameth	25.80	10000	J
13.	Unknown	27.12	6800	J
14. 54932784	Phenol, 4-(2,2,3,3-tetrameth	27.28	1600	J
15.	Unknown	27.42	3000	J
16. 25154523	Phenol, nonyl-	27.51	4700	J
17.	Unknown phenol	27.59	4100	J
18.	Unknown phenol	27.73	5800	J
19.	Unknown	27.90	8100	J
20.	Unknown	28.06	1900	J
21.	Unknown phenol	28.14	2100	J
22.				
23.				
24.				
25.				
26.				
27.				
28.				
29.				
30.				

FORM I SV-TIC 3/90

651

Total Unknown: 29000 J
Total All Phenol = 28[illegible] J

AR305640

1B

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

041328SS4RE

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34302RE

Sample wt/vol.: 30 (g/ml) G Lab File ID: >E002H

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 17 decanted: (Y/N) N Date Extracted: 12/30/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 01/02/92

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/KG	Q
108-95-2	Phenol	400	U
111-44-4	bis(2-Chloroethyl)ether	400	U
95-57-8	2-Chlorophenol	400	U
541-73-1	1,3-Dichlorobenzene	400	U
106-46-7	1,4-Dichlorobenzene	400	U
95-50-1	1,2-Dichlorobenzene	400	U
95-48-7	2-Methylphenol	400	U
108-60-1	2,2'-oxybis(1-Chloropropane)	400	U
106-44-5	4-Methylphenol	400	U
621-64-7	N-Nitroso-di-n-propylamine	400	U
67-72-1	Hexachloroethane	400	U
98-95-3	Nitrobenzene	400	U
78-59-1	Isophorone	400	U
88-75-5	2-Nitrophenol	400	U
105-67-9	2,4-Dimethylphenol	400	U
111-91-1	bis(2-Chloroethoxy)methane	400	U
120-83-2	2,4-Dichlorophenol	400	U
120-82-1	1,2,4-Trichlorobenzene	400	U
91-20-3	Naphthalene	130	J
106-47-8	4-Chloroaniline	400	U
87-68-3	Hexachlorobutadiene	400	U
59-50-7	4-Chloro-3-methylphenol	400	U
91-57-6	2-Methylnaphthalene	48	J
77-47-4	Hexachlorocyclopentadiene	400	U
88-06-2	2,4,6-Trichlorophenol	400	U
95-95-4	2,4,5-Trichlorophenol	960	U
91-58-7	2-Chloronaphthalene	400	U
88-74-4	2-Nitroaniline	960	U
131-11-3	Dimethylphthalate	400	U
208-96-8	Acenaphthylene	400	U
606-20-2	2,6-Dinitrotoluene	400	U
99-09-2	3-Nitroaniline	960	U
83-32-9	Acenaphthene	400	U

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

041328SS4RE

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34302RE

Sample wt/vol.: 30 (g/ml) G Lab File ID: >E002H

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: 17 decanted: (Y/N) N Date Extracted: 12/30/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 01/02/92

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
51-28-5	2,4-Dinitrophenol	960	U
100-02-7	4-Nitrophenol	960	U
132-64-9	Dibenzofuran	400	U
121-14-2	2,4-Dinitrotoluene	400	U
84-66-2	Diethylphthalate	55	J
7005-72-3	4-Chlorophenyl-phenylether	400	U
86-73-7	Fluorene	400	U
100-01-6	4-Nitroaniline	960	U
534-52-1	4,6-Dinitro-2-methylphenol	960	U
86-30-6	N-Nitrosodiphenylamine (1)	400	U
101-55-3	4-Bromophenyl-phenylether	400	U
118-74-1	Hexachlorobenzene	400	U
87-86-5	Pentachlorophenol	960	U
85-01-8	Phenanthrene	93	J
120-12-7	Anthracene	400	U
86-74-8	Carbazole	400	U
84-74-2	Di-n-butylphthalate	69	J
206-44-0	Fluoranthene	53	J
129-00-0	Pyrene	400	U
85-68-7	Butylbenzylphthalate	400	U
91-94-1	3,3'-Dichlorobenzidine	400	U
56-55-3	Benzo(a)anthracene	400	U
218-01-9	Chrysene	340	J
117-81-7	Bis(2-Ethylhexyl)phthalate	3000	
117-84-0	Di-n-octylphthalate	400	U
205-99-2	Benzo(b)fluoranthene	320	J
207-08-9	Benzo(k)fluoranthene	400	U
50-32-8	Benzo(a)pyrene	310	J
193-39-5	Indeno(1,2,3-cd)pyrene	350	J
53-70-3	Dibenz(a,h)anthracene	400	U
191-24-2	Benzo(g,h,i)perylene	520	

(1) - Cannot be separated from Diphenylamine

1D

CLIENT SAMPLE NO.

PESTICIDE ORGANICS ANALYSIS DATA SHEET

041310 SS-2

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34297

Sample wt/vol.: 30 (g/mL) G Lab File ID: CLP1366.SEQ

% Moisture: 18 decanted: (Y/N) N Date Received: 12/07/91

Extraction: (SepF/Cont/Sonc) SONC Date Extracted: 12/13/91

Concentrated Extract Volume: 10000 (uL) Date Analyzed: 12/30/91

Injection Volume: 1.0 (uL) Dilution Factor: 8.0

GPC Cleanup: (Y/N) Y pH: ____ Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
319-84-6	alpha-BHC	7.8	
319-85-7	beta-BHC	16.6	U
319-86-8	delta-BHC	16.6	U
58-89-9	gamma-BHC (Lindane)	16.6	U
76-44-8	Heptachlor	16.6	U
309-00-2	Aldrin	16.6	U
1024-57-3	Heptachlor epoxide	16.6	U
959-98-8	Endosulfan I	410	
60-57-1	Dieldrin	32.2	U
72-55-9	4,4'-DDE	32.2	U
72-20-8	Endrin	32.2	U
33213-65-9	Endosulfan II	280	
72-54-8	4,4'-DDD	32.2	U
1031-07-8	Endosulfan sulfate	32.2	U
50-29-3	4,4'-DDT	32.2	U
72-43-5	Methoxychlor	166	U
53494-70-5	Endrin ketone	32.2	U
7421-36-3	Endrin aldehyde	32.2	U
5103-71-9	alpha-Chlordane	180	
5103-74-2	gamma-Chlordane	230	
8001-35-2	Toxaphene	1658	U
12674-11-2	Aroclor-1016	322	U
11104-28-2	Aroclor-1221	650	U
11141-16-5	Aroclor-1232	322	U
53469-21-9	Aroclor-1242	322	U
12672-29-6	Aroclor-1248	322	U
11097-69-1	Aroclor-1254	322	U
11096-82-5	Aroclor-1260	322	U

1D

CLIENT SAMPLE NO.

PESTICIDE ORGANICS ANALYSIS DATA SHEET

041313 TSB-5 2'-4'

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34298

Sample wt/vol.: 30 (g/mL) G Lab File ID: CLP1366.SEQ

% Moisture: 19 decanted: (Y/N) N Date Received: 12/07/91

Extraction: (SepF/Cont/Sonc) SONC Date Extracted: 12/13/91

Concentrated Extract Volume: 10000 (uL) Date Analyzed: 12/30/91

Injection Volume: 1.0 (uL) Dilution Factor: 4.0

GPC Cleanup: (Y/N) Y pH: ____ Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
319-84-6	alpha-BHC	26	
319-85-7	beta-BHC	8.4	U
319-86-8	delta-BHC	8.4	U
58-89-9	gamma-BHC (Lindane)	8.4	U
76-44-8	Heptachlor	8.4	U
309-00-2	Aldrin	8.4	U
1024-57-3	Heptachlor epoxide	8.4	U
959-98-8	Endosulfan I	130	
60-57-1	Dieldrin	16.3	U
72-55-9	4,4'-DDE	16.3	U
72-20-8	Endrin	16.3	U
33213-65-9	Endosulfan II	58	
72-54-8	4,4'-DDD	16.3	U
1031-07-8	Endosulfan sulfate	16.3	U
50-29-3	4,4'-DDT	16.3	U
72-43-5	Methoxychlor	17.0	U
53494-70-5	Endrin ketone	16.3	U
7421-36-3	Endrin aldehyde	16.3	U
5103-71-9	alpha-Chlordane	51	
5103-74-2	gamma-Chlordane	38	
8001-35-2	Toxaphene	840	U
12674-11-2	Aroclor-1016	163	U
11104-28-2	Aroclor-1221	331	U
11141-16-5	Aroclor-1232	163	U
53469-21-9	Aroclor-1242	163	U
12672-29-6	Aroclor-1248	163	U
11097-69-1	Aroclor-1254	163	U
11096-82-5	Aroclor-1260	163	U

1D

CLIENT SAMPLE NO.

PESTICIDE ORGANICS ANALYSIS DATA SHEET | 041314 TSB-5 4'-6'

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34299

Sample wt/vol.: 30 (g/mL) G Lab File ID: CLP1366.SEQ

% Moisture: 17 decanted: (Y/N) N Date Received: 12/07/91

Extraction: (SepF/Cont/Sonc) SONC Date Extracted: 12/13/91

Concentrated Extract Volume: 10000 (uL) Date Analyzed: 12/31/91

Injection Volume: 1.0 (uL) Dilution Factor: 4.0

GPC Cleanup: (Y/N) Y pH: ____ Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
319-84-6	alpha-BHC	8.2	U
319-85-7	beta-BHC	32	
319-86-8	delta-BHC	8.2	U
58-89-9	gamma-BHC (Lindane)	8.2	U
76-44-8	Heptachlor	8.2	U
309-00-2	Aldrin	8.2	U
1024-57-3	Heptachlor epoxide	8.2	U
959-98-8	Endosulfan I	490	
60-57-1	Dieldrin	15.9	U
72-55-9	4,4'-DDE	15.9	U
72-20-8	Endrin	15.9	U
33213-65-9	Endosulfan II	210	
72-54-8	4,4'-DDD	15.9	U
1031-07-8	Endosulfan sulfate	15.9	U
50-29-3	4,4'-DDT	15.9	U
72-43-5	Methoxychlor	82	U
53494-70-5	Endrin ketone	15.9	U
7421-36-3	Endrin aldehyde	15.9	U
5103-71-9	alpha-Chlordane	140	
5103-74-2	gamma-Chlordane	85	
8001-35-2	Toxaphene	819	U
12674-11-2	Aroclor-1016	159	U
11104-28-2	Aroclor-1221	323	U
11141-16-5	Aroclor-1232	159	U
53469-21-9	Aroclor-1242	159	U
12672-29-6	Aroclor-1248	159	U
11097-69-1	Aroclor-1254	159	U
11096-82-5	Aroclor-1260	159	U

1D

CLIENT SAMPLE NO.

PESTICIDE ORGANICS ANALYSIS DATA SHEET

041321 TSB-6 4'-6'

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 34300

Sample wt/vol.: 30 (g/mL) G Lab File ID: CLP1366.SEQ

% Moisture: 15 decanted: (Y/N) N Date Received: 12/07/91

Extraction: (SepF/Cont/Sonc) SONC Date Extracted: 12/13/91

Concentrated Extract Volume: 10000 (uL) Date Analyzed: 12/31/91

Injection Volume: 1.0 (uL) Dilution Factor: 4.0

GPC Cleanup: (Y/N) Y pH: Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
319-84-6	alpha-BHC	3.3	
319-85-7	beta-BHC	8.0	U
319-86-8	delta-BHC	8.0	U
58-89-9	gamma-BHC (Lindane)	8.0	U
76-44-8	Heptachlor	8.0	U
309-00-2	Aldrin	8.0	U
1024-57-3	Heptachlor epoxide	8.0	U
959-98-8	Endosulfan I	4.6	
60-57-1	Dieldrin	15.5	U
72-55-9	4,4'-DDE	15.5	U
72-20-8	Endrin	15.5	U
33213-65-9	Endosulfan II	3.7	
72-54-8	4,4'-DDD	15.5	U
1031-07-8	Endosulfan sulfate	15.5	U
50-29-3	4,4'-DDT	15.5	U
72-43-5	Methoxychlor	80	U
53494-70-5	Endrin ketone	15.5	U
7421-36-3	Endrin aldehyde	15.5	U
5103-71-9	alpha-Chlordane	56	
5103-74-2	gamma-Chlordane	70	
8001-35-2	Toxaphene	800	U
12674-11-2	Aroclor-1016	155.3	U
11104-28-2	Aroclor-1221	315	U
11141-16-5	Aroclor-1232	155.3	U
53469-21-9	Aroclor-1242	155.3	U
12672-29-6	Aroclor-1248	155.3	U
11097-69-1	Aroclor-1254	155.3	U
11096-82-5	Aroclor-1260	155.3	U

ug/kg

FORM I PEST 3/90

1D

CLIENT SAMPLE NO.

PESTICIDE ORGANICS ANALYSIS DATA SHEET

041327 EB1

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) WATER Lab Sample ID: 34301

Sample wt/vol.: 1000 (g/mL) ML Lab File ID: CLP1366.SEQ

% Moisture: _____ decanted: (Y/N) N Date Received: 12/09/91

Extraction: (SepF/Cont/Sonc) CONT Date Extracted: 12/12/91

Concentrated Extract Volume: 10000 (uL) Date Analyzed: 12/30/91

Injection Volume: 1.0 (uL) Dilution Factor: 2.0

GPC Cleanup: (Y/N) Y pH: ____ Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
319-84-6	alpha-BHC	0.05	U
319-85-7	beta-BHC	0.05	U
319-86-8	delta-BHC	0.05	U
58-89-9	gamma-BHC (Lindane)	0.05	U
76-44-8	Heptachlor	0.05	U
309-00-2	Aldrin	0.05	U
1024-57-3	Heptachlor epoxide	0.05	U
959-98-8	Endosulfan I	0.05	U
60-57-1	Dieldrin	0.10	U
72-55-9	4,4'-DDE	0.10	U
72-20-8	Endrin	0.10	U
33213-65-9	Endosulfan II	0.10	U
72-54-8	4,4'-DDD	0.10	U
1031-07-8	Endosulfan sulfate	0.10	U
50-29-3	4,4'-DDT	0.10	U
72-43-5	Methoxychlor	0.50	U
53494-70-5	Endrin ketone	0.10	U
7421-36-3	Endrin aldehyde	0.10	U
5103-71-9	alpha-Chlordane	0.05	U
5103-74-2	gamma-Chlordane	0.05	U
8001-35-2	Toxaphene	5.00	U
12674-11-2	Aroclor-1016	1.00	U
11104-28-2	Aroclor-1221	2.00	U
11141-16-5	Aroclor-1232	1.00	U
53469-21-9	Aroclor-1242	1.00	U
12672-29-6	Aroclor-1248	1.00	U
11097-69-1	Aroclor-1254	1.00	U
11096-82-5	Aroclor-1260	1.00	U

1D CLIENT SAMPLE NO.

PESTICIDE ORGANICS ANALYSIS DATA SHEET 041328 SS-4

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 34302

Sample wt/vol.: 30 (g/mL) G Lab File ID: CLP1366.SEQ

% Moisture: 17 decanted: (Y/N) N Date Received: 12/07/91

Extraction: (SepF/Cont/Sonc) SONC Date Extracted: 12/13/91

Concentrated Extract Volume: 10000 (uL) Date Analyzed: 12/31/91

Injection Volume: 1.0 (uL) Dilution Factor: 4.0

GPC Cleanup: (Y/N) Y pH: Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
319-84-6	alpha-BHC	10	
319-85-7	beta-BHC	8.2	U
319-86-8	delta-BHC	8.2	U
58-89-9	gamma-BHC (Lindane)	8.2	U
76-44-8	Heptachlor	8.2	U
309-00-2	Aldrin	8.2	U
1024-57-3	Heptachlor epoxide	8.2	U
959-98-8	Endosulfan I	250	
60-57-1	Dieldrin	15.9	U
72-55-9	4,4'-DDE	15.9	U
72-20-8	Endrin	15.9	U
33213-65-9	Endosulfan II	180	
72-54-8	4,4'-DDD	15.9	U
1031-07-8	Endosulfan sulfate	150	
50-29-3	4,4'-DDT	15.9	U
72-43-5	Methoxychlor	81.9	U
53494-70-5	Endrin ketone	15.9	U
7421-36-3	Endrin aldehyde	15.9	U
5103-71-9	alpha-Chlordane	100	
5103-74-2	gamma-Chlordane	120	
8001-35-2	Toxaphene	819	U
12674-11-2	Aroclor-1016	159	U
11104-28-2	Aroclor-1221	323	U
11141-16-5	Aroclor-1232	159	U
53469-21-9	Aroclor-1242	159	U
12672-29-6	Aroclor-1248	159	U
11097-69-1	Aroclor-1254	159	U
11096-82-5	Aroclor-1260	159	U

CLIENT SAMPLE NO.

041310

INORGANIC ANALYSIS DATA SHEET

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix (soil/water) : SOIL Lab Sample ID: 34297

Level (low/med) : LOW Date Received: 12/07/91

% Solids: 82.0

Concentration Units (ug/L or mg/kg dry weight): MG/KG

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum	10400			P
7440-36-0	Antimony	6	B	N	P
7440-38-2	Arsenic	22.1		NS	F
7440-39-3	Barium	83.9		N	P
7440-41-7	Beryllium	0.6	B		P
7440-43-9	Cadmium	1	U		P
7440-70-2	Calcium	445	B		P
7440-47-3	Chromium	23.0		N	P
7440-48-4	Cobalt	3.5	B		P
7440-50-8	Copper	52.4			P
7439-89-6	Iron	15700			P
7439-92-1	Lead	86.1			F
7439-95-4	Magnesium	1160	B		P
7439-96-5	Manganese	61.5		N*	P
7439-97-6	Mercury	1.2			AV
7440-02-0	Nickel	7.6	B		P
7440-09-7	Potassium	531	B		A
7782-49-2	Selenium	0.8	B		F
7440-22-4	Silver	2	U	N	P
7440-23-5	Sodium	80.0	B		P
7440-28-0	Thallium	2	U		F
7440-62-2	Vanadium	31.6			P
7440-66-6	Zinc	77.0		E	P
	Cyanide	2	U		C

Color Before: BROWN Clarity Before: Texture: CLAY

Color After: BROWN Clarity After: Artifacts:

Comments:

FORM I - IN

CLIENT SAMPLE NO.

041313

INORGANIC ANALYSIS DATA SHEET

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix (soil/water) : SOIL Lab Sample ID: 34298

Level (low/med) : LOW Date Received: 12/07/91

% Solids: 80.6

Concentration Units (ug/L or mg/kg dry weight): MG/KG

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum	8550			P
7440-36-0	Antimony	12	U	N	P
7440-38-2	Arsenic	4.4		NS	F
7440-39-3	Barium	54.0		N	P
7440-41-7	Beryllium	0.3	B		P
7440-43-9	Cadmium	1.1	B		P
7440-70-2	Calcium	370	B		P
7440-47-3	Chromium	14		N	P
7440-48-4	Cobalt	3.8	B		P
7440-50-8	Copper	6.7			P
7439-89-6	Iron	13900			P
7439-92-1	Lead	21.4		S	F
7439-95-4	Magnesium	742	B		P
7439-96-5	Manganese	149		N*	P
7439-97-6	Mercury	0.61			AV
7440-02-0	Nickel	6.5	B		P
7440-09-7	Potassium	610	B		A
7782-49-2	Selenium	0.7	B		F
7440-22-4	Silver	2	U	N	P
7440-23-5	Sodium	691	B		P
7440-28-0	Thallium	2	U		F
7440-62-2	Vanadium	34.6			P
7440-66-6	Zinc	24.1		E	P
	Cyanide	2	U		C

Color Before: BROWN Clarity Before: Texture: CLAY

Color After: BROWN Clarity After: Artifacts:

Comments:

FORM I - IN

CLIENT SAMPLE NO.

041314

INORGANIC ANALYSIS DATA SHEET

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix (soil/water) : SOIL Lab Sample ID: 34299

Level (low/med) : LOW Date Received: 12/07/91

% Solids: 83.3

Concentration Units (ug/L or mg/kg dry weight): MG/KG

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum	9830			P
7440-36-0	Antimony	12	U	N	P
7440-38-2	Arsenic	4.5		NS	F
7440-39-3	Barium	40.8	B	N	P
7440-41-7	Beryllium	0.3	B		P
7440-43-9	Cadmium	1	U		P
7440-70-2	Calcium	579	B		P
7440-47-3	Chromium	14.2		N	P
7440-48-4	Cobalt	4.8	B		P
7440-50-8	Copper	8.7			P
7439-89-6	Iron	15200			P
7439-92-1	Lead	21.0			F
7439-95-4	Magnesium	755	B		P
7439-96-5	Manganese	204		N*	P
7439-97-6	Mercury	0.3			AV
7440-02-0	Nickel	5.0	B		P
7440-09-7	Potassium	684	B		A
7782-49-2	Selenium	0.5	B		F
7440-22-4	Silver	2	U	N	P
7440-23-5	Sodium	117	B		P
7440-28-0	Thallium	2	U		F
7440-62-2	Vanadium	33.6			P
7440-66-6	Zinc	30.9		E	P
	Cyanide	2	U		C

Color Before: BROWN Clarity Before: Texture: CLAY

Color After: BROWN Clarity After: Artifacts:

Comments:

FORM I - IN

CLIENT SAMPLE NO.

041321

INORGANIC ANALYSIS DATA SHEET

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix (soil/water) : SOIL Lab Sample ID: 34300

Level (low/med) : LOW Date Received: 12/07/91

% Solids: 84.7

Concentration Units (ug/L or mg/kg dry weight): MG/KG

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum	7780			P
7440-36-0	Antimony	12	U	N	P
7440-38-2	Arsenic	6.7		NS	F
7440-39-3	Barium	28.9	B	N	P
7440-41-7	Beryllium	0.1	B		P
7440-43-9	Cadmium	1	U		P
7440-70-2	Calcium	985	B		P
7440-47-3	Chromium	10.2		N	P
7440-48-4	Cobalt	2.7	B		P
7440-50-8	Copper	6.4			P
7439-89-6	Iron	10200			P
7439-92-1	Lead	22.1			F
7439-95-4	Magnesium	825	B		P
7439-96-5	Manganese	113		N*	P
7439-97-6	Mercury	0.04	B		AV
7440-02-0	Nickel	4.9	B		P
7440-09-7	Potassium	465	B		A
7782-49-2	Selenium	1	U		F
7440-22-4	Silver	2	U	N	P
7440-23-5	Sodium	69.2	B		P
7440-28-0	Thallium	1.2	B		F
7440-62-2	Vanadium	23.1			P
7440-66-6	Zinc	31.6		E	P
	Cyanide	2	U		C

Color Before: BROWN Clarity Before: Texture: CLAY

Color After: BROWN Clarity After: Artifacts:

Comments:

FORM I - IN

CLIENT SAMPLE NO.

041327

INORGANIC ANALYSIS DATA SHEET

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix (soil/water) : WATER Lab Sample ID: 34301

Level (low/med) : LOW Date Received: 12/07/91

% Solids:

Concentration Units (ug/L or mg/kg dry weight): UG/L

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum	76.6	B		P
7440-36-0	Antimony	60	U		P
7440-38-2	Arsenic	10	U		F
7440-39-3	Barium	200	U		P
7440-41-7	Beryllium	5	U		P
7440-43-9	Cadmium	5	U		P
7440-70-2	Calcium	5000	U		P
7440-47-3	Chromium	10	U		P
7440-48-4	Cobalt	50	U		P
7440-50-8	Copper	25	U		P
7439-89-6	Iron	89.7	B		P
7439-92-1	Lead	3	U		F
7439-95-4	Magnesium	5000	U		P
7439-96-5	Manganese	15	U		P
7439-97-6	Mercury	0.2	U		AV
7440-02-0	Nickel	40	U		P
7440-09-7	Potassium	5000	U		A
7782-49-2	Selenium	5	U		F
7440-22-4	Silver	10	U		P
7440-23-5	Sodium	5000	U		P
7440-28-0	Thallium	10	U		F
7440-62-2	Vanadium	50	U		P
7440-66-6	Zinc	20	U		P
	Cyanide	10	U		C

Color Before: BROWN Clarity Before: CLEAR Texture:

Color After: BROWN Clarity After: CLEAR Artifacts:

Comments:

FORM I - IN

CLIENT SAMPLE NO.

041328

INORGANIC ANALYSIS DATA SHEET

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix (soil/water) : SOIL Lab Sample ID: 34302

Level (low/med) : LOW Date Received: 12/07/91

% Solids: 83.0

Concentration Units (ug/L or mg/kg dry weight): MG/KG

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum	9300			P
7440-36-0	Antimony	8.3	B	N	P
7440-38-2	Arsenic	16.0		NS	F
7440-39-3	Barium	58.2		N	P
7440-41-7	Beryllium	0.3	B		P
7440-43-9	Cadmium	0.9	B		P
7440-70-2	Calcium	722	B		P
7440-47-3	Chromium	18.9		N	P
7440-48-4	Cobalt	3.3	B		P
7440-50-8	Copper	37.4			P
7439-89-6	Iron	13300			P
7439-92-1	Lead	50			F
7439-95-4	Magnesium	982	B		P
7439-96-5	Manganese	117		N*	P
7439-97-6	Mercury	0.5			AV
7440-02-0	Nickel	6.7	B		P
7440-09-7	Potassium	501	B		A
7782-49-2	Selenium	0.6	B		F
7440-22-4	Silver	2	U	N	P
7440-23-5	Sodium	52.4	B		P
7440-28-0	Thallium	2	U		F
7440-62-2	Vanadium	28.6			P
7440-66-6	Zinc	67.2		E	P
	Cyanide	2	U		C

Color Before: BROWN Clarity Before: Texture: CLAY

Color After: BROWN Clarity After: Artifacts:

Comments:

FORM I - IN

VOLATILE METHOD,
TRAVEL AND EQUIPMENT BLANKS

1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

VBLKW01

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) WATER Lab Sample ID: VBLKW01

Sample wt/vol.: 5 (g/mL) ML Lab File ID: >C347F

Level: (low/med) LOW Date Received: _____

% Moisture: not dec. _____ Date Analyzed: 12/13/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
74-87-3	Chloromethane	10	U
74-83-9	Bromomethane	10	U
75-01-4	Vinyl Chloride	10	U
75-00-3	Chloroethane	10	U
75-09-2	Methylene Chloride	10	U
67-64-1	Acetone	10	U
75-15-0	Carbon Disulfide	10	U
75-35-4	1,1-Dichloroethene	10	U
75-34-3	1,1-Dichloroethane	10	U
540-59-0	1,2 Dichloroethene (total)	10	U
67-66-3	Chloroform	10	U
107-06-2	1,2-Dichloroethane	10	U
78-93-3	2-Butanone	10	U
71-55-6	1,1,1-Trichloroethane	10	U
56-23-5	Carbon Tetrachloride	10	U
75-27-4	Bromodichloromethane	10	U
78-87-5	1,2-Dichloropropane	10	U
10061-01-5	cis-1,3-Dichloropropene	10	U
79-01-6	Trichloroethene	10	U
124-48-1	Dibromochloromethane	10	U
79-00-5	1,1,2-Trichloroethane	10	U
71-43-2	Benzene	10	U
10061-02-6	trans-1,3-Dichloropropene	10	U
75-25-2	Bromoform	10	U
108-10-1	4-Methyl-2-Pentanone	10	U
591-78-6	2-Hexanone	10	U
127-18-4	Tetrachloroethene	10	U
79-34-5	1,1,2,2-Tetrachloroethane	10	U
108-88-3	Toluene	10	U
108-90-7	Chlorobenzene	10	U
100-41-4	Ethylbenzene	10	U
100-42-5	Styrene	10	U
1330-20-7	Xylene(total)	10	U

1E

CLIENT SAMPLE NO.

VBLKW1

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract:_____

Lab Code: GSAI Case No.: 5859 SAS No.:_____ SDG No.:_____

Matrix: (soil/water) WATER Lab Sample ID: VBLKW1

Sample wt/vol.: 5 (g/mL) ML Lab File ID: >C347F

Level: (low/med) LOW Date Received:_____

% Moisture: not dec._____ Date Analyzed: 12/13/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume:_____(uL) Soil Aliquot Volume:_____(uL)

Number TICs found: 0

CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.					
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3.					
4.					
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1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

VBLKS01

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: VBLKS01

Sample wt/vol.: 5 (g/mL) ML Lab File ID: >C346H

Level: (low/med) LOW Date Received:

% Moisture: not dec. Date Analyzed: 12/12/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: (uL) Soil Aliquot Volume: (uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
74-87-3	Chloromethane	10	U
74-83-9	Bromomethane	10	U
75-01-4	Vinyl Chloride	10	U
75-00-3	Chloroethane	10	U
75-09-2	Methylene Chloride	10	U
67-64-1	Acetone	10	U
75-15-0	Carbon Disulfide	10	U
75-35-4	1,1-Dichloroethene	10	U
75-34-3	1,1-Dichloroethane	10	U
540-59-0	1,2 Dichloroethene (total)	10	U
67-66-3	Chloroform	10	U
107-06-2	1,2-Dichloroethane	10	U
78-93-3	2-Butanone	10	U
71-55-6	1,1,1-Trichloroethane	10	U
56-23-5	Carbon Tetrachloride	10	U
75-27-4	Bromodichloromethane	10	U
78-87-5	1,2-Dichloropropane	10	U
10061-01-5	cis-1,3-Dichloropropene	10	U
79-01-6	Trichloroethene	10	U
124-48-1	Dibromochloromethane	10	U
79-00-5	1,1,2-Trichloroethane	10	U
71-43-2	Benzene	10	U
10061-02-6	trans-1,3-Dichloropropene	10	U
75-25-2	Bromoform	10	U
108-10-1	4-Methyl-2-Pentanone	10	U
591-78-6	2-Hexanone	10	U
127-18-4	Tetrachloroethene	10	U
79-34-5	1,1,2,2-Tetrachloroethane	10	U
108-88-3	Toluene	10	U
108-90-7	Chlorobenzene	10	U
100-41-4	Ethylbenzene	10	U
100-42-5	Styrene	10	U
1330-20-7	Xylene(total)	10	U

1E

CLIENT SAMPLE NO.

VBLKS01

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract:_____

Lab Code: GSAI Case No.: 5859 SAS No.:_____ SDG No.:_____

Matrix: (soil/water) SOIL Lab Sample ID: VBLKS01

Sample wt/vol.: 5 (g/mL) ML Lab File ID: >C346H

Level: (low/med) LOW Date Received:_____

% Moisture: not dec._____ Date Analyzed: 12/12/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume:_____(uL) Soil Aliquot Volume:_____(uL)

Number TICs found: 0 CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
2.				
3.				
4.				
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30.				

1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

VBLKS02

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: VBLKS02

Sample wt/vol.: 5 (g/mL) G Lab File ID: >C347E

Level: (low/med) LOW Date Received:

% Moisture: not dec. Date Analyzed: 12/13/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: (uL) Soil Aliquot Volume: (uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
74-87-3	Chloromethane	10	U
74-83-9	Bromomethane	10	U
75-01-4	Vinyl Chloride	10	U
75-00-3	Chloroethane	10	U
75-09-2	Methylene Chloride	2	J
67-64-1	Acetone	10	U
75-15-0	Carbon Disulfide	10	U
75-35-4	1,1-Dichloroethene	10	U
75-34-3	1,1-Dichloroethane	10	U
540-59-0	1,2 Dichloroethene (total)	10	U
67-66-3	Chloroform	10	U
107-06-2	1,2-Dichloroethane	10	U
78-93-3	2-Butanone	10	U
71-55-6	1,1,1-Trichloroethane	10	U
56-23-5	Carbon Tetrachloride	10	U
75-27-4	Bromodichloromethane	10	U
78-87-5	1,2-Dichloropropane	10	U
10061-01-5	cis-1,3-Dichloropropene	10	U
79-01-6	Trichloroethene	10	U
124-48-1	Dibromochloromethane	10	U
79-00-5	1,1,2-Trichloroethane	10	U
71-43-2	Benzene	10	U
10061-02-6	trans-1,3-Dichloropropene	10	U
75-25-2	Bromoform	10	U
108-10-1	4-Methyl-2-Pentanone	10	U
591-78-6	2-Hexanone	10	U
127-18-4	Tetrachloroethene	10	U
79-34-5	1,1,2,2-Tetrachloroethane	10	U
108-88-3	Toluene	10	U
108-90-7	Chlorobenzene	10	U
100-41-4	Ethylbenzene	10	U
100-42-5	Styrene	10	U
1330-20-7	Xylene(total)	10	U

1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

VBLKS03

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: VBLKS03

Sample wt/vol.: 5 (g/mL) G Lab File ID: >C350D

Level: (low/med) LOW Date Received: _____

% Moisture: not dec. _____ Date Analyzed: 12/16/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
74-87-3	Chloromethane	10	U
74-83-9	Bromomethane	10	U
75-01-4	Vinyl Chloride	10	U
75-00-3	Chloroethane	10	U
75-09-2	Methylene Chloride	10	U
67-64-1	Acetone	10	U
75-15-0	Carbon Disulfide	10	U
75-35-4	1,1-Dichloroethene	10	U
75-34-3	1,1-Dichloroethane	10	U
540-59-0	1,2 Dichloroethene (total)	10	U
67-66-3	Chloroform	10	U
107-06-2	1,2-Dichloroethane	10	U
78-93-3	2-Butanone	10	U
71-55-6	1,1,1-Trichloroethane	10	U
56-23-5	Carbon Tetrachloride	10	U
75-27-4	Bromodichloromethane	10	U
78-87-5	1,2-Dichloropropane	10	U
10061-01-5	cis-1,3-Dichloropropene	10	U
79-01-6	Trichloroethene	10	U
124-48-1	Dibromochloromethane	10	U
79-00-5	1,1,2-Trichloroethane	10	U
71-43-2	Benzene	10	U
10061-02-6	trans-1,3-Dichloropropene	10	U
75-25-2	Bromoform	10	U
108-10-1	4-Methyl-2-Pentanone	10	U
591-78-6	2-Hexanone	10	U
127-18-4	Tetrachloroethene	10	U
79-34-5	1,1,2,2-Tetrachloroethane	10	U
108-88-3	Toluene	10	U
108-90-7	Chlorobenzene	10	U
100-41-4	Ethylbenzene	10	U
100-42-5	Styrene	10	U
1330-20-7	Xylene(total)	10	U

1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

VBLKS04

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: VBLKS04

Sample wt/vol.: 5 (g/mL) G Lab File ID: >C352Z

Level: (low/med) LOW Date Received:

% Moisture: not dec. Date Analyzed: 12/18/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: (uL) Soil Aliquot Volume: (uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
74-87-3	Chloromethane	10	U
74-83-9	Bromomethane	10	U
75-01-4	Vinyl Chloride	10	U
75-00-3	Chloroethane	10	U
75-09-2	Methylene Chloride	10	U
67-64-1	Acetone	10	U
75-15-0	Carbon Disulfide	10	U
75-35-4	1,1-Dichloroethene	10	U
75-34-3	1,1-Dichloroethane	10	U
540-59-0	1,2 Dichloroethene (total)	10	U
67-66-3	Chloroform	10	U
107-06-2	1,2-Dichloroethane	10	U
78-93-3	2-Butanone	10	U
71-55-6	1,1,1-Trichloroethane	10	U
56-23-5	Carbon Tetrachloride	10	U
75-27-4	Bromodichloromethane	10	U
78-87-5	1,2-Dichloropropane	10	U
10061-01-5	cis-1,3-Dichloropropene	10	U
79-01-6	Trichloroethene	10	U
124-48-1	Dibromochloromethane	10	U
79-00-5	1,1,2-Trichloroethane	10	U
71-43-2	Benzene	10	U
10061-02-6	trans-1,3-Dichloropropene	10	U
75-25-2	Bromoform	10	U
108-10-1	4-Methyl-2-Pentanone	10	U
591-78-6	2-Hexanone	10	U
127-18-4	Tetrachloroethene	10	U
79-34-5	1,1,2,2-Tetrachloroethane	10	U
108-88-3	Toluene	10	U
108-90-7	Chlorobenzene	10	U
100-41-4	Ethylbenzene	10	U
100-42-5	Styrene	10	U
1330-20-7	Xylene(total)	10	U

1A

CLIENT SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET

041329 TRIP BLANK

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) WATER Lab Sample ID: 34303

Sample wt/vol.: 5 (g/mL) ML Lab File ID: >C347I

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. Date Analyzed: 12/13/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: (uL) Soil Aliquot Volume: (uL)

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
74-87-3	Chloromethane	10	U
74-83-9	Bromomethane	10	U
75-01-4	Vinyl Chloride	10	U
75-00-3	Chloroethane	10	U
75-09-2	Methylene Chloride	10	U
67-64-1	Acetone	10	U
75-15-0	Carbon Disulfide	10	U
75-35-4	1,1-Dichloroethene	10	U
75-34-3	1,1-Dichloroethane	10	U
540-59-0	1,2 Dichloroethene (total)	10	U
67-66-3	Chloroform	10	U
107-06-2	1,2-Dichloroethane	10	U
78-93-3	2-Butanone	10	U
71-55-6	1,1,1-Trichloroethane	10	U
56-23-5	Carbon Tetrachloride	10	U
75-27-4	Bromodichloromethane	10	U
78-87-5	1,2-Dichloropropane	10	U
10061-01-5	cis-1,3-Dichloropropene	10	U
79-01-6	Trichloroethene	10	U
124-48-1	Dibromochloromethane	10	U
79-00-5	1,1,2-Trichloroethane	10	U
71-43-2	Benzene	10	U
10061-02-6	trans-1,3-Dichloropropene	10	U
75-25-2	Bromoform	10	U
108-10-1	4-Methyl-2-Pentanone	10	U
591-78-6	2-Hexanone	10	U
127-18-4	Tetrachloroethene	10	U
79-34-5	1,1,2,2-Tetrachloroethane	10	U
108-88-3	Toluene	10	U
108-90-7	Chlorobenzene	10	U
100-41-4	Ethylbenzene	10	U
100-42-5	Styrene	10	U
1330-20-7	Xylene(total)	10	U

CLIENT SAMPLE NO.

041329
TRIP BLANK

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) WATER Lab Sample ID: 34303

Sample wt/vol.: 5 (g/mL) ML Lab File ID: >C347I

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec. _____ Date Analyzed: 12/13/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume: _____(uL) Soil Aliquot Volume: _____(uL)

Number TICs found: 0

CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.					
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3.					
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1E

CLIENT SAMPLE NO.

041327 EB1

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract:_____

Lab Code: GSAI Case No.: 5859 SAS No.:_____ SDG No.:_____

Matrix: (soil/water) WATER Lab Sample ID: 34301

Sample wt/vol.: 5 (g/mL) ML Lab File ID: >C347H

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: not dec._____ Date Analyzed: 12/13/91

GC Column: CAP ID: 0.52 (mm) Dilution Factor: 1.0

Soil Extract Volume:_____(uL) Soil Aliquot Volume:_____(uL)

Number TICs found: 0

CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
2.				
3.				
4.				
5.				
6.				
7.				
8.				
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CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

SBLKW1

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) WATER Lab Sample ID: 34691

Sample wt/vol.: 1000 (g/ml) ML Lab File ID: >E361G

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: _____ decanted: (Y/N) N Date Extracted: 12/12/91

Concentration Extract Volume: 1000 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: _____

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/L	Q
108-95-2	Phenol	10	U
111-44-4	bis(2-Chloroethyl)ether	10	U
95-57-8	2-Chlorophenol	10	U
541-73-1	1,3-Dichlorobenzene	10	U
106-46-7	1,4-Dichlorobenzene	10	U
95-50-1	1,2-Dichlorobenzene	10	U
95-48-7	2-Methylphenol	10	U
108-60-1	2,2'-oxybis(1-Chloropropane)	10	U
106-44-5	4-Methylphenol	10	U
621-64-7	N-Nitroso-di-n-propylamine	10	U
67-72-1	Hexachloroethane	10	U
98-95-3	Nitrobenzene	10	U
78-59-1	Isophorone	10	U
88-75-5	2-Nitrophenol	10	U
105-67-9	2,4-Dimethylphenol	10	U
111-91-1	bis(2-Chloroethoxy)methane	10	U
120-83-2	2,4-Dichlorophenol	10	U
120-82-1	1,2,4-Trichlorobenzene	10	U
91-20-3	Naphthalene	10	U
106-47-8	4-Chloroaniline	10	U
87-68-3	Hexachlorobutadiene	10	U
59-50-7	4-Chloro-3-methylphenol	10	U
91-57-6	2-Methylnaphthalene	10	U
77-47-4	Hexachlorocyclopentadiene	10	U
88-06-2	2,4,6-Trichlorophenol	10	U
95-95-4	2,4,5-Trichlorophenol	25	U
91-58-7	2-Chloronaphthalene	10	U
88-74-4	2-Nitroaniline	25	U
131-11-3	Dimethylphthalate	10	U
208-96-8	Acenaphthylene	10	U
606-20-2	2,6-Dinitrotoluene	10	U
99-09-2	3-Nitroaniline	25	U
83-32-9	Acenaphthene	10	U

1C CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET | SBLKW1 |

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) WATER Lab Sample ID: 34691

Sample wt/vol.: 1000 (g/ml) ML Lab File ID: >E361G

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: _____ decanted: (Y/N) N Date Extracted: 12/12/91

Concentration Extract Volume: 1000 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
51-28-5	2,4-Dinitrophenol	25	U
100-02-7	4-Nitrophenol	25	U
132-64-9	Dibenzofuran	10	U
121-14-2	2,4-Dinitrotoluene	10	U
84-66-2	Diethylphthalate	10	U
7005-72-3	4-Chlorophenyl-phenylether	10	U
86-73-7	Fluorene	10	U
100-01-6	4-Nitroaniline	25	U
534-52-1	4,6-Dinitro-2-methylphenol	25	U
86-30-6	N-Nitrosodiphenylamine (1)	10	U
101-55-3	4-Bromophenyl-phenylether	10	U
118-74-1	Hexachlorobenzene	10	U
87-86-5	Pentachlorophenol	25	U
85-01-8	Phenanthrene	10	U
120-12-7	Anthracene	10	U
86-74-8	Carbazole	10	U
84-74-2	Di-n-butylphthalate	10	U
206-44-0	Fluoranthene	10	U
129-00-0	Pyrene	10	U
85-68-7	Butylbenzylphthalate	10	U
91-94-1	3,3'-Dichlorobenzidine	10	U
56-55-3	Benzo(a)anthracene	10	U
218-01-9	Chrysene	10	U
117-81-7	Bis(2-Ethylhexyl)phthalate	2	J
117-84-0	Di-n-octylphthalate	10	U
205-99-2	Benzo(b)fluoranthene	10	U
207-08-9	Benzo(k)fluoranthene	10	U
50-32-8	Benzo(a)pyrene	10	U
193-39-5	Indeno(1,2,3-cd)pyrene	10	U
53-70-3	Dibenz(a,h)anthracene	10	U
191-24-2	Benzo(g,h,i)perylene	10	U

(1) - Cannot be separated from Diphenylamine

1F

CLIENT SAMPLE NO.

SBLKW1

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) WATER Lab Sample ID: 34691

Sample wt/vol.: 1000 (g/mL) ML Lab File ID: >E361G

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: _____ decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 1000 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: _____

Number TICs found: 10

CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		Unknown	7.29	19	J
2.		Unknown	11.46	14	J
3.		Unknown	13.78	110	J
4.		Unknown	13.90	23	J
5.		Unknown	14.59	27	J
6.	112345	Ethanol, 2-(2-butoxyethoxy)-	18.13	38	J
7.	5466773	2-Propenoic acid, 3-(4-met	35.60	9	J
8.	123795	Hexanedioic acid, dioctyl es	36.19	19	J
9.		Unknown	37.43	8	J
10.		Unknown aliphatic hydrocarbo	39.46	21	J
11.					
12.					
13.					
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1B

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

SBLKS1

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 34791

Sample wt/vol.: 30 (g/ml) G Lab File ID: >D361G

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH:

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/KG	Q
108-95-2	Phenol	330	U
111-44-4	bis(2-Chloroethyl)ether	330	U
95-57-8	2-Chlorophenol	330	U
541-73-1	1,3-Dichlorobenzene	330	U
106-46-7	1,4-Dichlorobenzene	330	U
95-50-1	1,2-Dichlorobenzene	330	U
95-48-7	2-Methylphenol	330	U
108-60-1	2,2'-oxybis(1-Chloropropane)	330	U
106-44-5	4-Methylphenol	330	U
621-64-7	N-Nitroso-di-n-propylamine	330	U
67-72-1	Hexachloroethane	330	U
98-95-3	Nitrobenzene	330	U
78-59-1	Isophorone	330	U
88-75-5	2-Nitrophenol	330	U
105-67-9	2,4-Dimethylphenol	330	U
111-91-1	bis(2-Chloroethoxy)methane	330	U
120-83-2	2,4-Dichlorophenol	330	U
120-82-1	1,2,4-Trichlorobenzene	330	U
91-20-3	Naphthalene	330	U
106-47-8	4-Chloroaniline	330	U
87-68-3	Hexachlorobutadiene	330	U
59-50-7	4-Chloro-3-methylphenol	330	U
91-57-6	2-Methylnaphthalene	330	U
77-47-4	Hexachlorocyclopentadiene	330	U
88-06-2	2,4,6-Trichlorophenol	330	U
95-95-4	2,4,5-Trichlorophenol	800	U
91-58-7	2-Chloronaphthalene	330	U
88-74-4	2-Nitroaniline	800	U
131-11-3	Dimethylphthalate	41	J
208-96-8	Acenaphthylene	330	U
606-20-2	2,6-Dinitrotoluene	330	U
99-09-2	3-Nitroaniline	800	U
83-32-9	Acenaphthene	330	U

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

SBLKS1

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 34791

Sample wt/vol.: 30 (g/ml) G Lab File ID: >D361G

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH:

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
51-28-5	2,4-Dinitrophenol	800	U
100-02-7	4-Nitrophenol	800	U
132-64-9	Dibenzofuran	330	U
121-14-2	2,4-Dinitrotoluene	330	U
84-66-2	Diethylphthalate	110	J
7005-72-3	4-Chlorophenyl-phenylether	330	U
86-73-7	Fluorene	330	U
100-01-6	4-Nitroaniline	800	U
534-52-1	4,6-Dinitro-2-methylphenol	800	U
86-30-6	N-Nitrosodiphenylamine (1)	330	U
101-55-3	4-Bromophenyl-phenylether	330	U
118-74-1	Hexachlorobenzene	330	U
87-86-5	Pentachlorophenol	800	U
85-01-8	Phenanthrene	38	J
120-12-7	Anthracene	330	U
86-74-8	Carbazole	330	U
84-74-2	Di-n-butylphthalate	330	U
206-44-0	Fluoranthene	330	U
129-00-0	Pyrene	330	U
85-68-7	Butylbenzylphthalate	330	U
91-94-1	3,3'-Dichlorobenzidine	330	U
56-55-3	Benzo(a)anthracene	330	U
218-01-9	Chrysene	330	U
117-81-7	Bis(2-Ethylhexyl)phthalate	330	U
117-84-0	Di-n-octylphthalate	330	U
205-99-2	Benzo(b)fluoranthene	330	U
207-08-9	Benzo(k)fluoranthene	330	U
50-32-8	Benzo(a)pyrene	330	U
193-39-5	Indeno(1,2,3-cd)pyrene	330	U
53-70-3	Dibenz(a,h)anthracene	330	U
191-24-2	Benzo(g,h,i)perylene	330	U

(1) - Cannot be separated from Diphenylamine

1F

CLIENT SAMPLE NO.

SBLKS1

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34791

Sample wt/vol.: 30 (g/mL) G Lab File ID: >D361G

Level: (low/med) LOW Date Received: / /

% Moisture: _____ decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

Number TICs found: 22 CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		Unknown	5.20	460	J
2.		Unknown	7.06	690	J
3.		Aldol condensate	7.16	450	JA
4.		Aldol condensate	8.36	220	JA
5.		Aldol condensate	8.46	750	JA
6.		Unknown olefin	8.58	140	J
7.		Unknown	8.87	560	J
8.		Unknown	8.99	170	J
9.		Unknown	9.23	140	J
10.		Aldol condensate	9.78	8600	JA
11.		Unknown aliphatic hydrocarbo	10.17	450	J
12.		Unknown aliphatic hydrocarbo	10.25	330	J
13.		Unknown aliphatic hydrocarbo	10.37	430	J
14.		Unknown aliphatic hydrocarbo	10.41	290	J
15.	198	Ethane, 1,1,2,2-tetrachloro-	11.98	140	J
16.	4436753	3-Hexene-2,5-dione	12.51	1500	J
17.		Unknown	12.73	650	J
18.	3240093	5-Hexen-2-one, 5-methyl	12.81	590	J
19.		Unknown	13.59	220	J
20.		Unknown	13.77	2100	J
21.	98862	Ethanone, 1-phenyl-	15.68	230	J
22.	120041	Dodecanamide, N,N-bis(2-hydr	24.98	2200	J
23.					
24.					
25.					
26.					
27.					
28.					
29.					
30.					

1B

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

SBLKS1RE

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 34791RE

Sample wt/vol.: 30 (g/ml) G Lab File ID: >E362G

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH:

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/KG	Q
108-95-2	Phenol	330	U
111-44-4	bis(2-Chloroethyl)ether	330	U
95-57-8	2-Chlorophenol	330	U
541-73-1	1,3-Dichlorobenzene	330	U
106-46-7	1,4-Dichlorobenzene	330	U
95-50-1	1,2-Dichlorobenzene	330	U
95-48-7	2-Methylphenol	330	U
108-60-1	2,2'-oxybis(1-Chloropropane)	330	U
106-44-5	4-Methylphenol	330	U
621-64-7	N-Nitroso-di-n-propylamine	330	U
67-72-1	Hexachloroethane	330	U
98-95-3	Nitrobenzene	330	U
78-59-1	Isophorone	330	U
88-75-5	2-Nitrophenol	330	U
105-67-9	2,4-Dimethylphenol	330	U
111-91-1	bis(2-Chloroethoxy)methane	330	U
120-83-2	2,4-Dichlorophenol	330	U
120-82-1	1,2,4-Trichlorobenzene	330	U
91-20-3	Naphthalene	330	U
106-47-8	4-Chloroaniline	330	U
87-68-3	Hexachlorobutadiene	330	U
59-50-7	4-Chloro-3-methylphenol	330	U
91-57-6	2-Methylnaphthalene	330	U
77-47-4	Hexachlorocyclopentadiene	330	U
88-06-2	2,4,6-Trichlorophenol	330	U
95-95-4	2,4,5-Trichlorophenol	800	U
91-58-7	2-Chloronaphthalene	330	U
88-74-4	2-Nitroaniline	800	U
131-11-3	Dimethylphthalate	41	J
208-96-8	Acenaphthylene	330	U
606-20-2	2,6-Dinitrotoluene	330	U
99-09-2	3-Nitroaniline	800	U
83-32-9	Acenaphthene	330	U

1C

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

SBLKS1RE

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) SOIL Lab Sample ID: 34791RE

Sample wt/vol.: 30 (g/ml) G Lab File ID: >E362G

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: _____ decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 500 (uL) Date Analyzed: 12/28/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) Y pH: ____

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
51-28-5	2,4-Dinitrophenol	800	U
100-02-7	4-Nitrophenol	800	U
132-64-9	Dibenzofuran	330	U
121-14-2	2,4-Dinitrotoluene	330	U
84-66-2	Diethylphthalate	96	J
7005-72-3	4-Chlorophenyl-phenylether	330	U
86-73-7	Fluorene	330	U
100-01-6	4-Nitroaniline	800	U
534-52-1	4,6-Dinitro-2-methylphenol	800	U
86-30-6	N-Nitrosodiphenylamine (1)	330	U
101-55-3	4-Bromophenyl-phenylether	330	U
118-74-1	Hexachlorobenzene	330	U
87-86-5	Pentachlorophenol	800	U
85-01-8	Phenanthrene	40	J
120-12-7	Anthracene	330	U
86-74-8	Carbazole	330	U
84-74-2	Di-n-butylphthalate	330	U
206-44-0	Fluoranthene	330	U
129-00-0	Pyrene	330	U
85-68-7	Butylbenzylphthalate	330	U
91-94-1	3,3'-Dichlorobenzidine	330	U
56-55-3	Benzo(a)anthracene	330	U
218-01-9	Chrysene	330	U
117-81-7	Bis(2-Ethylhexyl)phthalate	330	U
117-84-0	Di-n-octylphthalate	330	U
205-99-2	Benzo(b)fluoranthene	330	U
207-08-9	Benzo(k)fluoranthene	330	U
50-32-8	Benzo(a)pyrene	330	U
193-39-5	Indeno(1,2,3-cd)pyrene	330	U
53-70-3	Dibenz(a,h)anthracene	330	U
191-24-2	Benzo(g,h,i)perylene	330	U

(1) - Cannot be separated from Diphenylamine

1B

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

SBLKS2

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 36491

Sample wt/vol.: 30 (g/ml) G Lab File ID: >D002G

Level: (low/med) LOW Date Received:

% Moisture: not dec. dec. Date Extracted: 12/30/91

Extraction (Sepf, Cont, Sonc) SONC Date Analyzed: 01/03/92

GPC Cleanup: (Y/N) N pH: Dilution Factor: 1.0

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/kg) UG/KG	Q
108-95-2	Phenol	330	U
111-44-4	bis(2-Chloroethyl)ether	330	U
95-57-8	2-Chlorophenol	330	U
541-73-1	1,3-Dichlorobenzene	330	U
106-46-7	1,4-Dichlorobenzene	330	U
100-51-6	Benzyl alcohol	330	U
95-50-1	1,2-Dichlorobenzene	330	U
95-48-7	2-Methylphenol	330	U
108-60-1	bis(2-Chloroisopropyl)ether	330	U
106-44-5	4-Methylphenol	330	U
621-64-7	N-Nitroso-di-n-propylamine	330	U
67-72-1	Hexachloroethane	330	U
98-95-3	Nitrobenzene	330	U
78-59-1	Isophorone	330	U
88-75-5	2-Nitrophenol	330	U
105-67-9	2,4-Dimethylphenol	330	U
65-85-0	Benzoic acid	1600	U
111-91-1	bis(2-Chloroethoxy)methane	330	U
120-83-2	2,4-Dichlorophenol	330	U
120-82-1	1,2,4-Trichlorobenzene	330	U
91-20-3	Naphthalene	330	U
106-47-8	4-Chloroaniline	330	U
87-68-3	Hexachlorobutadiene	330	U
59-50-7	4-Chloro-3-methylphenol	330	U
91-57-6	2-Methylnaphthalene	330	U
77-47-4	Hexachlorocyclopentadiene	330	U
88-06-2	2,4,6-Trichlorophenol	330	U
95-95-4	2,4,5-Trichlorophenol	330	U
91-58-7	2-chloronaphthalene	330	U
88-74-4	2-Nitroaniline	330	U
131-11-3	Dimethylphthalate	330	U
208-96-8	Acenaphthylene	330	U
606-20-2	2,6-Dinitrotoluene	330	U

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET | SBLKS2

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: 36491

Sample wt/vol.: 30 (g/ml) G Lab File ID: >D002G

Level: (low/med) LOW Date Received:

% Moisture:not dec. dec. Date Extracted: 12/30/91

Extraction (Sepf, Cont, Sonc) SONC Date Analyzed: 01/03/92

GPC Cleanup: (Y/N) N pH: Dilution Factor: 1.0

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
99-09-2	3-Nitroaniline	1600	U
83-32-9	Acenaphthene	330	U
51-28-5	2,4-Dinitrophenol	1600	U
100-02-7	4-Nitrophenol	1600	U
132-64-9	Dibenzofuran	330	U
121-14-2	2,4-Dinitrotoluene	330	U
84-66-2	Diethylphthalate	330	U
7005-72-3	4-Chlorophenyl-phenylether	330	U
86-73-7	Fluorene	330	U
100-01-6	4-Nitroaniline	1600	U
534-52-1	4,6-Dinitro-2-methylphenol	1600	U
86-30-6	N-Nitrosodiphenylamine (1)	330	U
101-55-3	4-Bromophenyl-phenylether	330	U
118-74-1	Hexachlorobenzene	330	U
87-86-5	Pentachlorophenol	1600	U
85-01-8	Phenanthrene	330	U
120-12-7	Anthracene	330	U
84-74-2	Di-n-butylphthalate	330	U
206-44-0	Fluoranthene	330	U
129-00-0	Pyrene	330	U
85-68-7	Butylbenzylphthalate	330	U
91-94-1	3,3'-Dichlorobenzidine	660	U
56-55-3	Benzo(a)anthracene	330	U
218-01-9	Chrysene	330	U
117-81-7	Bis(2-Ethylhexyl)phthalate	330	U
117-84-0	Di-n-octylphthalate	330	U
205-99-2	Benzo(b)fluoranthene	330	U
207-08-9	Benzo(k)fluoranthene	330	U
50-32-8	Benzo(a)pyrene	330	U
193-39-5	Indeno(1,2,3-cd)pyrene	330	U
53-70-3	Dibenz(a,h)anthracene	330	U
191-24-2	Benzo(g,h,i)perylene	330	U

(1) - Cannot be separated from Diphenylamine

1B

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

041327 EB1

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) WATER Lab Sample ID: 34301

Sample wt/vol.: 500 (g/ml) ML Lab File ID: >E361J

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: decanted: (Y/N) N Date Extracted: 12/12/91

Concentration Extract Volume: 1000 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH:

CAS NO.	COMPOUND	CONCENTRATION UNITS: ug/L or ug/kg) UG/L	Q
108-95-2	Phenol	10	U
111-44-4	bis(2-Chloroethyl)ether	10	U
95-57-8	2-Chlorophenol	10	U
541-73-1	1,3-Dichlorobenzene	10	U
106-46-7	1,4-Dichlorobenzene	10	U
95-50-1	1,2-Dichlorobenzene	10	U
95-48-7	2-Methylphenol	10	U
108-60-1	2,2'-oxybis(1-Chloropropane)	10	U
106-44-5	4-Methylphenol	10	U
621-64-7	N-Nitroso-di-n-propylamine	10	U
67-72-1	Hexachloroethane	10	U
98-95-3	Nitrobenzene	10	U
78-59-1	Isophorone	10	U
88-75-5	2-Nitrophenol	10	U
105-67-9	2,4-Dimethylphenol	10	U
111-91-1	bis(2-Chloroethoxy)methane	10	U
120-83-2	2,4-Dichlorophenol	10	U
120-82-1	1,2,4-Trichlorobenzene	10	U
91-20-3	Naphthalene	10	U
106-47-8	4-Chloroaniline	10	U
87-68-3	Hexachlorobutadiene	10	U
59-50-7	4-Chloro-3-methylphenol	10	U
91-57-6	2-Methylnaphthalene	10	U
77-47-4	Hexachlorocyclopentadiene	10	U
88-06-2	2,4,6-Trichlorophenol	10	U
95-95-4	2,4,5-Trichlorophenol	25	U
91-58-7	2-Chloronaphthalene	10	U
88-74-4	2-Nitroaniline	25	U
131-11-3	Dimethylphthalate	10	U
208-96-8	Acenaphthylene	10	U
606-20-2	2,6-Dinitrotoluene	10	U
99-09-2	3-Nitroaniline	25	U
83-32-9	Acenaphthene	10	U

CLIENT SAMPLE NO.

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

041327 EB1

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) WATER Lab Sample ID: 34301

Sample wt/vol.: 500 (g/ml) ML Lab File ID: >E361J

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: decanted: (Y/N) N Date Extracted: 12/12/91

Concentration Extract Volume: 1000 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH:

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
51-28-5	2,4-Dinitrophenol	25	U
100-02-7	4-Nitrophenol	25	U
132-64-9	Dibenzofuran	10	U
121-14-2	2,4-Dinitrotoluene	10	U
84-66-2	Diethylphthalate	10	U
7005-72-3	4-Chlorophenyl-phenylether	10	U
86-73-7	Fluorene	10	U
100-01-6	4-Nitroaniline	25	U
534-52-1	4,6-Dinitro-2-methylphenol	25	U
86-30-6	N-Nitrosodiphenylamine (1)	10	U
101-55-3	4-Bromophenyl-phenylether	10	U
118-74-1	Hexachlorobenzene	10	U
87-86-5	Pentachlorophenol	25	U
85-01-8	Phenanthrene	10	U
120-12-7	Anthracene	10	U
86-74-8	Carbazole	10	U
84-74-2	Di-n-butylphthalate	10	U
206-44-0	Fluoranthene	10	U
129-00-0	Pyrene	10	U
85-68-7	Butylbenzylphthalate	10	U
91-94-1	3,3'-Dichlorobenzidine	10	U
56-55-3	Benzo(a)anthracene	10	U
218-01-9	Chrysene	10	U
117-81-7	Bis(2-Ethylhexyl)phthalate	4	J
117-84-0	Di-n-octylphthalate	10	U
205-99-2	Benzo(b)fluoranthene	10	U
207-08-9	Benzo(k)fluoranthene	10	U
50-32-8	Benzo(a)pyrene	10	U
193-39-5	Indeno(1,2,3-cd)pyrene	10	U
53-70-3	Dibenz(a,h)anthracene	10	U
191-24-2	Benzo(g,h,i)perylene	10	U

(1) - Cannot be separated from Diphenylamine

1F

CLIENT SAMPLE NO.

041327 EB1

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: GULF STATES ANALYTICAL Contract: _____

Lab Code: GSAI Case No.: 5859 SAS No.: _____ SDG No.: _____

Matrix: (soil/water) WATER Lab Sample ID: 34301

Sample wt/vol.: 500 (g/mL) ML Lab File ID: >E361J

Level: (low/med) LOW Date Received: 12/07/91

% Moisture: _____ decanted: (Y/N) N Date Extracted: 12/13/91

Concentration Extract Volume: 1000 (uL) Date Analyzed: 12/27/91

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: _____

Number TICs found: 10 CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		Unknown	7.26	14	JB
2.		Unknown	11.47	11	JB
3.		Unknown	13.77	88	JB
4.		Unknown	13.89	9	JB
5.		Unknown	14.61	12	JB
6.	289167	1,2,4-Trithiolane	16.70	16	J
7.	112345	Ethanol, 2-(2-butoxyehtoxy)-	18.15	14	JB
8.	17233715	Hexathiepane	28.85	23	J
9.		Unknown aliphatic hydrocarbo	37.43	8	JB
10.		Unknown aliphatic hydrocarbo	39.43	14	JB
11.					
12.					
13.					
14.					
15.					
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17.					
18.					
19.					
20.					
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30.					

1D

CLIENT SAMPLE NO.

PESTICIDE ORGANICS ANALYSIS DATA SHEET

PBLKS1

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) SOIL Lab Sample ID: PBLK02

Sample wt/vol.: 30 (g/mL) G Lab File ID: CLP1366.SEQ

% Moisture: decanted: (Y/N) N Date Received: 12/09/91

Extraction: (SepF/Cont/Sonc) SONC Date Extracted: 12/13/91

Concentrated Extract Volume: 10000 (uL) Date Analyzed: 12/30/91

Injection Volume: 1.0 (uL) Dilution Factor: 4.0

GPC Cleanup: (Y/N) Y pH: Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
319-84-6	alpha-BHC	1.7	U
319-85-7	beta-BHC	1.7	U
319-86-8	delta-BHC	1.7	U
58-89-9	gamma-BHC (Lindane)	1.7	U
76-44-8	Heptachlor	1.7	U
309-00-2	Aldrin	1.7	U
1024-57-3	Heptachlor epoxide	1.7	U
959-98-8	Endosulfan I	1.7	U
60-57-1	Dieldrin	3.3	U
72-55-9	4,4'-DDE	3.3	U
72-20-8	Endrin	3.3	U
33213-65-9	Endosulfan II	3.3	U
72-54-8	4,4'-DDD	3.3	U
1031-07-8	Endosulfan sulfate	3.3	U
50-29-3	4,4'-DDT	3.3	U
72-43-5	Methoxychlor	17.0	U
53494-70-5	Endrin ketone	3.3	U
7421-36-3	Endrin aldehyde	3.3	U
5103-71-9	alpha-Chlordane	1.7	U
5103-74-2	gamma-Chlordane	1.7	U
8001-35-2	Toxaphene	170.0	U
12674-11-2	Aroclor-1016	33.0	U
11104-28-2	Aroclor-1221	67.0	U
11141-16-5	Aroclor-1232	33.0	U
53469-21-9	Aroclor-1242	33.0	U
12672-29-6	Aroclor-1248	33.0	U
11097-69-1	Aroclor-1254	33.0	U
11096-82-5	Aroclor-1260	33.0	U

?

1D

CLIENT SAMPLE NO.

PESTICIDE ORGANICS ANALYSIS DATA SHEET

PBLKW1

Lab Name: GULF STATES ANALYTICAL Contract:

Lab Code: GSAI Case No.: 5859 SAS No.: SDG No.:

Matrix: (soil/water) WATER Lab Sample ID: PBLK01

Sample wt/vol.: 1000 (g/mL) ML Lab File ID: CLP1366.SEQ

% Moisture: decanted: (Y/N) N Date Received:

Extraction: (SepF/Cont/Sonc) CONT Date Extracted: 12/12/91

Concentrated Extract Volume: 10000 (uL) Date Analyzed: 12/30/91

Injection Volume: 1.0 (uL) Dilution Factor: 2.0

GPC Cleanup: (Y/N) Y pH: Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
319-84-6	alpha-BHC	0.05	U
319-85-7	beta-BHC	0.05	U
319-86-8	delta-BHC	0.05	U
58-89-9	gamma-BHC (Lindane)	0.05	U
76-44-8	Heptachlor	0.05	U
309-00-2	Aldrin	0.05	U
1024-57-3	Heptachlor epoxide	0.05	U
959-98-8	Endosulfan I	0.05	U
60-57-1	Dieldrin	0.10	U
72-55-9	4,4'-DDE	0.10	U
72-20-8	Endrin	0.10	U
33213-65-9	Endosulfan II	0.10	U
72-54-8	4,4'-DDD	0.10	U
1031-07-8	Endosulfan sulfate	0.10	U
50-29-3	4,4'-DDT	0.10	U
72-43-5	Methoxychlor	0.50	U
53494-70-5	Endrin ketone	0.10	U
7421-36-3	Endrin aldehyde	0.10	U
5103-71-9	alpha-Chlordane	0.05	U
5103-74-2	gamma-Chlordane	0.05	U
8001-35-2	Toxaphene	5.00	U
12674-11-2	Aroclor-1016	1.00	U
11104-28-2	Aroclor-1221	2.00	U
11141-16-5	Aroclor-1232	1.00	U
53469-21-9	Aroclor-1242	1.00	U
12672-29-6	Aroclor-1248	1.00	U
11097-69-1	Aroclor-1254	1.00	U
11096-82-5	Aroclor-1260	1.00	U