

Woodward-Clyde Consultants, Inc.



Engineering & sciences applied to the earth & its environment

November 17, 1994

4E02704-9

Mr. Michael Bellotti
Olin Chemicals
1186 Lower River Road
Charleston, Tennessee 37310

Re: Analytical Data Validation
October 1993, December 1993 and January 1994
Sampling Events

RECEIVED

DEC - 7 1994
WESTERN HW PROGRAMS
DIVISION OF HAZARDOUS
SUBSTANCES REGULATION

Dear Mr. Bellotti:

Woodward-Clyde Consultants (WCC) is pleased to submit the Analytical Data Validation Report for the above captioned sampling events at the Olin Buffalo Avenue Plant in Niagara Falls, New York. A data validation report for the groundwater sampling events conducted in May and July 1994 will be submitted under separate cover during the week of November 21, 1994.

If you have any questions or comments concerning this submittal, please contact the undersigned. We appreciate the opportunity to work with Olin on this project.

Sincerely,

Anthony J. Misercola
Assistant Project Scientist

James F. Roetzer, Ph.D.
Senior Associate

AJM/JFR/kjs

Olin\Jan94val.rep



**ANALYTICAL DATA VALIDATION
OCTOBER 1993, DECEMBER 1993
AND JANUARY 1994
SAMPLING EVENTS**

**OLIN CORPORATION FACILITY
NIAGARA FALLS, NEW YORK**

Prepared for:
Olin Corporation
1186 Lower River Road
P.O. Box 248
Charleston, Tennessee 37310
November 17, 1994

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1.0

INTRODUCTION

This report presents an analytical data validation of results from groundwater and soil samples collected in support of the Olin Niagara Plant RCRA Facility Investigation. Sampling was conducted by Woodward-Clyde Consultants (WCC) and analytical services were provided by Recra Environmental (Recra) of Amherst, New York. In October 1993, eleven wells installed by DuPont near the perimeter of the Olin Plant were sampled. Soil boring samples from both Olin's Plant 1 and Plant 2 were collected in December 1993. In January 1994, four wells, two located in the Olin Plant 1 area and two from the Plant 2 area were sampled. Samples were analyzed for the parameters listed below:

<u>Location</u>	<u>Parameters</u>	<u>Analytical Method</u>
DuPont Monitoring Wells	PAL ⁽¹⁾ BNAs TCL ⁽²⁾ - Pesticide/PCBs Mercury	USEPA CLP (OLM01.8) USEPA CLP (OLM01.8) USEPA CLP (ILM02.1)
Olin Plant 1 Soil Borings	Total Mercury TCLP Mercury	USEPA CLP (ILM02.1) SW-846 1311/USEPA-CLP (ILM02.1)
Olin Plant 2 Soil Borings	TCL ⁽²⁾ Pesticides/PCBs	USEPA CLP (OLM01.8)
Olin Plant 1/Plant 2 Monitoring Wells	TCL ⁽²⁾ - VOCs PAL ⁽¹⁾ BNAs TCL - Pesticides/PCBs Methanol Mercury	USEPA CLP (OLM01.8) USEPA CLP (OLM01.8) USEPA CLP (OLM01.8) SW-846 8015 USEPA CLP (ILM02.1)

VOCs Volatile organic compounds

BNAs Base/neutral and acid extractable compounds

(1) Project Analyte List

(2) Target Compound List

The following documents were used as guidance for the data validation:

1. Evaluation of Metals Data for the Contract Laboratory Program (CLP). S.O.P. No. HW-2. Revision XI. January 1992. Prepared by USEPA Region II.

2. CLP Organics Data Review and Preliminary Review. S.O.P. No. HW-6 No. 8, January 1992. Prepared by USEPA Region II.

The above "Guidelines" provided the criteria to review. The quantitative criteria used in the data validation are given in the analytical methods. The following criteria were evaluated as part of the data validation:

- Results reported from secondary dilutions
- Holding times
- Instrument performance and calibration
- Method blank, rinsate blank and trip blank results
- Surrogate spike recoveries
- Matrix spike/matrix spike duplicate (MS/MSD) analyses
- Internal standard areas and retention times
- Field duplicates
- Compound identification and quantitation
- Review of both column results (pesticides/PCBs)
- Overall assessment of data

Appendix A presents a summary of the compounds/analytes detected in the samples. These results have been qualified (where appropriate) based on the data validation performed. Appendix B presents the analytical data summary sheets (Form-1) as provided by Recra. QC summary forms provided by the laboratory were reviewed as part of the validation and are presented in Appendix C.

The following sections present the results of the analytical data validation.

ANALYTICAL DATA VALIDATION

2.1 RESULTS REPORTED FROM SECONDARY DILUTIONS

For samples that required dilution, part of the validation process is to evaluate which sets of results (initial or diluted) are considered to be more usable. For these data sets, two samples required dilution for VOCs and BNAs and seven samples required dilutions for pesticides:

VOCs

- The 1,2-dichloroethene (1,2-DCE) result for sample OBA-11B (Olin monitoring well) and the trichloroethene (TCE) result for OBA-11C (Olin monitoring well) exceeded the instrument's linear calibration range. Both samples were diluted and reanalyzed. For these samples, the diluted 1,2-DCE or TCE results were transcribed onto the data summary tables (Appendix A) with an "E" code (result reported from secondary dilution), replacing the initial results as those to be more representative of the samples concentrations.

BNAs

- The 1,2,4-trichlorobenzene result for sample MW-15CD (DuPont monitoring well) and the 1,2-dichlorobenzene result for OBA-11C (Olin monitoring well) exceeded the instrument's linear calibration range. Both samples were diluted and reanalyzed. For these samples, the diluted 1,2,4-trichlorobenzene and 1,2-dichlorobenzene results were transcribed onto the data summary tables (Appendix A) with an "E" code (result reported from secondary dilution), replacing the initial results as those to be more representative of the sample's concentration.

Pesticides

- Alpha-BHC and/or beta-BHC results for seven samples exceeded the instrument's

linear calibration range. The samples were diluted and reanalyzed. For these samples, the diluted alpha-BHC and/or beta-BHC results were transcribed onto the data summary tables (Appendix A) with an "E" code (result reported from secondary dilution), replacing the initial results as those to be more representative of the sample's concentrations. The affected samples included:

<u>Sample</u>	<u>Compound</u>
NSB-16 1-3	alpha-BHC, beta-BHC
NSB-16 3-5	alpha-BHC, beta-BHC
NSB-16 5-7	alpha-BHC, beta-BHC
NSB-16 7-9	alpha-BHC, beta-BHC
NSB-17 1-3	beta-BHC
NSB-17 3-5	beta-BHC
NSB-17 5-7	alpha-BHC, beta-BHC

2.2 SAMPLE HOLDING TIMES

Review of the sample collection, extraction and/or analysis dates noted that with the exception of select mercury analyses, all sample extractions and/or analyses were performed within the criteria presented in the "Guidelines". According to CLP protocol, mercury analyses are required to be performed within 26 days from receipt of the samples at the laboratory. However, as some of the soil boring samples were submitted to the laboratory approximately one week after collection, the "Guidelines" holding time criterion of 28 days from collection to analysis was considered more appropriate for validation purposes. For the following samples, mercury analyses exceeded the "Guidelines" holding time criterion as follows:

<u>Sample</u>	<u>Analyte</u>	<u>Actual⁽¹⁾ Holding Time</u>	<u>Holding Time Requirement⁽¹⁾</u>
<u>Soil Borings</u>			
NSB-1 0-2	mercury	29 days	28 days
NSB-1 2-4	mercury	29 days	28 days
NSB-1 4-6	mercury	29 days	28 days
NSB-1 6-8	mercury	29 days	28 days
NSB-1 8-10	mercury	29 days	28 days

⁽¹⁾ from collection to analysis

Due to the potential loss of analytes from holding time exceedances, mercury results for the above samples were qualified as estimated (J for detects, UJ for non-detects).

2.3 INSTRUMENT PERFORMANCE AND CALIBRATION

Prior to sample analyses, each instrument undergoes performance checks and calibration procedures (initial and continuing). Procedures for VOCs, BNAs, pesticides/PCBs, mercury, and methanol are given in the appropriate analytical method. Criteria validated are summarized below:

VOCs and BNAs:

1. Instrument tune and mass calibration
2. Analytical sequence
3. Initial and continuing calibration minimum response factor criteria
4. Initial calibration percent relative standard deviation (%RSD) criteria for individual compound response factors
5. Continuing calibration percent differences (%Ds) in response factors

Mercury:

1. Instrument initial calibrations (number of standards and correlation coefficients)
2. Instrument continuing calibrations (frequency and percent recoveries)

Pesticides/PCBs

1. Analytical sequence and surrogate compound retention times (R.T.s)
2. Initial calibration R.T. comparison to establish R.T. windows
3. Percent relative standard deviation (%RSD) criteria for individual pesticide initial calibrations
4. Resolution criteria for resolution check mixtures (RCMs)
5. Percent breakdown criteria for endrin and 4,4'-DDT
6. R.T. and percent difference (%D) criteria for performance evaluation mixtures (PEMs)

7. R.T. and %D criteria for continuing calibration standards
8. Percent recovery criteria for florisil cartridge and GPC check samples
9. Instrument blank results

Methanol:

1. Analytical sequence
2. Instrument initial calibration %RSD criteria in calibration factors
3. Continuing calibrations %Ds in calibration factors
4. R.T. criteria for individual standard continuing calibrations

Examination of the mercury data showed that all instrument performance and calibration results were acceptable. All VOC and BNA tune, mass calibrations and initial calibration data also met acceptance criteria.

Two VOC and one BNA continuing calibration analyses had percent differences (%Ds) between initial and continuing calibration response factors in excess of the "Guidelines" criteria of 25 percent. Per the "Guidelines", sample data associated with continuing calibrations having outlying %D values require qualification of both detected and non-detected results as estimated (J/UJ). Presented as follows are the affected samples and applicable data qualifiers based on the outlying continuing calibration data:

<u>Date</u>	<u>Fraction</u>	<u>Compound</u>	<u>%D</u>	<u>Qualifier Detects/ Non-Detects</u>
01/25/94	VOCs	bromomethane	29.5	J/UJ

Associated Samples: OBA-12B, QA-1 (OBA-12B Dup.), OBA-12C, Trip Blank (01/21/94)

01/26/94	VOCs	bromomethane	34	J/UJ
		acetone	25.7	J/UJ
		2-butanone	27.5	J/UJ
		4-methyl-2-pentanone	28.2	J/UJ
		2-hexanone	27	J/UJ

Associated Samples: OBA-11B, OBA-11C, rinsate blank (01/24/94), trip blank (01/24/94)

J - estimated result for detects

UJ - estimated quantitation limit for non-detects

Review of the pesticide calibration data associated with the January 1994 groundwater samples noted that on both GC-columns, surrogate compound retention times for some initial calibration standards and blanks were outside established R.T. windows. As all initial calibration standards had retention times for the target compounds within established R.T. windows, qualification of sample data was not considered necessary. Further, all associated continuing calibration standards and blanks had surrogate compound retention times within established R.T. windows.

Similarly, three pesticide continuing calibration standards reported with the soil boring samples had target compound and surrogate compound R.T.s outside established R.T. windows. Two of the three outlying standards were, however, not associated with any of the soil boring samples in the analytical sequence. A PEM standard analyzed on January 7, 1994 and associated with the soil boring samples, had an R.T. for surrogate compound decachlorobiphenyl (DCB) outside R.T. windows on the DB-608 GC-column. The corresponding DB-1701 GC-column PEM analysis had an R.T. for beta-BHC outside R.T. windows. The outlying R.T.s are summarized below.

<u>Standard</u>	<u>GC-Column</u>	<u>Compound</u>	<u>R.T.</u>	<u>R.T. Window</u>
PEM19	DB-608	DCB	35.95	35.98 - 36.18
PEM19	DB-1701	beta-BHC	17.98	17.99 - 18.09

Samples associated with the above PEM analyses included NSB-17 3-5, NSB-17 3-5 DL, and NSB-17 7-9. All three of the samples had detections of beta-BHC. For the above samples, beta-BHC was identified within established R.T. windows on both GC-columns used for analysis, and the concentrations reported from both GC-columns were virtually identical. Further, beta-BHC detections in other soil boring samples collected from NSB-17 were of sufficient magnitude to be confirmed by GC/MS analyses. Therefore, the presence of beta-BHC in the above soil boring samples was not considered suspect based on outlying surrogate or target compound R.T.s, and qualification was not considered necessary.

Review of the methanol calibration data noted one continuing calibration analyzed on January 27, 1994 that had an R.T. outside established R.T. windows (R.T. was 4.02

minutes, R.T. windows: 4.07 - 4.13 minutes). All associated samples were reported as non-detected for methanol. Based on the outlying standard R.T., sample chromatograms were reviewed to determine the potential for reporting false negatives for methanol. Review of the methanol GC chromatograms did not show any quantifiable peaks within expanded R.T. windows. Therefore, the methanol results associated with the continuing calibration of January 27, 1994 are acceptable without qualification.

All remaining instrument performance and calibration data were acceptable.

2.4 METHOD BLANKS

Method blanks evaluate the existence and potential for sample contamination through laboratory activities. VOC and BNAs method blanks had detections of common laboratory contaminants at concentrations below the reporting limits. Per the "Guidelines", target compounds that are attributable to laboratory contamination require qualification as non-detected (U) and tentatively identified compounds require rejection (R). In accordance with the "Guidelines", samples and appropriate data qualifiers required due to method blank contamination are as follows:

VOCs

<u>Sample</u>	<u>Compound</u>	<u>Sample Conc. (µg/l)</u>	<u>Qualified Sample Conc. (µg/l)</u>
1. VBLK 79 (01/26/94)	toluene	0.9J	
	chlorobenzene	0.8J	

Associated Samples:

OBA-11B	chlorobenzene	1BJ	10U
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BNAs

1. SBLK81 (10/12/93)	TIC cyclohexen-1-ol-isomer	8J
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Associated Samples:

MW-15A	TIC cyclohexen-1-ol-isomer	18BJ	18R
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<u>Sample</u>	<u>Sample Compound</u>	<u>Qualified Sample Conc. (µg/l)</u>	<u>Conc. (µg/l)</u>
2. SBLK83 (10/19/93)	bis(2-ethylhexyl)phthalate	1J	
Associated Samples:			
MW-15CD	bis(2-ethylhexyl)phthalate	15B	remove B ⁽¹⁾
MW-19A	bis(2-ethylhexyl)phthalate	2BJ	10U
MW-19B	bis(2-ethylhexyl)phthalate	2BJ	10U
QA-1 (MW-19B Dup.)	bis(2-ethylhexyl)phthalate	4BJ	10U
MW-19CD1	bis(2-ethylhexyl)phthalate	9BJ	10U
MW-20B	bis(2-ethylhexyl)phthalate	2BJ	10U
3. SBLK85 (11/02/93)	TIC oxygenated compound	9J	
	TIC unknown R.T. 5.92	38J	
	TIC cyclohexen-1-ol-isomer	9J	
Associated Samples:			
Rinsate Blank (10/29/93)	TIC oxygenated compound	5BJ	5R
	TIC unknown R.T. 5.92	38BJ	38R
	TIC cyclohexen-1-ol-isomer	11BJ	11R
MW-22B	TIC unknown R.T. 5.92	45BJ	45R
	TIC cyclohexen-1-ol-isomer	17BJ	17R
MW-22C	TIC unknown R.T. 5.92	13BJ	13R
	TIC cyclohexen-1-ol- isomer	7BJ	7R
MW-22D	TIC cyclohexen-1-ol-isomer	15BJ	15R
MW-22F	TIC unknown R.T. 5.92	19BJ	19R
	TIC cyclohexen-1-ol-isomer	11BJ	11R
MW-26CD	TIC unknown R.T. 5.92	17BJ	17R
	TIC cyclohexen-1-ol-isomer	7BJ	7R
4. SBLK02 (01/27/94)	TIC cyclohexen-1-ol-isomer	12J	
	TIC unknown R.T. 12.07	3J	
Associated Samples:			
Rinsate Blank (01/24/94)	TIC cyclohexen-1-ol-isomer	5BJ	5R
OBA-11B	TIC cyclohexen-1-ol-isomer	3BJ	3R

Notes

- (1) Result was greater than "Guidelines" criteria to be considered contributable to laboratory contamination
- B Compound detected in associated method blank
- J Compound detected below quantitation limit and is considered an estimated value
- U Non-detected at stated quantitation limit
- R Result is unusable
- TIC Tentatively identified compound

No other sample results required qualification due to method blank contamination.

2.5 RINSATE BLANK SAMPLES

Rinsate blank samples are used to assess sampling equipment decontamination procedures. One rinsate blank sample was collected with the DuPont monitoring well samples and one was collected with the Olin monitoring well samples collected in January 1994. No rinsate blank samples were collected with the soil boring samples. As such, the potential for cross-contamination from sampling activities could not be assessed for this sampling event. Compounds and/or analytes detected in the rinsate blank sample following qualification due to laboratory contamination are as follows:

<u>Sample</u>	<u>Fraction</u>	<u>Compound</u>	<u>Conc. (µg/l)</u>
1. Rinsate Blank (10/29/93)	BNAs	bis(2-ethylhexyl)phthalate TIC 2-cyclohexen-1-one-isomer TIC dichlorocyclohexane isomer	0.8J 3J 2J
2. Rinsate Blank (01/24/94)	VOCs BNAs	chloroform carbon tetrachloride bis(2-ethylhexyl)phthalate	2J 7J 0.4J

J - Compound detected below quantitation limit and is considered an estimated value.

The Olin monitoring wells were sampled on two different days. Samples collected on January 21, 1994 and January 24, 1994 are associated with the rinsate blank collected on January 24, 1994. The DuPont monitoring wells were collected on three different days. The associated rinsate blank sample is only associated with the DuPont monitoring wells sampled on October 29, 1993. For the other two days (October 7, 1993 and October 15, 1993), rinsate blanks collected from the DuPont quarterly monitoring program were used

to assess potential sample cross-contamination.

Qualification of sample data due to rinsate blank contamination followed the same criteria as for method blank contamination as presented in the "Guidelines". In accordance with the "Guidelines", qualification of sample data based on detections in the rinsate blank samples is presented as follows:

<u>Sample</u>	<u>Fraction</u>	<u>Compound</u>	<u>Conc. (µg/l)</u>	<u>Qualified Conc. (ug/l)</u>
MW-22B	BNAs	bis(2-ethylhexyl)phthalate	7J	10U
		TIC 2-cyclohexen-1-one-isomer	3J	3R
		TIC dichlorocyclohexane isomer	4J	4R
MW-22C	BNAs	bis(2-ethylhexyl)phthalate	6J	10U
		TIC dichlorocyclohexane isomer	4J	4R
MW-22D	BNAs	TIC 2-cyclohexen-1-one-isomer	5J	5R
		TIC dichlorocyclohexane isomer	6J	6R
MW-22F	BNAs	bis(2-ethylhexyl)phthalate	8J	10U
		TIC dichlorocyclohexane isomer	4J	4R
OBA-11B	BNAs	bis(2-ethylhexyl)phthalate	4J	10U
OBA-11C	BNAs	bis(2-ethylhexyl)phthalate	0.3J	10U
OBA-12B	BNAs	bis(2-ethylhexyl)phthalate	2J	10U
QA-1 (OBA-12B Dup.)	BNAs	bis(2-ethylhexyl)phthalate	0.7J	10U
OBA-12C	BNAs	bis(2-ethylhexyl)phthalate	0.6J	10U

J - compound detected below quantitation limit and is considered an estimated value

U - non-detected at stated quantitation limit

R - result is unusable

TIC - tentatively identified compounds

No other sample results required qualification due to rinsate blank contamination.

2.6 TRIP BLANK SAMPLES

Trip blank samples are analyzed for VOCs and methanol to assess potential cross-contamination during sample shipment. One trip blank set was submitted with each of the sample shipments associated with the Olin groundwater samples. Trip blank samples

were not submitted with the DuPont groundwater samples or Olin soil boring samples since these samples were not analyzed for VOCs or methanol. Both trip blank samples were VOC-free for the target compounds analyzed. Therefore, the potential for carryover contamination was considered minimal.

2.7 SURROGATE SPIKE RECOVERIES

Surrogate compounds are used to evaluate overall laboratory sample preparation efficiency on a "per sample" basis. The "Guidelines" require all VOC (and methanol) surrogate recoveries to meet acceptance criteria and allow one BNA surrogate recovery per fraction to be outside acceptance criteria provided the recovery is equal to or greater than 10 percent. All VOC and BNA surrogate recoveries met the criteria presented in the "Guidelines". Several sample pesticide/PCB analyses and corresponding secondary dilution analyses had no surrogate spike recoveries due to the necessity for dilution. The associated samples are summarized below:

<u>Sample</u>	<u>Dilution Factor</u>
MW-15CD	1:10
NSB-16 1-3	1:1,000
NSB-16 1-3 DL	1:10,000
NSB-16 3-5	1:50
NSB-16 3-5 DL	1:500
NSB-16 5-7	1:1,000
NSB-16 5-7 DL	1:10,000
NSB-16 7-9	1:50
NSB-16 7-9 DL	1:500
NSB-17 1-3 DL	1:100
NSB-17 3-5 DL	1:100
NSB-17 5-7	1:50
NSB-17 5-7 DL	1:500

In accordance with the "Guidelines", qualification of data is not required when surrogate spike compounds are diluted below quantifiable concentrations. Additionally, sample NSB-17 1-3 had one elevated surrogate spike recovery. However, the magnitude of the sample dilution (1:10) most likely contributed to the outlying recovery, and data qualification was not considered necessary for this sample.

The following pesticide/PCB sample analyses had outlying surrogate spike recoveries on

results were not qualified as estimated since they were reported from the GC-column that exhibited acceptable surrogate recoveries. Detected results were qualified as estimated only if the results were quantitated using the GC-column that exhibited outlying surrogate recoveries. Based on this approach, gamma-BHC detected in sample OBA-12B required qualification as estimated (J) and remaining sample results did not require qualification.

No other sample results required qualification based on outlying surrogate spike recoveries.

2.8 MATRIX SPIKE/MATRIX SPIKE DUPLICATE (MS/MSD) ANALYSES

MS/MSD analyses (for organics) and MS/laboratory duplicate analyses (for inorganics) are used to assess matrix effects upon the data. An MS/MSD or MS/lab duplicate sample was analyzed with each batch of samples received by the laboratory, in accordance with method requirements. Outlying spike recoveries or relative percent differences (RPDs) between MS/MSD recoveries or lab duplicate results are summarized below:

Sample	Analyte	% Recovery MS MSD		% Control Limits	RPD ⁽¹⁾	RPD Control Limits
MW-22B	4-nitrophenol mercury	-- 127	83 NA	10-80 75-125	-- --	NA NA
OBA-11C	trichloroethene 4-nitrophenol pentachlorophenol	-- 96 127	140 96 125	71-120 10-80 9-103	15 -- --	14 NA NA

(1) RPD between MS/MSD recoveries for organics and between lab duplicate results for mercury.

NA Not applicable

-- Recoveries or RPD acceptable

The outlying recoveries reported for pentachlorophenol and/or 4-nitrophenol indicate a potential high bias. As all associated samples were non-detected for the above compounds, qualification of sample data was not considered necessary. Trichloroethene (TCE) results for the Olin groundwater samples were not qualified because the TCE concentration in OBA-11C was much greater than the spiking concentration (approximately 6 times). In this case, the analytical accuracy was affected from the

one or both GC-columns as shown below:

<u>Sample</u>	<u>Surrogate Recovery⁽¹⁾</u>			
	<u>TCX1</u>	<u>TCX2</u>	<u>DCB1</u>	<u>DCB2</u>
Rinsate Blank (10/29/93)	--	--	--	48
MW-19A	--	--	27	26
MW-19B	--	59	25	22
MW-19CD1	--	--	52	--
MW-20B	--	--	20	18
MW-22C	--	--	--	57
MW-22F	--	--	42	44
MW-26CD	--	--	39	39
QA-1 (MW-19B Dup.)	--	58	35	32
Rinsate Blank (01/24/94)	--	--	35	35
OBA-11B	--	--	50	49
OBA-12B	--	59	--	--
NSB-17 1-3	--	--	161	--

(1) Control limits 60-150 percent

TCX Tetrachloro-meta-xylene

DCB Decachlorobiphenyl

TCX1/DCB1 Individual surrogate recoveries reported on GC-column DB-608

TCX2/DCB2 Individual surrogate recoveries reported for GC-column DB-1701

-- Recovery acceptable

The following samples required qualification of detected and non-detected pesticide/PCB results as estimated (J/UJ) since surrogate recoveries indicated a potential low bias on both GC-columns:

<u>Sample</u>	<u>Parameter</u>	<u>Qualifier Detects/ Non-Detects</u>
MW-19A	Pesticide/PCBs	J/UJ
MW-19B	Pesticide/PCBs	J/UJ
MW-20B	Pesticide/PCBs	J/UJ
MW-22F	Pesticide/PCBs	J/UJ
MW-26C	Pesticide/PCBs	J/UJ
QA-1 (MW-19B Dup.)	Pesticide/PCBs	J/UJ
Rinsate Blank (01/24/94)	Pesticide/PCBs	J/UJ
OBA-11B	Pesticide/PCBs	J/UJ

The remaining sample pesticide/PCB analyses had surrogate recoveries that indicated a potential low or high bias on one of the two GC-columns. In these cases, non-detected

sample TCE concentration overwhelming the TCE spiking concentration. The mercury spike recovery for sample MW-22B indicated a potential high bias. As such, detected mercury results for MW-22B and associated samples required qualification as estimated (J); non-detects were not qualified based on the high bias. Presented as follows are the affected samples and appropriate qualifications.

<u>Sample</u>	<u>Analyte</u>	<u>Qualifier</u>
MW-19A	mercury	J
MW-19B	mercury	J
QA-1 (Dup of MW-19B)	mercury	J
MW-22B	mercury	J

J = estimated concentration

Pesticide and mercury MS recoveries associated with the soil boring samples were not reported due to the necessity of sample dilution. Qualification of sample data is not required when matrix spike analytes are diluted below quantifiable concentrations.

Remaining MS/MSD and MS/lab duplicate results were acceptable.

2.9 INTERNAL STANDARDS (VOCs and BNAs)

Internal standards (I.S.) performance criteria ensure that GC/MS sensitivity and response are stable during each analytical run. All VOC and BNA internal standard areas and all VOC and BNA I.S. retention times were acceptable.

2.10 FIELD DUPLICATES

Field duplicate results were used to evaluate representativeness. For soil samples, when analytes for both duplicate and sample values are greater than five times the CRQL, satisfactory representativeness is indicated by an RPD less than or equal to 100 percent; for groundwater samples, this value is 50 percent. Where one or both of the analytes of a field duplicate pair are reported at less than five times the CRQL, satisfactory representativeness is indicated if the field duplicate results agree within 3.5 times the CRQL for soils and 2.5 times the CRQL for groundwater samples. Field duplicate

results that do not meet these criteria may indicate unsatisfactory representativeness of the results.

A field duplicate sample pair was not collected with the soil boring samples. Therefore, the representativeness of the soil boring data could not be properly evaluated.

Two field duplicate pairs, labelled as MW-19B/QA-1 and OBA-12B/QA-1 were collected with the groundwater sampling events. The results reported for the field duplicate sample pairs are in agreement with the above criteria, which indicates satisfactory representativeness was achieved.

2.11 COMPOUND IDENTIFICATION AND QUANTITATION

Data for one or more detected compounds/analytes for ten percent of the samples were checked for potential identification errors and were recalculated from the raw data. No anomalies or transcription errors were noted during validation of the reported compound identifications and quantitations.

Reported VOC and BNA tentatively identified compounds (TICs) were reviewed on a ten percent basis to determine if proper identification were performed. With one exception, no anomalies were noted. 1,2-Dichlorobenzene was reported as a VOC TIC for sample OBA-11B. The CLP method does not allow reporting TCL parameters as TICs. As such, the VOC TIC concentration of 1,2-dichlorobenzene for sample OBA-11B was rejected (data qualifier R).

Data were also checked to verify that the laboratory qualified detections below quantitation limits as estimated (J for organics, B for mercury). No errors were found.

2.12 REVIEW OF BOTH COLUMN RESULTS (PESTICIDE/PCBs)

Samples having detections of pesticide/PCBs are reviewed to ensure the lower of the two concentrations from both GC-column analyses is reported and the percent difference (%D) between column results is less than 25 percent.

Review of the pesticide/PCB data noted that the lower of the two GC-column pesticide/PCB results were reported in each case for the subject samples. Several samples had %Ds between both GC-column reported pesticide/PCB results in excess of 25 percent. In accordance with the "Guidelines", if the %D value reported is between 25-90 percent, results require qualification as estimated (J). If the %D value exceeds 90 percent, the "Guidelines" require results to be rejected (R).

Presented below are the associated samples, affected compounds and appropriate qualifications based on the outlying %D values.

<u>Sample</u>	<u>Compound</u>	<u>%D</u>	<u>Qualifier</u>
MW-15A	alpha-BHC	37.1	J
MW-22C	gamma-BHC	100.5	R
MW-22D	gamma-BHC	36.3	J
MW-22F	gamma-BHC	221.6	R
NSB-17 3-5 DL	gamma-BHC	25.4	J
OBA-11B	beta-BHC	37.9	J
OBA-11C	beta-BHC	26.1	J
	delta-BHC	27.8	J
QA-1 (OBA-12B Dup.)	gamma-BHC	70.3	J

J - estimated result

2.13 OVERALL DATA ASSESSMENT

Based on the criteria outlined, it is recommended that the results reported for these analyses be accepted for their intended use. Acceptable levels of accuracy and precision were achieved for the sample results validated, except where noted in this report. In addition, completeness, defined to be the percentage of analytical results requested which are judged to be valid including estimated (J) values, was 99 percent, which satisfies the completeness goal of the analytical method at 80 percent. Sample results from these sampling events required some qualification based on the QC deficiencies as summarized below:

Mercury results for five soil boring samples required qualification as estimated (J or UJ)

due to holding time exceedances. Select VOC results for eight samples required qualification as estimated (J or UJ) due to outlying continuing calibration results. Select VOC and BNA results were qualified as non-detected (U) or rejected (R) due to method blank or rinsate blank contamination. Select pesticide/PCB results for nine samples required qualification of detected and/or non-detected results as estimated (J or UJ) based on outlying surrogate spike recoveries. Mercury results for four samples were qualified as estimated (J) since the corresponding MS recovery indicated a potential high bias. Finally, select pesticide results for eight samples were qualified as estimated (J) or were rejected (R) since percent differences between both GC-column results were greater than 25 percent.

APPENDIX A

Summary of Detected Compounds

TABLE A-1
SUMMARY OF DETECTED COMPOUNDS
DUPONT/OLIN SPLIT SAMPLES
OCTOBER 1993

Sample I.D.	MW-15A	MW-15CD	MW-19A	MW-19B	MW-19B Dup.	MW-19CD-1
Sample Date	10/7/93	10/15/93	10/15/93	10/15/93	10/15/93	10/15/93
Units	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l
Semi-Volatiles						
1,3-dichlorobenzene	ND 10	13	ND 10	ND 10	ND 10	1 J
1,4-dichlorobenzene	ND 10	11	ND 10	ND 10	ND 10	1 J
1,2-dichlorobenzene	ND 10	16	ND 10	ND 10	ND 10	2 J
4-methylphenol	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
hexachloroethane	ND 10	4 J	ND 10	ND 10	ND 10	1 J
1,2,4-trichlorobenzene	ND 10	98 E	ND 10	ND 10	ND 10	6 J
naphthalene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
hexachlorobutadiene	ND 10	5 J	ND 10	1 J	ND 10	ND 10
2-methylnaphthalene	ND 10UJ	ND 10	ND 10	ND 10	ND 10	ND 10
2,4,6-trichlorophenol	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
acenaphthylene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
acenaphthene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
fluorene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
n-nitrosodiphenylamine	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
phenanthrene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
anthracene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
carbazole	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
di-n-butylphthalate	0.6 J	ND 10	ND 10	0.4 J	0.5 J	0.4 J
fluoranthene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
pyrene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
butylbenzylphthalate	ND 10	0.1 J	ND 10	ND 10	ND 10	ND 10
benzo(a)anthracene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
chrysene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
bis(2-ethylhexyl)phthalate	4 J	15	10 U	10 U	10 U	10 U
benzo(b)fluoranthene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
benzo(k)fluoranthene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
benzo(a)pyrene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
indeno(1,2,3-cd)pyrene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
benzo(g,h,i)perylene	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10
3,4-dichlorophenol	ND 10	ND 10	ND 10	ND 10	ND 10	ND 10

TABLE A-1
SUMMARY OF DETECTED COMPOUNDS
DUPONT/OLIN SPLIT SAMPLES
OCTOBER 1993

Sample I.D.	MW-20B	MW-22B	MW-22C	MW-22D	MW-22F	MW-26CD
Sample Date	10/15/93	10/29/93	10/29/93	10/29/93	10/29/93	10/29/93
Units	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l
Semi-Volatiles						
1,3-dichlorobenzene	ND 10	ND 10	7 J	ND 10	3 J	0.8 J
1,4-dichlorobenzene	ND 10	ND 10	2 J	ND 10	5 J	1 J
1,2-dichlorobenzene	ND 10	ND 10	ND 10	ND 10	12	ND 10
4-methylphenol	1 J	ND 10				
hexachloroethane	ND 10	5 J				
1,2,4-trichlorobenzene	ND 10	ND 10	2 J	5 J	4 J	4 J
naphthalene	5 J	ND 10				
hexachlorobutadiene	ND 10	ND 10	ND 10	1 J	ND 10	7 J
2-methylnaphthalene	3 J	ND 10	ND 10	ND 10	ND 10	4 J
2,4,6-trichlorophenol	2 J	ND 10				
acenaphthylene	2 J	ND 10				
acenaphthene	0.7 J	ND 10				
fluorene	1 J	ND 10				
n-nitrosodiphenylamine	ND 10	0.5 J				
phenanthrene	2 J	ND 10	0.4 J	0.9 J	0.4 J	0.4 J
anthracene	0.7 J	ND 10				
carbazole	ND 10	ND 10	0.8 J	0.9 J	0.6 J	ND 10
di-n-butylphthalate	ND 10					
fluoranthene	1 J	0.8 J	1 J	1 J	1 J	ND 10
pyrene	1 J	ND 10				
butylbenzylphthalate	ND 10					
benzo(a)anthracene	0.5 J	0.6 J	ND 10	ND 10	ND 10	ND 10
chrysene	0.4 J	3 J	0.6 J	ND 10	0.6 J	ND 10
bis(2-ethylhexyl)phthalate	10 U	10 U	10 U	11	10 U	10 U
benzo(b)fluoranthene	0.4 J	2 J	0.5 J	ND 10	0.4 J	ND 10
benzo(k)fluoranthene	ND 10	0.7 J	0.2 J	ND 10	0.2 J	ND 10
benzo(a)pyrene	ND 10	0.4 J	ND 10	ND 10	ND 10	ND 10
indeno(1,2,3-cd)pyrene	ND 10	0.5 J	ND 10	ND 10	ND 10	ND 10
benzo(g,h,i)perylene	ND 10	0.4 J	ND 10	ND 10	ND 10	ND 10
3,4-dichlorophenol	ND 10	ND 10	1 J	ND 10	0.7 J	ND 10

TABLE A-1
SUMMARY OF DETECTED COMPOUNDS
DUPONT/OLIN SPLIT SAMPLES
OCTOBER 1993

Sample I.D.	Rinsate-1
Sample Date	10/29/93
Units	ug/l

Semi-Volatiles

1,3-dichlorobenzene	ND 10
1,4-dichlorobenzene	ND 10
1,2-dichlorobenzene	ND 10
4-methylphenol	ND 10
hexachloroethane	ND 10
1,2,4-trichlorobenzene	ND 10
naphthalene	ND 10
hexachlorobutadiene	ND 10
2-methylnaphthalene	ND 10
2,4,6-trichlorophenol	ND 10
acenaphthylene	ND 10
acenaphthene	ND 10
fluorene	ND 10
n-nitrosodiphenylamine	ND 10
phenanthrene	ND 10
anthracene	ND 10
carbazole	ND 10
di-n-butylphthalate	ND 10
fluoranthene	ND 10
pyrene	ND 10
butylbenzylphthalate	ND 10
benzo(a)anthracene	ND 10
chrysene	ND 10
bis(2-ethylhexyl)phthalate	0.8 J
benzo(b)fluoranthene	ND 10
benzo(k)fluoranthene	ND 10
benzo(a)pyrene	ND 10
indeno(1,2,3-cd)pyrene	ND 10
benzo(g,h,i)perylene	ND 10
3,4-dichlorophenol	ND 10

Notes:

- ND - Not detected, applicable detection limit listed.
- J - Indicates an estimated value due to outlying QC results and/or indicates detection above the method detection limit (MDL), but less than the practical quantitation limit (PQL).
- U - The compound was analyzed for but not detected. The numerical value is the sample quantitation limit and has been adjusted to reflect contamination from laboratory or field activities.
- UJ - Indicates an estimated PQL due to outlying QC results.
- E - Sample result reported from a secondary dilution.

TABLE A-1
SUMMARY OF DETECTED COMPOUNDS
DUPONT/OLIN SPLIT SAMPLES
OCTOBER 1993

Sample I.D.	MW-15A	MW-15CD	MW-19A	MW-19B	MW-19B Dup.	MW-19CD-1
Sample Date	10/7/93	10/15/93	10/15/93	10/15/93	10/15/93	10/15/93
Units	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l
TCL-Pesticides						
alpha-BHC	0.021 J	5.1	0.024 J	0.025 J	0.036 J	2.2 J
beta-BHC	0.18	1.4	0.14 J	0.23 J	0.24 J	0.31 J
delta-BHC	ND 0.050	0.19 J	ND 0.050UJ	ND 0.050UJ	ND 0.050UJ	0.098 J
gamma-BHC (lindane)	ND 0.050	2.0	ND 0.050UJ	ND 0.050UJ	0.013 J	0.80
Metals						
mercury	ND 0.20	ND 0.20	1.0 J	2.6 J	2.7 J	ND 0.20

TABLE A-1
SUMMARY OF DETECTED COMPOUNDS
DUPONT/OLIN SPLIT SAMPLES
OCTOBER 1993

Sample I.D.	MW-20B	MW-22B	MW-22C	MW-22D	MW-22F	MW-26CD
Sample Date	10/15/93	10/29/93	10/29/93	10/29/93	10/29/93	10/29/93
Units	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l
TCL-Pesticides						
alpha-BHC	ND 0.050UJ	ND 0.062	0.020 J	0.089	0.23 J	0.23 J
beta-BHC	ND 0.050UJ	ND 0.062	ND 0.050	0.017 J	0.027 J	0.11 J
delta-BHC	ND 0.050UJ	ND 0.062	ND 0.050	ND 0.050	ND 0.052UJ	ND 0.050UJ
gamma-BHC (lindane)	ND 0.050UJ	ND 0.062	0.018 JR	0.056 J	0.012 JR	0.25 J
Metals						
mercury	ND 0.20	0.54 J	ND 0.20	ND 0.20	ND 0.20	ND 0.20

TABLE A-1
SUMMARY OF DETECTED COMPOUNDS
DUPONT/OLIN SPLIT SAMPLES
OCTOBER 1993

Sample I.D. Rinsate-1
 Sample Date 10/29/93
 Units ug/l

TCL-Pesticides

alpha-BHC	ND 0.050
beta-BHC	ND 0.050
delta-BHC	ND 0.050
gamma-BHC (lindane)	ND 0.050

Metals

mercury	ND 0.20
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Notes:

ND - Not detected, applicable detection limit listed.

J - Indicates an estimated value due to outlying QC results and/or indicates detection above the method detection limit (MDL), but less than the practical quantitation limit (PQL).

UJ - Indicates an estimated PQL due to outlying QC results.

R- Indicates the result is unusable due to outlying QC results.

APPENDIX A-2

Olin Soil Borings

December 1993

TABLE A-2
SUMMARY OF DETECTED COMPOUNDS
OLIN SOIL BORINGS
OLIN RFI
NIAGARA FALLS, NEW YORK
DECEMBER 1993

Sample I.D.	NSB-16	NSB-16	NSB-16	NSB-16	NSB-17	NSB-17	NSB-17
Depth (feet)	1-3	3-5	5-7	7-9	1-3	3-5	5-7
Sample Date	12/14/93	12/14/93	12/14/93	12/14/93	12/14/93	12/14/93	12/14/93
TCL-Pesticides (ug/kg)							
alpha-BHC	110,000 CE	1,800 CE	54,000 CE	4,800 CE	290	190	2,100 E
beta-BHC	57,000 CE	5,400 CE	50,000 CE	9,400 CE	1,300 E	450 E	3,100 E
delta-BHC	2,600 C	110 J	1,500 CJ	150	25	12 J	220
gamma-BHC (lindane)	4,000 C	71 J	1,500 CJ	1,500	140	52 J	1,000
Sample I.D.	NSB-1	NSB-1	NSB-1	NSB-1	NSB-1	NSB-4	NSB-4
Depth (feet)	0-2	2-4	4-6	6-8	8-10	2-4	4-6
Sample Date	12/7/93	12/7/93	12/7/93	12/7/93	12/7/93	12/8/93	12/8/93
Metals (mg/kg)							
mercury	13,000 J	15,600 J	186 J	6.9 J	8.2 J	217	158
TCLP Metals (ug/l)							
mercury	21.4	254	577	2.0	2.3	1.3	3.0

TABLE A-2
SUMMARY OF DETECTED COMPOUNDS
OLIN SOIL BORINGS
OLIN RFI
NIAGARA FALLS, NEW YORK
DECEMBER 1993

Sample I.D.	NSB-17
Depth (feet)	7-9
Sample Date	12/14/93

TCL-Pesticides (ug/kg)	
alpha-BHC	60
beta-BHC	66
delta-BHC	4.5 J
gamma-BHC (lindane)	15 J

Sample I.D.	NSB-4	NSB-14	NSB-14	NSB-14	NSB-14
Depth (feet)	6-8	1-3	3-5	5-7	7-9
Sample Date	12/8/93	12/14/93	12/14/93	12/14/93	12/14/93

Metals (mg/kg)					
mercury	0.38	20.1	0.13	0.53	ND 0.10

TCLP Metals (ug/l)					
mercury	ND 0.20	1.7	0.56	ND 0.20	ND 0.20

ND - Not detected, applicable detection limit listed.

J - Indicates an estimated value due to outlying QC results and/or indicates detection above the minimum detection limit (MDL), but less than the practical quantitation limit (PQL)

C - Compound confirmed by GC/MS.

E - Sample result reported from a secondary dilution.

APPENDIX A-3

Olin Groundwater Samples

January 1994

TABLE A-3
SUMMARY OF DETECTED COMPOUNDS
OLIN RFI GROUNDWATER SAMPLES
NIAGARA FALLS, NEW YORK
JANUARY 1994

Well I.D	OBA-11B	OBA-11C	OBA-12B	Dup.	OBA-12C
Sample Date	1/24/94	1/24/94	1/21/94	1/21/94	1/21/94
Units	ug/l	ug/l	ug/l	ug/l	ug/l
Compounds					
TCL-VOCs					
vinyl chloride	55	1500	ND 10	ND 10	4300
methylene chloride	ND 10	500 J	ND 10	ND 10	ND 1000
1,1-dichloroethene	2 J	ND 1000	ND 10	ND 10	ND 1000
1,2-dichloroethene (total)	170 E	7100	ND 10	ND 10	14000
chloroform	93	3400	ND 10	ND 10	ND 1000
1,1,1-trichloroethane	1 J	ND 1000	ND 10	ND 10	ND1000
trichloroethene	460 E	21000 E	ND 10	ND 10	3400
carbon tetrachloride	ND 10	ND 1000	ND 10	ND 10	ND 1000
benzene	0.8 J	ND 1000	ND 10	ND 10	89 J
tetrachloroethene	160	4700	ND 10	ND 10	200 J
1,1,2,2-tetrachloroethane	11	380 J	ND 10	ND 10	ND 1000
chlorobenzene	10 U	1000 U	ND 10	ND 10	40 J

TABLE A-3
SUMMARY OF DETECTED COMPOUNDS
OLIN RFI GROUNDWATER SAMPLES
NIAGARA FALLS, NEW YORK
JANUARY 1994

Well I.D	Rinsate-1	TB-1	TB-2
Sample Date	1/24/94	1/21/94	1/24/94
Units	ug/l	ug/l	ug/l
Compounds			
<u>TCL-VOCs</u>			
vinyl chloride	ND 10	ND 10	ND 10
methylene chloride	ND 10	ND 10	ND 10
1,1-dichloroethene	ND 10	ND 10	ND 10
1,2-dichloroethene (total)	ND 10	ND 10	ND 10
chloroform	2 J	ND 10	ND 10
1,1,1-trichloroethane	ND 10	ND 10	ND 10
trichloroethene	ND 10	ND 10	ND 10
carbon tetrachloride	7 J	ND 10	ND 10
benzene	ND 10	ND 10	ND 10
tetrachloroethene	ND 10	ND 10	ND 10
1,1,2,2-tetrachloroethane	ND 10	ND 10	ND 10
chlorobenzene	ND 10	ND 10	ND 10

Notes:

ND - Not detected, applicable detection limit listed.

J - Indicates an estimated value due to outlying QC criteria and/or indicates detection above the method detection limit (MDL), but less than the practical quantitation limit (PQL).

E - Sample result reported from secondary dilution.

U - The compound was analyzed for but was not detected. The numerical value is the sample quantitation limit and has been adjusted to reflect contamination from laboratory or field activities.

TABLE A-3
SUMMARY OF DETECTED COMPOUNDS
OLIN RFI GROUNDWATER SAMPLES
NIAGARA FALLS, NEW YORK
JANUARY 1994

Well I.D	OBA-11B	OBA-11C	OBA-12B	Dup.	OBA-12C
Sample Date	1/24/94	1/24/94	1/21/94	1/21/94	1/21/94
Units	ug/l	ug/l	ug/l	ug/l	ug/l
Compounds					
<u>Semi-Volatiles</u>					
1,3-dichlorobenzene	6 J	21	ND 10	ND 10	10
1,4-dichlorobenzene	6 J	16	ND 10	ND 10	5 J
1,2-dichlorobenzene	31	100 E	ND 10	ND 10	14
4-methylphenol	ND 10	8 J	ND 10	ND 10	ND 10
1,2,4-trichlorobenzene	10	34	ND 10	ND 10	2 J
hexachlorobutadiene	ND 10	1 J	ND 10	ND 10	ND 10
2,4,6-trichlorophenol	ND 10	ND 10	ND 10	ND 10	2 J
2,4,5-trichlorophenol	ND 25	ND 25	ND 25	ND 25	40
di-n-butyl phthalate	ND 10	0.4 J	0.5 J	0.4 J	0.4 J
bis(2-ethylhexyl)phthalate	10 U				
3-chlorophenol	ND 10	ND 10	ND 10	ND 10	4 J
3,4-dichlorophenol	ND 10	ND 10	ND 10	ND 10	74
2,3,6-trichlorophenol	ND 10	ND 10	ND 10	ND 10	1 J

TABLE A-3
SUMMARY OF DETECTED COMPOUNDS
OLIN RFI GROUNDWATER SAMPLES
NIAGARA FALLS, NEW YORK
JANUARY 1994

Well I.D	Rinsate-1	TB-1	TB-2
Sample Date	1/24/94	1/21/94	1/24/94
Units	ug/l	ug/l	ug/l
Compounds			
<u>Semi-Volatiles</u>			
1,3-dichlorobenzene	ND 10	NS	NS
1,4-dichlorobenzene	ND 10	NS	NS
1,2-dichlorobenzene	ND 10	NS	NS
4-methylphenol	ND 10	NS	NS
1,2,4-trichlorobenzene	ND 10	NS	NS
hexachlorobutadiene	ND 10	NS	NS
2,4,6-trichlorophenol	ND 10	NS	NS
2,4,5-trichlorophenol	ND 25	NS	NS
di-n-butyl phthalate	ND 10	NS	NS
bis(2-ethylhexyl)phthalate	0.4 J	NS	NS
3-chlorophenol	ND 10	NS	NS
3,4-dichlorophenol	ND 10	NS	NS
2,3,6-trichlorophenol	ND 10	NS	NS

Notes:

NS - Not sampled.

ND - Not detected, applicable detection limit listed.

J - Indicates an estimated value due to outlying QC results and/or indicates detection above the method detection limit (MDL), but less than the practical quantitation limit (PQL).

E - Sample result reported from secondary dilution.

U - The compound was analyzed for but was not detected. The numerical value is the sample quantitation limit and has been adjusted to reflect contamination from laboratory or field activities.

TABLE A-3
SUMMARY OF DETECTED COMPOUNDS
OLIN RFI GROUNDWATER SAMPLES
NIAGARA FALLS, NEW YORK
JANUARY 1994

Well ID	OBA-11B	OBA-11C	OBA-12B	Dup. OBA-12B	OBA-12C	Rinsate-1
Sample Date	1/24/94	1/24/94	1/21/94	1/21/94	1/21/94	1/24/94
Units	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l
Compounds						
TCL-Pest/PCBs						
alpha-BHC	0.64 J	0.73	0.077	0.061	0.021 J	ND .050UJ
beta-BHC	0.078 J	0.092 J	0.027 J	0.029 J	ND .050	ND .050UJ
delta-BHC	0.012 J	0.016 J	ND .050	ND .050	ND .050	ND .050UJ
gamma-BHC (lindane)	0.12 J	0.14	0.023 J	0.015 J	ND .050	ND .050UJ

TABLE A-3
SUMMARY OF DETECTED COMPOUNDS
OLIN RFI GROUNDWATER SAMPLES
NIAGARA FALLS, NEW YORK
JANUARY 1994

Well ID	TB-1	TB-2
Sample Date	1/21/94	1/24/94
Units	ug/l	ug/l

Compounds
TCL-Pest/PCBs

alpha-BHC	NS	NS
beta-BHC	NS	NS
delta-BHC	NS	NS
gamma-BHC (lindane)	NS	NS

Notes:

NS - Not sampled.

ND - Not detected, applicable detection limit listed.

J - Indicates an estimated value due to outlying QC criteria and/or indicates detection above the method detection limit (MDL), but less than the practical quantitation limit (PQL).

UJ - Indicates an estimated PQL due to outlying QC results.

TABLE A-3
SUMMARY OF DETECTED COMPOUNDS
OLIN RFI GROUNDWATER SAMPLES
NIAGARA FALLS, NEW YORK
JANUARY 1994

Well ID	OBA-11B	OBA-11C	OBA-12B	Dup. OBA-12B	OBA-12C
Sample Date	1/24/94	1/24/94	1/21/94	1/21/94	1/21/94
Units	mg/l	mg/l	mg/l	mg/l	mg/l

Compounds

methanol	ND 0.55				
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Sample Date	1/24/94	1/24/94	1/21/94	1/21/94	1/21/94
Units	ug/l	ug/l	ug/l	ug/l	ug/l

Metals

mercury	0.29	0.39	1.3	1.6	ND 0.2
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TABLE A-3
SUMMARY OF DETECTED COMPOUNDS
OLIN RFI GROUNDWATER SAMPLES
NIAGARA FALLS, NEW YORK
JANUARY 1994

Well ID	Rinsate Blank 1	Trip Blank 1	Trip Blank 2
Sample Date	1/24/94	1/21/94	1/24/94
Units	mg/l	mg/l	mg/l

Compounds

methanol	ND 0.55	ND 0.55	ND 0.55
----------	---------	---------	---------

Sample Date	1/24/94	1/21/94	1/24/94
Units	ug/l	ug/l	ug/l

Metals

mercury	ND 0.2	NS	NS
---------	--------	----	----

Notes:

NS - Not sampled.

ND - Not detected, applicable detection limit listed.

APPENDIX B

Laboratory Data Summary Sheets

APPENDIX B-1

DuPont/Olin Groundwater Split Samples

October 1993

10011

EPA SAMPLE NO.

1B

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

MW15A

Lab Name: RECRA ENVIRON

Contract: NY93-577

Lab Code: RECNY Case No.: 4820

SAS No.: SDG No.: OLINSP

Matrix: (soil/water) WATER

Lab Sample ID: AS046888

Sample wt/vol: 1000 (g/mL) ML

Lab File ID: 15495Y

Level: (low/med) LOW

Date Received: 10/07/93

% Moisture: decanted: (Y/N)

Date Extracted: 10/12/93

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 10/18/93

Injection Volume: 2.0 (uL)

Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND		
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-----	Dimethyl Phthalate	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
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

Lab Name: RECRA ENVIRONContract: NY93-577MW15ALab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS046888Sample wt/vol: 1000 (g/mL) MLLab File ID: 15495YLevel: (low/med) LOWDate Received: 10/07/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/12/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 10/18/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND		
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	0.6	J
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-Octyl Phthalate	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

1X
ORGANICS ANALYSIS DATA SHEET

SAMPLE DOCK

MW15A

Lab Name: RECRA ENVIRON

Contract: NY93-577

Lab Code: RECNY Case No.: 4820

SAS No.: _____ SDG No.: OLINSP

Matrix: (soil/water) WATER

Lab Sample ID: AS046888

Sample wt/vol: 1000 (g/mL) ML

Lab File ID: 15495Y

Level: (low/med) LOW

Date Received: 10/07/93

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 10/12/93

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 10/18/93

Injection Volume: 2.0 (uL)

Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

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

Q

CAS NO.	COMPOUND		
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

10014

EPA SAMPLE NO.

1F

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

MW15A

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS046888Sample wt/vol: 1000 (g/mL) MLLab File ID: 15495YLevel: (low/med) LOWDate Received: 10/07/93

Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/12/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 10/18/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

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

Number TICs found: 3

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1. 2. 930-68-7 3.	CYCLOHEXEN-1-OL ISOMER 2-CYCLOHEXEN-1-ONE DICHLOROCYCLOHEXANE ISOMER	5.30 6.22 9.37	18 9 3	BJ JN J

10064

EPA SAMPLE NO.

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

MW15A

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS046888Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 10/07/93Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 10/12/93Concentrated Extract Volume: 10000 (uL)Date Analyzed: 11/05/93Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) YCONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND		
319-84-6-----	alpha-BHC	0.021	JP
319-85-7-----	beta-BHC	0.18	
319-86-8-----	delta-BHC	0.050	U
58-89-9-----	gamma-BHC (Lindane)	0.050	U
76-44-8-----	Heptachlor	0.050	U
309-00-2-----	Aldrin	0.050	U
1024-57-3-----	Heptachlor epoxide	0.050	U
959-98-8-----	Endosulfan I	0.050	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	0.50	U
72-43-5-----	Methoxychlor	0.10	U
53494-70-5-----	Endrin ketone	0.10	U
7421-93-4-----	Endrin aldehyde	0.050	U
5103-71-9-----	alpha-Chlordane	0.050	U
5103-74-2-----	gamma-Chlordane	5.0	U
8001-35-2-----	Toxaphene	1.0	U
12674-11-2-----	Aroclor-1016	2.0	U
11104-28-2-----	Aroclor-1268	1.0	U
11141-16-5-----	Aroclor-1232	1.0	U
53469-21-9-----	Aroclor-1242	1.0	U
12672-29-6-----	Aroclor-1248	1.0	U
11097-69-1-----	Aroclor-1254	1.0	U
11096-82-5-----	Aroclor-1260	1.0	U

1825

U.S. EPA - CLP

7

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

MW-15A

Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650R
Lab Code: RECNY Case No.: 4820 SAS No.: SDG No.: OLINSP
Matrix (soil/water): WATER Lab Sample ID: 6888
Level (low/med): LOW Date Received: 10/07/93
Solids: 0.0

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

Color Before: _____
Color After: _____

Clarity Before: _____
Clarity After: _____

Texture: _____
Artifacts: _____

Comments:

LAB SAMPLE ID: AS046888-ST000836

70015

EPA SAMPLE NO.

1B

SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

MW15CD

Lab Name: RECRA ENVIRON

Contract: NY93-577

Lab Code: RECNY Case No.: 4820

SAS No.: SDG No.: OLINSP

Matrix: (soil/water) WATER

Lab Sample ID: AS047418

Sample wt/vol: 1000 (g/mL) ML

Lab File ID: 13846W

Level: (low/med) LOW

Date Received: 10/15/93

Moisture: decanted: (Y/N)

Date Extracted: 10/19/93

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 11/03/93

Injection Volume: 2.0 (uL)

Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

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

CAS NO.	COMPOUND			
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	13		
106-46-7-----	1,4-Dichlorobenzene	11		
95-50-1-----	1,2-Dichlorobenzene	16		
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	4	J	
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	93	E	
91-20-3-----	Naphthalene	10	U	
106-47-8-----	4-Chloroaniline	10	U	
87-68-3-----	Hexachlorobutadiene	5	J	
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-----	Dimethyl Phthalate	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

SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

MW15CD

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047418Sample wt/vol: 1000 (g/mL) MLLab File ID: 13846WLevel: (low/med) LOWDate Received: 10/15/93

* Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND		
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	0.1	J
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	15	B
117-84-0-----	Di-n-Octyl Phthalate	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

JU17

SAMPLE NO.

1X

ORGANICS ANALYSIS DATA SHEET

MW15CD

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047418Sample wt/vol: 1000 (g/mL) MLLab File ID: 13846WLevel: (low/med) LOWDate Received: 10/15/93% Moisture: _____ decanted: (Y/N) NDate Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND		
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

10018

EPA SAMPLE NO.

1F
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

MW15CD

Lab Name: RECRA ENVIRON

Contract: NY93-577

Lab Code: RECNY Case No.: 4820

SAS No.: SDG No.: OLINSP

Matrix: (soil/water) WATER

Lab Sample ID: AS047418

Sample wt/vol: 1000 (g/mL) ML

Lab File ID: 13846W

Level: (low/med) LOW

Date Received: 10/15/93

% Moisture: decanted: (Y/N) _____

Date Extracted: 10/19/93

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 11/03/93

Injection Volume: 2.0 (uL)

Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

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

Number TICs found: 20

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	UNKNOWN	8.28	5	J
2.	POLYCHLORINATED COMPOUND	10.20	11	J
3.	POLYCHLORINATED COMPOUND	10.98	49	J
4. 42769-38-0	1134TETRACHLORO13BUTADIENE	11.40	18	JN
5. 42769-38-0	1134TETRACHLORO13BUTADIENE	12.15	16	JN
6. 55880-77-8	PENTACHLORO1,3-BUTADIENE	12.83	4	JN
7. 55880-77-8	PENTACHLORO1,3-BUTADIENE	13.03	6	JN
8.	SULFUR COMPOUND	14.20	10	J
9.	POLYCHLORINATED COMPOUND	16.97	13	J
10.	UNKNOWN	19.48	4	J
11.	HEXACHLOROCYCLOHEXANE ISO.	22.08	7	J
12.	UNKNOWN	28.00	10	J
13.	LONG CHAIN SAT. HYDROCARBON	33.82	7	J
14.	LONG CHAIN SAT. HYDROCARBON	34.75	11	J
15.	UNKNOWN	34.88	8	J
16.	LONG CHAIN SAT. HYDROCARBON	35.67	17	J
17.	LONG CHAIN SAT. HYDROCARBON	36.63	19	J
18.	LONG CHAIN SAT. HYDROCARBON	37.73	22	J
19.	LONG CHAIN SAT. HYDROCARBON	39.00	21	J
20.	LONG CHAIN SAT. HYDROCARBON	40.50	19	J

0019

EPA SAMPLE NO.

1B

SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

MW15CDDL

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047418DLSample wt/vol: 1000 (g/mL) MLLab File ID: 13859WLevel: (low/med) LOWDate Received: 10/15/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 2.0HPLC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q
108-95-2-----	Phenol	20 U
111-44-4-----	bis(2-Chloroethyl) Ether	20 U
95-57-8-----	2-Chlorophenol	20 U
541-73-1-----	1,3-Dichlorobenzene	12 DJ
106-46-7-----	1,4-Dichlorobenzene	11 DJ
95-50-1-----	1,2-Dichlorobenzene	16 DJ
95-48-7-----	2-Methylphenol	20 U
108-60-1-----	2,2'-oxybis(1-Chloropropane)	20 U
106-44-5-----	4-Methylphenol	20 U
621-64-7-----	N-Nitroso-Di-n-Propylamine	20 U
67-72-1-----	Hexachloroethane	4 DJ
98-95-3-----	Nitrobenzene	20 U
78-59-1-----	Isophorone	20 U
88-75-5-----	2-Nitrophenol	20 U
105-67-9-----	2,4-Dimethylphenol	20 U
111-91-1-----	bis(2-Chloroethoxy) Methane	20 U
120-83-2-----	2,4-Dichlorophenol	20 U
120-82-1-----	1,2,4-Trichlorobenzene	98 D
91-20-3-----	Naphthalene	20 U
106-47-8-----	4-Chloroaniline	20 U
87-68-3-----	Hexachlorobutadiene	4 DJ
59-50-7-----	4-Chloro-3-Methylphenol	20 U
91-57-6-----	2-Methylnaphthalene	20 U
77-47-4-----	Hexachlorocyclopentadiene	20 U
88-06-2-----	2,4,6-Trichlorophenol	20 U
95-95-4-----	2,4,5-Trichlorophenol	50 U
91-58-7-----	2-Chloronaphthalene	20 U
88-74-4-----	2-Nitroaniline	50 U
131-11-3-----	Dimethyl Phthalate	20 U
208-96-8-----	Acenaphthylene	20 U
606-20-2-----	2,6-Dinitrotoluene	20 U
99-09-2-----	3-Nitroaniline	50 U
83-32-9-----	Acenaphthene	20 U

0020

EPA SAMPLE NO.

1C

SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

MW15CDDL

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047418DLSample wt/vol: 1000 (g/mL) MLLab File ID: 13859WLevel: (low/med) LOWDate Received: 10/15/93% Moisture: _____ decanted: (Y/N) Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 2.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND	Q
51-28-5-----	2,4-Dinitrophenol	50 U
100-02-7-----	4-Nitrophenol	50 U
132-64-9-----	Dibenzofuran	20 U
121-14-2-----	2,4-Dinitrotoluene	20 U
84-66-2-----	Diethylphthalate	20 U
7005-72-3-----	4-Chlorophenyl-phenylether	20 U
86-73-7-----	Fluorene	20 U
100-01-6-----	4-Nitroaniline	50 U
534-52-1-----	4,6-Dinitro-2-Methylphenol	50 U
86-30-6-----	N-Nitrosodiphenylamine (1)	20 U
101-55-3-----	4-Bromophenyl-phenylether	20 U
118-74-1-----	Hexachlorobenzene	20 U
87-86-5-----	Pentachlorophenol	50 U
85-01-8-----	Phenanthrene	20 U
120-12-7-----	Anthracene	20 U
86-74-8-----	Carbazole	20 U
84-74-2-----	Di-n-Butylphthalate	20 U
206-44-0-----	Fluoranthene	20 U
129-00-0-----	Pyrene	20 U
85-68-7-----	Butylbenzylphthalate	20 U
91-94-1-----	3,3'-Dichlorobenzidine	20 U
56-55-3-----	Benzo(a)Anthracene	20 U
218-01-9-----	Chrysene	20 U
117-81-7-----	Bis(2-Ethylhexyl)Phthalate	15 BDJ
117-84-0-----	Di-n-Octyl Phthalate	20 U
205-99-2-----	Benzo(b)Fluoranthene	20 U
207-08-9-----	Benzo(k)Fluoranthene	20 U
50-32-8-----	Benzo(a)Pyrene	20 U
193-39-5-----	Indeno(1,2,3-cd) Pyrene	20 U
53-70-3-----	Dibenz(a,h)Anthracene	20 U
191-24-2-----	Benzo(g,h,i)Perylene	20 U

10021

SAMPLE NO.

1X
ORGANICS ANALYSIS DATA SHEET

Lab Name: RECRA ENVIRONContract: NY93-577

MW15CDDL

Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047418DLSample wt/vol: 1000 (g/mL) MLLab File ID: 13859WLevel: (low/med) LOWDate Received: 10/15/93% Moisture: _____ decanted: (Y/N) NDate Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 2.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	UG/L	Q
108-43-0-----	3-Chlorophenol	20	U
106-48-9-----	4-Chlorophenol	20	U
576-24-9-----	2,3-Dichlorophenol	20	U
583-78-8-----	2,5-Dichlorophenol	20	U
95-77-2-----	3,4-Dichlorophenol	20	U
591-35-5-----	3,5-Dichlorophenol	20	U
15950-66-0-----	2,3,4-Trichlorophenol	20	U
933-78-8-----	2,3,5-Trichlorophenol	20	U
933-75-5-----	2,3,6-Trichlorophenol	20	U
609-19-8-----	3,4,5-Trichlorophenol	20	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	20	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	20	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	20	U

1000

EPA SAMPLE NO.

1F

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: RECRA ENVIRONContract: NY93-577

MW15CDDL

Lab Code: RECNY Case No.: 4820 SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047418DLSample wt/vol: 1000 (g/mL) MLLab File ID: 13859WLevel: (low/med) LOWDate Received: 10/15/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 2.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/LNumber TICs found: 20

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	POLYCHLORINATED COMPOUND	8.25	6	J
2.	UNKNOWN	9.00	50	J
3. 42769-38-0	1134TETRACHLORO13BUTADIENE	10.17	15	JN
4.	POLYCHLORINATED COMPOUND	10.92	64	J
5. 42769-38-0	1134TETRACHLORO13BUTADIENE	11.35	22	JN
6. 42769-38-0	1134TETRACHLORO13BUTADIENE	12.10	25	JN
7. 55880-77-8	PENTACHLORO-1,3-BUTADIENE	12.78	6	JN
8.	SULFUR COMPOUND	14.15	12	J
9.	CHLORINATED COMPOUND	16.90	11	J
10.	SULFUR COMPOUND	21.77	9	J
11.	HEXACHLOROCYCLOHEXANE ISO.	22.02	11	J
12.	UNKNOWN	25.62	5	J
13.	UNKNOWN HYDROCARBON	33.75	5	J
14.	UNKNOWN HYDROCARBON	34.70	8	J
15.	UNKNOWN	34.83	5	J
16.	LONG CHAIN SAT. HYDROCARBON	35.60	14	J
17.	LONG CHAIN SAT. HYDROCARBON	36.55	14	J
18.	LONG CHAIN SAT. HYDROCARBON	37.63	16	J
19.	SATURATED HYDROCARBON	38.88	16	J
20.	LONG CHAIN SAT. HYDROCARBON	40.37	15	J

0065

EPA SAMPLE NO.

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

MW15CD

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047418Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 10/15/93Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 10/19/93Concentrated Extract Volume: 10000 (uL)Date Analyzed: 11/05/93Injection Volume: 1.00 (uL)Dilution Factor: 10.0GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) <u>UG/L</u>	Q
319-84-6-----	alpha-BHC	5.1	
319-85-7-----	beta-BHC	1.4	
319-86-8-----	delta-BHC	0.19	J
58-89-9-----	gamma-BHC (Lindane)	2.0	
76-44-8-----	Heptachlor	0.50	U
309-00-2-----	Aldrin	0.50	U
1024-57-3-----	Heptachlor epoxide	0.50	U
959-98-8-----	Endosulfan I	1.0	U
60-57-1-----	Dieldrin	1.0	U
72-55-9-----	4,4'-DDE	1.0	U
72-20-8-----	Endrin	1.0	U
33213-65-9-----	Endosulfan II	1.0	U
72-54-8-----	4,4'-DDD	1.0	U
1031-07-8-----	Endosulfan sulfate	1.0	U
50-29-3-----	4,4'-DDT	5.0	U
72-43-5-----	Methoxychlor	1.0	U
53494-70-5-----	Endrin ketone	1.0	U
7421-93-4-----	Endrin aldehyde	0.50	U
5103-71-9-----	alpha-Chlordane	0.50	U
5103-74-2-----	gamma-Chlordane	50	U
8001-35-2-----	Toxaphene	10	U
12674-11-2-----	Aroclor-1016	20	U
11104-28-2-----	Aroclor-1268	10	U
11141-16-5-----	Aroclor-1232	10	U
53469-21-9-----	Aroclor-1242	10	U
12672-29-6-----	Aroclor-1248	10	U
11097-69-1-----	Aroclor-1254	10	U
11096-82-5-----	Aroclor-1260	10	U

1826

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

1

MW-15CD

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650R
I b Code: RECNY Case No.: 4820 SAS No.: SDG No.: OLINSP
Matrix (soil/water): WATER Lab Sample ID: 7418
Level (low/med): LOW Date Received: 10/15/93
% Solids: 0.0

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

Color Before: _____
Color After: _____

Clarity Before: _____
Clarity After: _____

Texture: _____
Artifacts: _____

Comments:

LAB SAMPLE ID: AS047418-ST000836

10023

EPA SAMPLE NO.

1B

SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

MW19A

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047416Sample wt/vol: 1000 (g/mL) MLLab File ID: 13844WLevel: (low/med) LOWDate Received: 10/15/93% Moisture: _____ decanted: (Y/N) Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND			
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	-Dimethyl Phthalate	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	

10024

EPA SAMPLE NO.

1C

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

MW19A

Lab Name: RECRA ENVIRON

Contract: NY93-577

Lab Code: RECNY

Case No.: 4820

SAS No.: _____

SDG No.: OLINSP

Matrix: (soil/water) WATER

Lab Sample ID: AS047416

Sample wt/vol: 1000 (g/mL) ML

Lab File ID: 13844W

Level: (low/med) LOW

Date Received: 10/15/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/19/93

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 11/03/93

Injection Volume: 2.0 (uL)

Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND		
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	BJ
117-84-0-----	Di-n-Octyl Phthalate	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

1X
ORGANICS ANALYSIS DATA SHEET

SAMPLE NO.

MW19A

Lab Name: RECRA ENVIRON

Contract: NY93-577

Lab Code: RECNY Case No.: 4820

SAS No.: _____ SDG No.: OLINSP

Matrix: (soil/water) WATER

Lab Sample ID: AS047416

Sample wt/vol: 1000 (g/mL) ML

Lab File ID: 13844W

Level: (low/med) LOW

Date Received: 10/15/93

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 10/19/93

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 11/03/93

Injection Volume: 2.0 (uL)

Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

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

Q

CAS NO.	COMPOUND	10	U
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

YUUC6

EPA SAMPLE NO.

1F
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

MW19A

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047416Sample wt/vol: 1000 (g/mL) MLLab File ID: 13844WLevel: (low/med) LOWDate Received: 10/15/93* Moisture: _____ decanted: (Y/N) Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

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

Number TICs found: 2

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1. 10544-50-0	SULFUR	27.13	4	JN
2.	UNKNOWN	34.88	2	J

30056

EPA SAMPLE NO.

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

MW19A

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047416Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 10/15/93Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 10/19/93Concentrated Extract Volume: 10000 (uL)Date Analyzed: 11/05/93Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) <u>UG/L</u>	Q
319-84-6-----	alpha-BHC	0.024	J
319-85-7-----	beta-BHC	0.14	
319-86-8-----	delta-BHC	0.050	U
58-89-9-----	gamma-BHC (Lindane)	0.050	U
76-44-8-----	Heptachlor	0.050	U
309-00-2-----	Aldrin	0.050	U
1024-57-3-----	Heptachlor epoxide	0.050	U
959-98-8-----	Endosulfan I	0.050	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
7421-93-4-----	Endrin aldehyde	0.10	U
5103-71-9-----	alpha-Chlordane	0.050	U
5103-74-2-----	gamma-Chlordane	0.050	U
8001-35-2-----	Toxaphene	5.0	U
12674-11-2-----	Aroclor-1016	1.0	U
11104-28-2-----	Aroclor-1268	2.0	
11141-16-5-----	Aroclor-1232	1.0	U
53469-21-9-----	Aroclor-1242	1.0	U
12672-29-6-----	Aroclor-1248	1.0	U
11097-69-1-----	Aroclor-1254	1.0	U
11096-82-5-----	Aroclor-1260	1.0	U

1827

U.S. EPA - CLP

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

MW-19A

Lab Name: RECR ENVIRONMENTAL INC. Contract: NY93-650R SDG No.: OLINSP
I b Code: RECNY Case No.: 4820 SAS No.: Lab Sample ID: 7416
Matrix (soil/water): WATER Date Received: 10/15/93
Level (low/med): LOW
Solids: 0.0

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

Color Before: _____
Color After: _____

Clarity Before: _____
Clarity After: _____

Texture: _____
Artifacts: _____

Comments:

TAB SAMPLE ID: AS047416-ST000836

1B

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

MW19B

Lab Name: RECRA ENVIRON

Contract: NY93-577

Lab Code: RECNY Case No.: 4820

SAS No.: SDG No.: OLINSP

Matrix: (soil/water) WATER

Lab Sample ID: AS047417

Sample wt/vol: 1000 (g/mL) ML

Lab File ID: 13845W

Level: (low/med) LOW

Date Received: 10/15/93

% Moisture: decanted: (Y/N)

Date Extracted: 10/19/93

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 11/03/93

Injection Volume: 2.0 (uL)

Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND			
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	1	J	
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-----	Dimethyl Phthalate	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	

JUULZ8

EPA SAMPLE NO.

1C
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

MW19B

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047417Sample wt/vol: 1000 (g/mL) MLLab File ID: 13845WLevel: (low/med) LOWDate Received: 10/15/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND			
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	0.4	J	
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	BJ	
117-84-0-----	Di-n-Octyl Phthalate	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	

1X
ORGANICS ANALYSIS DATA SHEET

SAMPLE NO.

Lab Name: RECRA ENVIRONContract: NY93-577

MW19B

Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047417Sample wt/vol: 1000 (g/mL) MLLab File ID: 13845WLevel: (low/med) LOWDate Received: 10/15/93% Moisture: _____ decanted: (Y/N) NDate Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q	
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

70030

EPA SAMPLE NO.

1F
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

MW19B

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820 SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047417Sample wt/vol: 1000 (g/mL) MLLab File ID: 13845WLevel: (low/med) LOWDate Received: 10/15/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/LNumber TICs found: 1

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	UNKNOWN	34.88	3	J

10067

EPA SAMPLE NO.

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

MW19B

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820 SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATER Lab Sample ID: AS047417Sample wt/vol: 1000 (g/mL) ML Lab File ID: _____% Moisture: _____ decanted: (Y/N) _____ Date Received: 10/15/93Extraction: (SepF/Cont/Sonc) SEPF Date Extracted: 10/19/93Concentrated Extract Volume: 10000 (uL) Date Analyzed: 11/05/93Injection Volume: 1.00 (uL) Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0 Sulfur Cleanup: (Y/N) NCONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q
319-84-6-----	alpha-BHC	0.025 J
319-85-7-----	beta-BHC	0.23
319-86-8-----	delta-BHC	0.050 U
58-89-9-----	gamma-BHC (Lindane)	0.050 U
76-44-8-----	Heptachlor	0.050 U
309-00-2-----	Aldrin	0.050 U
1024-57-3-----	Heptachlor epoxide	0.050 U
959-98-8-----	Endosulfan I	0.050 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
7421-93-4-----	Endrin aldehyde	0.10 U
5103-71-9-----	alpha-Chlordane	0.050 U
5103-74-2-----	gamma-Chlordane	0.050 U
8001-35-2-----	Toxaphene	5.0 U
12674-11-2-----	Aroclor-1016	1.0 U
11104-28-2-----	Aroclor-1268	2.0 U
11141-16-5-----	Aroclor-1232	1.0 U
53469-21-9-----	Aroclor-1242	1.0 U
12672-29-6-----	Aroclor-1248	1.0 U
11097-69-1-----	Aroclor-1254	1.0 U
11096-82-5-----	Aroclor-1260	1.0 U

1

INORGANIC ANALYSES DATA SHEET

EPA SAMPLE NO.

MW-19B

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650R
I.b Code: RECNY Case No.: 4820 SAS No.: SDG No.: OLINSP
Matrix (soil/water): WATER Lab Sample ID: 7417
Level (low/med): LOW Date Received: 10/15/93
% Solids: 0.0

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

Color Before: _____
Color After: _____

Clarity Before: _____
Clarity After: _____

Texture: _____
Artifacts: _____

Comments:

LAB SAMPLE ID: AS047417-ST000836

1B

SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

QA1

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047419Sample wt/vol: 1000 (g/mL) MLLab File ID: 13854WLevel: (low/med) LOWDate Received: 10/15/93% Moisture: _____ decanted: (Y/N) Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	10	U
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-----	Dimethyl Phthalate	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

70050

EPA SAMPLE NO.

1C

SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

QA1

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047419Sample wt/vol: 1000 (g/mL) MLLab File ID: 13854WLevel: (low/med) LOWDate Received: 10/15/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	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-----	Phanthrene	10 U
120-12-7-----	Anthracene	10 U
86-74-8-----	Carbazole	10 U
84-74-2-----	Di-n-Butylphthalate	0.5 J
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 BJ
117-84-0-----	Di-n-Octyl Phthalate	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

1X
ORGANICS ANALYSIS DATA SHEET

SAMPLE NO.

Lab Name: RECRA ENVIRON

Contract: NY93-577

QA1

Lab Code: RECNY Case No.: 4820

SAS No.: _____ SDG No.: OLINSP

Matrix: (soil/water) WATER

Lab Sample ID: AS047419

Sample wt/vol: 1000 (g/mL) ML

Lab File ID: 13854W

Level: (low/med) LOW

Date Received: 10/15/93

* Moisture: _____ decanted: (Y/N) N

Date Extracted: 10/19/93

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 11/03/93

Injection Volume: 2.0 (uL)

Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

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

Q

CAS NO.	COMPOUND	10	U
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

1F
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

QA1

Lab Name: RECRA ENVIRON Contract: NY93-577

Lab Code: RECNY Case No.: 4820 SAS No.: _____ SDG No.: OLINSP

Matrix: (soil/water) WATER Lab Sample ID: AS047419

Sample wt/vol: 1000 (g/mL) ML Lab File ID: 13854W

Level: (low/med) LOW Date Received: 10/15/93

% Moisture: _____ decanted: (Y/N) _____ Date Extracted: 10/19/93

Concentrated Extract Volume: 1000 (uL) Date Analyzed: 11/03/93

Injection Volume: 2.0 (uL) Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

Number TICs found: 1

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	UNKNOWN	34.83	2	J

10075

EPA SAMPLE NO.

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

QA1

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047419Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 10/15/93Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 10/19/93Concentrated Extract Volume: 10000 (uL)Date Analyzed: 11/05/93Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) <u>UG/L</u>	Q
319-84-6-----	alpha-BHC	0.036	J
319-85-7-----	beta-BHC	0.24	
319-86-8-----	delta-BHC	0.050	U
58-89-9-----	gamma-BHC (Lindane)	0.013	J
76-44-8-----	Heptachlor	0.050	U
309-00-2-----	Aldrin	0.050	U
1024-57-3-----	Heptachlor epoxide	0.050	U
959-98-8-----	Endosulfan I	0.050	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
7421-93-4-----	Endrin aldehyde	0.10	U
5103-71-9-----	alpha-Chlordane	0.050	U
5103-74-2-----	gamma-Chlordane	0.050	U
8001-35-2-----	Toxaphene	5.0	U
12674-11-2-----	Aroclor-1016	1.0	U
11104-28-2-----	Aroclor-1268	2.0	U
11141-16-5-----	Aroclor-1232	1.0	U
53469-21-9-----	Aroclor-1242	1.0	U
12672-29-6-----	Aroclor-1248	1.0	U
11097-69-1-----	Aroclor-1254	1.0	U
11096-82-5-----	Aroclor-1260	1.0	U

1836

INORGANIC ANALYSES DATA SHEET

EPA SAMPLE NO.

QA-1

Lab Name: RECRA_ENVIRONMENTAL_INC. Contract: NY93-650R
Lab Code: RECNY Case No.: 4820 SAS No.: SDG No.: OLINSP
Matrix (soil/water): WATER Lab Sample ID: 7419
Level (low/med): LOW Date Received: 10/15/93
% Solids: 0.0

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

Color Before: _____
Color After: _____

Clarity Before: _____
Clarity After: _____

Texture: _____
Artifacts: _____

Comments:

LAB SAMPLE ID: AS047419-ST000836

1B
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

MW19CD1

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047415Sample wt/vol: 1000 (g/mL) MLLab File ID: 13843WLevel: (low/med) LOWDate Received: 10/15/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND	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	1 J
106-46-7-----	1,4-Dichlorobenzene	1 J
95-50-1-----	1,2-Dichlorobenzene	2 J
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	1 J
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	6 J
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-----	Dimethyl Phthalate	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
SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

MW19CD1

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047415Sample wt/vol: 1000 (g/mL) MLLab File ID: 13843WLevel: (low/med) LOWDate Received: 10/15/93

* Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND			
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	0.4	J	
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	9	BJ	
117-84-0-----	Di-n-Octyl Phthalate	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	

10033
SAMPLE NO.1X
ORGANICS ANALYSIS DATA SHEETLab Name: RECRA ENVIRONContract: NY93-577

MW19CD1

Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047415Sample wt/vol: 1000 (g/mL) MLLab File ID: 13843WLevel: (low/med) LOWDate Received: 10/15/93% Moisture: _____ decanted: (Y/N) NDate Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	10	U
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

EPA SAMPLE NO.

1F
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: RECRA ENVIRONContract: NY93-577MW19CD1Lab Code: RECNY Case No.: 4820 SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047415Sample wt/vol: 1000 (g/mL) MLLab File ID: 13843WLevel: (low/med) LOWDate Received: 10/15/93% Moisture: _____ decanted: (Y/N) Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

Number TICs found: 11(ug/L or ug/Kg) UG/L

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	UNKNOWN	9.05	49	J
2. 872-50-4	1-METHYL-2-PYRROLIDINONE	10.13	10	JN
3.	UNKNOWN	10.95	4	J
4. 42769-38-0	1134TETRACHLORO13BUTADIENE	12.13	2	JN
5.	ALKYLSUBSTITUTED COMPOUND	19.08	2	J
6.	SULFUR COMPOUND	21.73	4	J
7.	UNKNOWN	27.05	7	J
8. 10544-50-0	SULFUR	27.13	4	JN
9.	UNKNOWN	27.95	3	J
10.	UNKNOWN	32.25	3	J
11.	UNKNOWN	36.70	3	J

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

MW19CD1

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047415Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 10/15/93Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 10/19/93Concentrated Extract Volume: 10000 (uL)Date Analyzed: 11/05/93Injection Volume: 1.00 (uL)Dilution Factor: 5.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) <u>UG/L</u>	Q
319-84-6-----	alpha-BHC	2.2	
319-85-7-----	beta-BHC	0.31	
319-86-8-----	delta-BHC	0.098	J
58-89-9-----	gamma-BHC (Lindane)	0.80	
76-44-8-----	Heptachlor	0.25	U
309-00-2-----	Aldrin	0.25	U
1024-57-3-----	Heptachlor epoxide	0.25	U
959-98-8-----	Endosulfan I	0.25	U
60-57-1-----	Dieldrin	0.50	U
72-55-9-----	4,4'-DDE	0.50	U
72-20-8-----	Endrin	0.50	U
33213-65-9-----	Endosulfan II	0.50	U
72-54-8-----	4,4'-DDD	0.50	U
1031-07-8-----	Endosulfan sulfate	0.50	U
50-29-3-----	4,4'-DDT	0.50	U
72-43-5-----	Methoxychlor	2.5	U
53494-70-5-----	Endrin ketone	0.50	U
7421-93-4-----	Endrin aldehyde	0.50	U
5103-71-9-----	alpha-Chlordane	0.25	U
5103-74-2-----	gamma-Chlordane	0.25	U
8001-35-2-----	Toxaphene	25	U
12674-11-2-----	Aroclor-1016	5.0	U
11104-28-2-----	Aroclor-1268	10	U
11141-16-5-----	Aroclor-1232	5.0	U
53469-21-9-----	Aroclor-1242	5.0	U
12672-29-6-----	Aroclor-1248	5.0	U
11097-69-1-----	Aroclor-1254	5.0	U
11096-82-5-----	Aroclor-1260	5.0	U

319-84-6-----	alpha-BHC	2.2	
319-85-7-----	beta-BHC	0.31	
319-86-8-----	delta-BHC	0.098	J
58-89-9-----	gamma-BHC (Lindane)	0.80	
76-44-8-----	Heptachlor	0.25	U
309-00-2-----	Aldrin	0.25	U
1024-57-3-----	Heptachlor epoxide	0.25	U
959-98-8-----	Endosulfan I	0.25	U
60-57-1-----	Dieldrin	0.50	U
72-55-9-----	4,4'-DDE	0.50	U
72-20-8-----	Endrin	0.50	U
33213-65-9-----	Endosulfan II	0.50	U
72-54-8-----	4,4'-DDD	0.50	U
1031-07-8-----	Endosulfan sulfate	0.50	U
50-29-3-----	4,4'-DDT	0.50	U
72-43-5-----	Methoxychlor	2.5	U
53494-70-5-----	Endrin ketone	0.50	U
7421-93-4-----	Endrin aldehyde	0.50	U
5103-71-9-----	alpha-Chlordane	0.25	U
5103-74-2-----	gamma-Chlordane	0.25	U
8001-35-2-----	Toxaphene	25	U
12674-11-2-----	Aroclor-1016	5.0	U
11104-28-2-----	Aroclor-1268	10	U
11141-16-5-----	Aroclor-1232	5.0	U
53469-21-9-----	Aroclor-1242	5.0	U
12672-29-6-----	Aroclor-1248	5.0	U
11097-69-1-----	Aroclor-1254	5.0	U
11096-82-5-----	Aroclor-1260	5.0	U

1829

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

1

MW-19CD

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650R
Lab Code: RECNY Case No.: 4820 SAS No.: SDG No.: OLINSP
Matrix (soil/water): WATER Lab Sample ID: 7415
Level (low/med): LOW Date Received: 10/15/93
Solids: 0.0

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

Color Before: _____
Color After: _____

Clarity Before: _____
Clarity After: _____

Texture: _____
Artifacts: _____

Comments:

LAB SAMPLE ID: AS047415-ST000836
CLIENT SAMPLE ID: MW-19CD-1

1B
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

MW20B

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047414Sample wt/vol: 1000 (g/mL) MLLab File ID: 13842WLevel: (low/med) LOWDate Received: 10/15/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND	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	1 J
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	5 J
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	3 J
77-47-4-----	Hexachlorocyclopentadiene	10 U
88-06-2-----	2,4,6-Trichlorophenol	2 J
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-----	Dimethyl Phthalate	10 U
208-96-8-----	Acenaphthylene	2 J
606-20-2-----	2,6-Dinitrotoluene	10 U
99-09-2-----	3-Nitroaniline	25 U
83-32-9-----	Acenaphthene	0.7 J

1C

SEMITVOLATILE ORGANICS ANALYSIS DATA SHEET

MW20B

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047414Sample wt/vol: 1000 (g/mL) MLLab File ID: 13842WLevel: (low/med) LOWDate Received: 10/15/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND	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	1 J
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	2 J
120-12-7-----	Anthracene	0.7 J
86-74-8-----	Carbazole	10 U
84-74-2-----	Di-n-Butylphthalate	10 U
206-44-0-----	Fluoranthene	1 J
129-00-0-----	Pyrene	1 J
85-68-7-----	Butylbenzylphthalate	10 U
91-94-1-----	3,3'-Dichlorobenzidine	10 U
56-55-3-----	Benzo(a)Anthracene	0.5 J
218-01-9-----	Chrysene	0.4 J
117-81-7-----	Bis(2-Ethylhexyl)Phthalate	2 BJ
117-84-0-----	Di-n-Octyl Phthalate	10 U
205-99-2-----	Benzo(b)Fluoranthene	0.4 J
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

1X
ORGANICS ANALYSIS DATA SHEET

SAMPLE NO.

MW20B

Lab Name: RECRA ENVIRON

Contract: NY93-577

Lab Code: RECNY Case No.: 4820

SAS No.: _____ SDG No.: OLINSP

Matrix: (soil/water) WATER

Lab Sample ID: AS047414

Sample wt/vol: 1000 (g/mL) ML

Lab File ID: 13842W

Level: (low/med) LOW

Date Received: 10/15/93

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 10/19/93

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 11/03/93

Injection Volume: 2.0 (uL)

Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

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

Q

CAS NO.	COMPOUND	10	U
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

1F
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

MW20B

Lab Name: RECRA ENVIRON

Contract: NY93-577

Lab Code: RECNY Case No.: 4820

SAS No.: _____ SDG No.: OLINSP

Matrix: (soil/water) WATER

Lab Sample ID: AS047414

Sample wt/vol: 1000 (g/mL) ML

Lab File ID: 13842W

Level: (low/med) LOW

Date Received: 10/15/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/19/93

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 11/03/93

Injection Volume: 2.0 (uL)

Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

Number TICs found: 6

(ug/L or ug/Kg) UG/L

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1. 621-62-5	2-CHLORO1,1-DIETHOXYETHANE	7.78	3	JN
2. 619-33-0	1,1DICHLOORO2,2DIETHOXYETHANE	10.43	28	JN
3.	UNKNOWN ESTER	10.83	22	J
4.	AROMATIC DERIVATIVE	15.82	3	J
5.	UNKNOWN	21.87	3	J
6.	UNKNOWN	25.78	4	J

J0069

EPA SAMPLE NO.

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

MW20B

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS047414Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 10/15/93Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 10/19/93Concentrated Extract Volume: 10000 (uL)Date Analyzed: 11/05/93Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) N

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q
319-84-6-----	alpha-BHC	0.050 U
319-85-7-----	beta-BHC	0.050 U
319-86-8-----	delta-BHC	0.050 U
58-89-9-----	gamma-BHC (Lindane)	0.050 U
76-44-8-----	Heptachlor	0.050 U
309-00-2-----	Aldrin	0.050 U
1024-57-3-----	Heptachlor epoxide	0.050 U
959-98-8-----	Endosulfan I	0.050 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
7421-93-4-----	Endrin aldehyde	0.10 U
5103-71-9-----	alpha-Chlordane	0.050 U
5103-74-2-----	gamma-Chlordane	0.050 U
8001-35-2-----	Toxaphene	5.0 U
12674-11-2-----	Aroclor-1016	1.0 U
11104-28-2-----	Aroclor-1268	2.0 U
11141-16-5-----	Aroclor-1232	1.0 U
53469-21-9-----	Aroclor-1242	1.0 U
12672-29-6-----	Aroclor-1248	1.0 U
11097-69-1-----	Aroclor-1254	1.0 U
11096-82-5-----	Aroclor-1260	1.0 U

11830

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

MW-20B

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650R_ SDG No.: OLINSP
Lab Code: RECNY Case No.: 4820 SAS No.: _____
Medium (soil/water): WATER Lab Sample ID: 7414
Level (low/med): LOW Date Received: 10/15/93
Solids: 0.0

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

Color Before: _____

Clarity Before: _____
Clarity After: _____

Texture: _____
Artifacts: _____

Comments:

LAB SAMPLE ID: AS047414-ST000836

10039

EPA SAMPLE NO.

1B
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

MW22B

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048368Sample wt/vol: 1000 (g/mL) MLLab File ID: 13868WLevel: (low/med) LOWDate Received: 10/29/93% Moisture: _____ decanted: (Y/N) Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/04/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND		
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-----	Dimethyl Phthalate	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

0040

EPA SAMPLE NO.

1C

SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

MW22B

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048368Sample wt/vol: 1000 (g/mL) MLLab File ID: 13868WLevel: (low/med) LOWDate Received: 10/29/93

* Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/04/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	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	0.8 J
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	0.6 J
218-01-9-----	Chrysene	3 J
117-81-7-----	Bis(2-Ethylhexyl) Phthalate	7 J
117-84-0-----	Di-n-Octyl Phthalate	10 U
205-99-2-----	Benzo(b)Fluoranthene	2 J
207-08-9-----	Benzo(k)Fluoranthene	0.7 J
50-32-8-----	Benzo(a)Pyrene	0.4 J
193-39-5-----	Indeno(1,2,3-cd)Pyrene	0.5 J
53-70-3-----	Dibenz(a,h)Anthracene	10 U
191-24-2-----	Benzo(g,h,i)Perylene	0.4 J

1X
ORGANICS ANALYSIS DATA SHEET

SAMPLE NO.

MW22B

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048368Sample wt/vol: 1000 (g/mL) MLLab File ID: 13868WLevel: (low/med) LOWDate Received: 10/29/93% Moisture: _____ decanted: (Y/N) NDate Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/04/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q	
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

**SEMICVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS**

MW22B

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820 SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048368Sample wt/vol: 1000 (g/mL) MLLab File ID: 13868WLevel: (low/med) LOWDate Received: 10/29/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/04/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

Number TICs found: 7(ug/L or ug/Kg) UG/L

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	UNKNOWN	5.92	45	BJ
2.	CYCLOHEXEN-1-OL ISOMER	6.72	17	BJ
3. 930-68-7	2-CYCLOHEXEN-1-ONE	7.68	8	JN
4.	DICHLOROCYCLOHEXANE ISOMER	10.90	4	J
5.	BROMOCYCLOHEXANOL ISOMER	11.78	23	J
6.	UNKNOWN	15.17	2	J
7.	UNKNOWN	19.90	3	J

J0070

EPA SAMPLE NO.

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

MW22B

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048368Sample wt/vol: 800.0 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) Date Received: 10/29/93Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 11/03/93Concentrated Extract Volume: 10000 (uL)Date Analyzed: 11/11/93Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) YCONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q
319-84-6-----	alpha-BHC	0.062 U
319-85-7-----	beta-BHC	0.062 U
319-86-8-----	delta-BHC	0.062 U
58-89-9-----	gamma-BHC (Lindane)	0.062 U
76-44-8-----	Heptachlor	0.062 U
309-00-2-----	Aldrin	0.062 U
1024-57-3-----	Heptachlor epoxide	0.062 U
959-98-8-----	Endosulfan I	0.062 U
60-57-1-----	Dieldrin	0.12 U
72-55-9-----	4, 4'-DDE	0.12 U
72-20-8-----	Endrin	0.12 U
33213-65-9-----	Endosulfan II	0.12 U
72-54-8-----	4, 4'-DDD	0.12 U
1031-07-8-----	Endosulfan sulfate	0.12 U
50-29-3-----	4, 4'-DDT	0.12 U
72-43-5-----	Methoxychlor	0.62 U
53494-70-5-----	Endrin ketone	0.12 U
7421-93-4-----	Endrin aldehyde	0.12 U
5103-71-9-----	alpha-Chlordane	0.062 U
5103-74-2-----	gamma-Chlordane	0.062 U
8001-35-2-----	Toxaphene	6.2 U
12674-11-2-----	Aroclor-1016	1.2 U
11104-28-2-----	Aroclor-1268	2.5 U
11141-16-5-----	Aroclor-1232	1.2 U
53469-21-9-----	Aroclor-1242	1.2 U
12672-29-6-----	Aroclor-1248	1.2 U
11097-69-1-----	Aroclor-1254	1.2 U
11096-82-5-----	Aroclor-1260	1.2 U

1

INORGANIC ANALYSES DATA SHEET

EPA SAMPLE NO.

MW-22B

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650R
Lab Code: RECNY Case No.: 4820 SAS No.: SDG No.: OLINSP
Matrix (soil/water): WATER Lab Sample ID: 8368
Level (low/med): LOW Date Received: 10/29/93
% Solids: 0.0

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

Color Before: _____
Color After: _____

Clarity Before: _____
Clarity After: _____

Texture: _____
Artifacts: _____

Comments:

LAB SAMPLE ID: AS048368-ST000836

10043

EPA SAMPLE NO.

1B

SEMICVOLATILE ORGANICS ANALYSIS DATA SHEET

MW22C

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048365Sample wt/vol: 1000 (g/mL) MLLab File ID: 13865WLevel: (low/med) LOWDate Received: 10/29/93% Moisture: _____ decanted: (Y/N) Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

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	7	J	
106-46-7-----	1,4-Dichlorobenzene	2	J	
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	2	J	
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-----	Dimethyl Phthalate	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
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

MW22C

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048365Sample wt/vol: 1000 (g/mL) MLLab File ID: 13865WLevel: (low/med) LOWDate Received: 10/29/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND	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	0.4 J
120-12-7-----	Anthracene	10 U
86-74-8-----	Carbazole	0.8 J
84-74-2-----	Di-n-Butylphthalate	10 U
206-44-0-----	Fluoranthene	1 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	0.6 J
218-01-9-----	Chrysene	6 U
117-81-7-----	Bis(2-Ethylhexyl)Phthalate	10 U
117-84-0-----	Di-n-Octyl Phthalate	0.5 J
205-99-2-----	Benzo(b)Fluoranthene	0.2 J
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

0045

SAMPLE NO.

1X
ORGANICS ANALYSIS DATA SHEET

MW22C

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048365Sample wt/vol: 1000 (g/mL) MLLab File ID: 13865WLevel: (low/med) LOWDate Received: 10/29/93% Moisture: _____ decanted: (Y/N) NDate Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q
108-43-0-----	3-Chlorophenol	10 U
106-48-9-----	4-Chlorophenol	10 U
576-24-9-----	2,3-Dichlorophenol	10 U
583-78-8-----	2,5-Dichlorophenol	10 U
95-77-2-----	3,4-Dichlorophenol	1 J
591-35-5-----	3,5-Dichlorophenol	10 U
15950-66-0-----	2,3,4-Trichlorophenol	10 U
933-78-8-----	2,3,5-Trichlorophenol	10 U
933-75-5-----	2,3,6-Trichlorophenol	10 U
609-19-8-----	3,4,5-Trichlorophenol	10 U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10 U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10 U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10 U

10046

EPA SAMPLE NO.

1F

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

MW22C

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048365Sample wt/vol: 1000 (g/mL) MLLab File ID: 13865WLevel: (low/med) LOWDate Received: 10/29/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

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

Number TICs found: 20

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	UNKNOWN	5.92	13	BJ
2.	CYCLOHEXEN-1-OL ISOMER	6.68	7	BJ
3.	CHLOROMETHYLBENZENE ISOMER	8.15	13	J
4.	CHLOROMETHYLBENZENE ISOMER	8.32	3	J
5.	NITROGEN COMPOUND	9.30	8	J
6. 872-50-4	1-METHYL-2-PYRROLIDINONE	10.13	9	JN
7.	DICHLOROCYCLOHEXANE ISOMER	10.90	4	J
8.	UNKNOWN	12.50	2	J
9.	SULFUR COMPOUND	14.13	3	J
10.	UNKNOWN	14.28	5	J
11.	UNKNOWN	15.82	4	J
12.	UNKNOWN	18.08	5	J
13.	UNKNOWN	19.37	13	J
14.	SULFUR COMPOUND	21.75	5	J
15.	UNKNOWN	24.57	4	J
16.	UNKNOWN	25.58	7	J
17.	UNKNOWN	27.72	5	J
18.	UNKNOWN	27.78	3	J
19.	UNKNOWN	27.90	3	J
20.	UNKNOWN	28.07	5	J

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

MW22C

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820 SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048365Sample wt/vol: 990.0 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 10/29/93Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 11/03/93Concentrated Extract Volume: 10000 (uL) Date Analyzed: 11/11/93Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) Y

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q
319-84-6-----	alpha-BHC	0.020 J
319-85-7-----	beta-BHC	0.050 U
319-86-8-----	delta-BHC	0.050 U
58-89-9-----	gamma-BHC (Lindane)	0.018 JP
76-44-8-----	Heptachlor	0.050 U
309-00-2-----	Aldrin	0.050 U
1024-57-3-----	Heptachlor epoxide	0.050 U
959-98-8-----	Endosulfan I	0.050 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
7421-93-4-----	Endrin aldehyde	0.10 U
5103-71-9-----	alpha-Chlordane	0.050 U
5103-74-2-----	gamma-Chlordane	0.050 U
8001-35-2-----	Toxaphene	5.0 U
12674-11-2-----	Aroclor-1016	1.0 U
11104-28-2-----	Aroclor-1268	2.0 U
11141-16-5-----	Aroclor-1232	1.0 U
53469-21-9-----	Aroclor-1242	1.0 U
12672-29-6-----	Aroclor-1248	1.0 U
11097-69-1-----	Aroclor-1254	1.0 U
11096-82-5-----	Aroclor-1260	1.0 U

U.S. EPA - CLP

91832

INORGANIC ANALYSES DATA SHEET

1

EPA SAMPLE NO.

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650R
Lab Code: RECNY Case No.: 4820 SAS No.: SDG No.: OLINSP
Matrix (soil/water): WATER Lab Sample ID: 8365
Level (low/med): LOW Date Received: 10/29/93
Solids: 0.0

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

Color Before: _____
Color After: _____

Clarity Before: _____
Clarity After: _____

Texture: _____
Artifacts: _____

Comments:

LAB SAMPLE ID: AS048365-ST000836

10047

EPA SAMPLE NO.

1B

SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

MW22D

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048366Sample wt/vol: 1000 (g/mL) MLLab File ID: 13866WLevel: (low/med) LOWDate Received: 10/29/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO. COMPOUND

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	5	J
91-20-3-----	Naphthalene	10	U
106-47-8-----	4-Chloroaniline	10	U
87-68-3-----	Hexachlorobutadiene	1	J
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-----	Dimethyl Phthalate	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

0048

EPA SAMPLE NO.

1C

SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

MW22D

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048366Sample wt/vol: 1000 (g/mL) MLLab File ID: 13866WLevel: (low/med) LOWDate Received: 10/29/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND		
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	0.9	J
120-12-7-----	Anthracene	10	U
86-74-8-----	Carbazole	0.9	J
84-74-2-----	Di-n-Butylphthalate	10	U
206-44-0-----	Fluoranthene	1	J
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	11	U
117-84-0-----	Di-n-Octyl Phthalate	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

1X
ORGANICS ANALYSIS DATA SHEET

SAMPLE NO.

Lab Name: RECRA ENVIRONContract: NY93-577

MW22D

Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048366Sample wt/vol: 1000 (g/mL) MLLab File ID: 13866WLevel: (low/med) LOWDate Received: 10/29/93% Moisture: _____ decanted: (Y/N) NDate Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND		
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

10050

EPA SAMPLE NO.

1F
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

MW22D

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048366Sample wt/vol: 1000 (g/mL) MLLab File ID: 13866WLevel: (low/med) LOWDate Received: 10/29/93% Moisture: _____ decanted: (Y/N) Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/LNumber TICs found: 20

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	CYCLOHEXEN-1-OL ISOMER	6.72	15	BJ
2. 930-68-7	2-CYCLOHEXEN-1-ONE	7.68	5	JN
3.	CHLORINATED COMPOUND	8.05	3	J
4.	NITROGEN COMPOUND	9.30	7	J
5. 872-50-4	1-METHYL-2-PYRROLIDINONE	10.17	19	JN
6.	DICHLOROCYCLOHEXANE ISOMER	10.90	6	J
7.	UNKNOWN	12.50	3	J
8.	SULFUR COMPOUND	14.13	3	J
9.	UNKNOWN	15.85	3	J
10.	OXYGENATED COMPOUND	16.35	3	J
11.	UNKNOWN	18.78	3	J
12.	UNKNOWN	19.38	9	J
13.	UNKNOWN ACID	20.02	10	J
14.	SULFUR COMPOUND	21.75	3	J
15.	UNKNOWN	25.63	16	J
16.	UNKNOWN	26.92	5	J
17.	UNKNOWN	27.77	18	J
18.	UNKNOWN	27.83	16	J
19.	UNKNOWN	28.13	20	J
20.	UNKNOWN	33.05	6	J

10072

EPA SAMPLE NO.

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

MW22D

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048366Sample wt/vol: 990.0 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 10/29/93Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 11/03/93Concentrated Extract Volume: 10000 (uL)Date Analyzed: 11/11/93Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) YCONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q
319-84-6-----	alpha-BHC	0.089
319-85-7-----	beta-BHC	0.017 J
319-86-8-----	delta-BHC	0.050 U
58-89-9-----	gamma-BHC (Lindane)	0.056 P
76-44-8-----	Heptachlor	0.050 U
309-00-2-----	Aldrin	0.050 U
1024-57-3-----	Heptachlor epoxide	0.050 U
959-98-8-----	Endosulfan I	0.050 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
7421-93-4-----	Endrin aldehyde	0.050 U
5103-71-9-----	alpha-Chlordane	0.050 U
5103-74-2-----	gamma-Chlordane	0.050 U
8001-35-2-----	Toxaphene	5.0 U
12674-11-2-----	Aroclor-1016	1.0 U
11104-28-2-----	Aroclor-1268	2.0 U
11141-16-5-----	Aroclor-1232	1.0 U
53469-21-9-----	Aroclor-1242	1.0 U
12672-29-6-----	Aroclor-1248	1.0 U
11097-69-1-----	Aroclor-1254	1.0 U
11096-82-5-----	Aroclor-1260	1.0 U

1833

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

MW-22D

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650R
Lab Code: RECNY Case No.: 4820 SAS No.: SDG No.: OLINSP
Matrix (soil/water): WATER Lab Sample ID: 8366
Level (low/med): LOW Date Received: 10/29/93
Solids: 0.0

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

Color Before: _____
Color After: _____

Clarity Before: _____
Clarity After: _____

Texture: _____
Artifacts: _____

Comments:

LAB SAMPLE ID: AS048366-ST000836

1B
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

MW22F

Lab Name: RECRA ENVIRON

Contract: NY93-577

Lab Code: RECNY

Case No.: 4820

SAS No.: _____

SDG No.: OLINSP

Matrix: (soil/water) WATER

Lab Sample ID: AS048367

Sample wt/vol: 1000 (g/mL) ML

Lab File ID: 13867W

Level: (low/med) LOW

Date Received: 10/29/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 11/04/93

Injection Volume: 2.0 (uL)

Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND			
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	3	J	
106-46-7-----	1,4-Dichlorobenzene	5	J	
95-50-1-----	1,2-Dichlorobenzene	12		
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	4	J	
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-----	Dimethyl Phthalate	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	

10052

EPA SAMPLE NO.

1C

SEMICVOLATILE ORGANICS ANALYSIS DATA SHEET

Lab Name: RECRA ENVIRONContract: NY93-577

MW22F

Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048367Sample wt/vol: 1000 (g/mL) MLLab File ID: 13867WLevel: (low/med) LOWDate Received: 10/29/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/04/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q
51-28-5-----	2,4-Dinitrophenol	25
100-02-7-----	4-Nitrophenol	25
132-64-9-----	Dibenzofuran	10
121-14-2-----	2,4-Dinitrotoluene	10
84-66-2-----	Diethylphthalate	10
7005-72-3-----	4-Chlorophenyl-phenylether	10
86-73-7-----	Fluorene	10
100-01-6-----	4-Nitroaniline	25
534-52-1-----	4,6-Dinitro-2-Methylphenol	25
86-30-6-----	N-Nitrosodiphenylamine (1)	10
101-55-3-----	4-Bromophenyl-phenylether	10
118-74-1-----	Hexachlorobenzene	10
87-86-5-----	Pentachlorophenol	25
85-01-8-----	Phenanthrene	0.4
120-12-7-----	Anthracene	10
86-74-8-----	Carbazole	0.6
84-74-2-----	Di-n-Butylphthalate	10
206-44-0-----	Fluoranthene	1
129-00-0-----	Pyrene	10
85-68-7-----	Butylbenzylphthalate	10
91-94-1-----	3,3'-Dichlorobenzidine	10
56-55-3-----	Benzo(a)Anthracene	10
218-01-9-----	Chrysene	0.6
117-81-7-----	Bis(2-Ethylhexyl)Phthalate	8
117-84-0-----	Di-n-Octyl Phthalate	10
205-99-2-----	Benzo(b)Fluoranthene	0.4
207-08-9-----	Benzo(k)Fluoranthene	0.2
50-32-8-----	Benzo(a)Pyrene	10
193-39-5-----	Indeno(1,2,3-cd) Pyrene	10
53-70-3-----	Dibenz(a,h)Anthracene	10
191-24-2-----	Benzo(g,h,i)Perylene	10

JU053

1X
ORGANICS ANALYSIS DATA SHEET

SAMPLE NO.

Lab Name: RECRA ENVIRONContract: NY93-577

MW22F

Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048367Sample wt/vol: 1000 (g/mL) MLLab File ID: 13867WLevel: (low/med) LOWDate Received: 10/29/93% Moisture: _____ decanted: (Y/N) NDate Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/04/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	UG/L	Q
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	0.7	J
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

30054

EPA SAMPLE NO.

1F

**SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS**

MW22F

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048367Sample wt/vol: 1000 (g/mL) MLLab File ID: 13867WLevel: (low/med) LOWDate Received: 10/29/93* Moisture: _____ decanted: (Y/N) Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/04/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/LNumber TICs found: 18

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	UNKNOWN	5.92	19	BJ
2.	CYCLOHEXEN-1-OL ISOMER	6.70	11	BJ
3. 930-68-7	2-CYCLOHEXEN-1-ONE	7.68	4	JN
4.	NITROGEN COMPOUND	9.30	3	J
5. 872-50-4	1-METHYL-2-PYRROLIDINONE	10.17	17	JN
6.	SULFUR COMPOUND	14.13	3	J
7.	SULFUR COMPOUND	14.28	6	J
8.	UNKNOWN	15.83	6	J
9.	UNKNOWN	19.35	9	J
10.	UNKNOWN	19.85	3	J
11.	UNKNOWN ACID	20.05	20	J
12.	UNKNOWN ACID	22.90	4	J
13.	UNKNOWN	24.55	4	J
14.	UNKNOWN	25.58	3	J
15.	OXYGENATED COMPOUND	26.88	4	J
16. 10544-50-0	SULFUR	27.30	19	JN
17.	OXYGENATED COMPOUND	30.12	8	J
18.	OXYGENATED COMPOUND	33.03	8	J

J0073

EPA SAMPLE NO.

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

MW22F

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048367Sample wt/vol: 975.0 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) Date Received: 10/29/93Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 11/03/93Concentrated Extract Volume: 10000 (uL)Date Analyzed: 11/11/93Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) Y

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) <u>UG/L</u>	<u>Q</u>
319-84-6-----	alpha-BHC	0.23	
319-85-7-----	beta-BHC	0.027	J
319-86-8-----	delta-BHC	0.052	U
58-89-9-----	gamma-BHC (Lindane)	0.012	JP
76-44-8-----	Heptachlor	0.052	U
309-00-2-----	Aldrin	0.052	U
1024-57-3-----	Heptachlor epoxide	0.052	U
959-98-8-----	Endosulfan I	0.052	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	0.52	U
53494-70-5-----	Endrin ketone	0.10	U
7421-93-4-----	Endrin aldehyde	0.10	U
5103-71-9-----	alpha-Chlordane	0.052	U
5103-74-2-----	gamma-Chlordane	0.052	U
8001-35-2-----	Toxaphene	5.2	U
12674-11-2-----	Aroclor-1016	1.0	U
11104-28-2-----	Aroclor-1268	2.1	U
11141-16-5-----	Aroclor-1232	1.0	U
53469-21-9-----	Aroclor-1242	1.0	U
12672-29-6-----	Aroclor-1248	1.0	U
11097-69-1-----	Aroclor-1254	1.0	U
11096-82-5-----	Aroclor-1260	1.0	U

1834

U.S. EPA - CLP

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

1

MW-22F

Lab Name: RECRA_ENVIRONMENTAL INC. Contract: NY93-650R
Lab Code: RECNY Case No.: 4820 SAS No.: _____ SDG No.: OLINSP
Matrix (soil/water): WATER Lab Sample ID: 8367
Level (low/med): LOW Date Received: 10/29/93
Solids: 0.0

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

Color Before: _____
Color After: _____

Clarity Before: _____
Clarity After: _____

Texture: _____
Artifacts: _____

Comments:

LAB SAMPLE ID: AS048367-ST000836

10055

EPA SAMPLE NO.

1B
SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

Lab Name: RECRA ENVIRONContract: NY93-577

MW26CD

Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048369Sample wt/vol: 1000 (g/mL) MLLab File ID: 13871WLevel: (low/med) LOWDate Received: 10/29/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/04/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/LQ

CAS NO.	COMPOUND			
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	0.8	J	
106-46-7-----	1,4-Dichlorobenzene	1	J	
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	5	J	
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	4	J	
91-20-3-----	Naphthalene	10	U	
106-47-8-----	4-Chloroaniline	10	U	
87-68-3-----	Hexachlorobutadiene	7	J	
59-50-7-----	4-Chloro-3-Methylphenol	10	U	
91-57-6-----	2-Methylnaphthalene	4	J	
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-----	Dimethyl Phthalate	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
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

MW26CD

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048369Sample wt/vol: 1000 (g/mL) MLLab File ID: 13871WLevel: (low/med) LOWDate Received: 10/29/93% Moisture: _____ decanted: (Y/N) Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/04/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO. COMPOUND

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)	0.5	J
101-55-3-----	4-Bromophenyl-phenylether	10	U
118-74-1-----	Hexachlorobenzene	10	U
87-86-5-----	Pentachlorophenol	25	U
85-01-8-----	Phenanthrene	0.4	J
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	6	J
117-84-0-----	Di-n-Octyl Phthalate	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

10057

SAMPLE NO.

1X
ORGANICS ANALYSIS DATA SHEET

Lab Name: RECRA ENVIRONContract: NY93-577MW26CDLab Code: RECNY Case No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048369Sample wt/vol: 1000 (g/mL) MLLab File ID: 13871WLevel: (low/med) LOWDate Received: 10/29/93% Moisture: _____ decanted: (Y/N) NDate Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/04/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	10	U
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

10058

EPA SAMPLE NO.

1F
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: RECRA ENVIRONContract: NY93-577

MW26CD

Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048369Sample wt/vol: 1000 (g/mL) MLLab File ID: 13871WLevel: (low/med) LOWDate Received: 10/29/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/04/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

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

Number TICs found: 20

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	UNKNOWN	5.92	17	BJ
2.	CYCLOHEXEN-1-OL ISOMER	6.70	7	BJ
3.	DICHLOROBUTANE ISOMER	7.17	6	J
4.	UNKNOWN	10.15	13	J
5.	POLYCHLORINATED COMPOUND	10.90	24	J
6.	11,13,4-TETRACHLORO-13-BUTADIENE	11.37	10	J
7.	UNKNOWN ACID	13.47	8	J
8.	UNKNOWN ACID	16.98	21	J
9.	OXYGENATED COMPOUND	18.43	93	J
10.	OXYGENATED COMPOUND	18.87	23	J
11.	UNKNOWN	19.33	11	J
12.	UNKNOWN ACID	20.37	120	J
13.	OXYGENATED COMPOUND	22.70	76	J
14.	UNKNOWN ACID	23.00	24	J
15.	OXYGENATED COMPOUND	23.17	10	J
16.	UNKNOWN	25.62	8	J
17.	OXYGENATED COMPOUND	26.33	26	J
18.	OXYGENATED COMPOUND	26.88	26	J
19.	OXYGENATED COMPOUND	30.17	49	J
20.	OXYGENATED COMPOUND	33.08	52	J

10074

EPA SAMPLE NO.

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

MW26CD

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048369Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 10/29/93Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 11/03/93Concentrated Extract Volume: 10000 (uL)Date Analyzed: 11/11/93Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) Y

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q
319-84-6-----	alpha-BHC	0.23
319-85-7-----	beta-BHC	0.11
319-86-8-----	delta-BHC	0.050 U
58-89-9-----	gamma-BHC (Lindane)	0.25
76-44-8-----	Heptachlor	0.050 U
309-00-2-----	Aldrin	0.050 U
1024-57-3-----	Heptachlor epoxide	0.050 U
959-98-8-----	Endosulfan I	0.050 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
7421-93-4-----	Endrin aldehyde	0.10 U
5103-71-9-----	alpha-Chlordane	0.050 U
5103-74-2-----	gamma-Chlordane	0.050 U
8001-35-2-----	Toxaphene	5.0 U
12674-11-2-----	Aroclor-1016	1.0 U
11104-28-2-----	Aroclor-1268	2.0 U
11141-16-5-----	Aroclor-1232	1.0 U
53469-21-9-----	Aroclor-1242	1.0 U
12672-29-6-----	Aroclor-1248	1.0 U
11097-69-1-----	Aroclor-1254	1.0 U
11096-82-5-----	Aroclor-1260	1.0 U

1835

U.S. EPA - CLP

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

1

I-b Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650R
I b Code: RECNY Case No.: 4820 SAS No.: SDG No.: OLINSP
Matrix (soil/water): WATER Lab Sample ID: 8369
Level (low/med): LOW Date Received: 10/29/93
% Solids: 0.0

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

Color Before: _____
Color After: _____

Clarity Before: _____
Clarity After: _____

Texture: _____
Artifacts: _____

Comments:

LAB SAMPLE ID: AS048369-ST000836

1B
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

EB1

Lab Name: RECRA ENVIRON

Contract: NY93-577

Lab Code: RECNY

Case No.: 4820

SAS No.: _____

SDG No.: OLINSP

Matrix: (soil/water) WATER

Lab Sample ID: AS048370

Sample wt/vol: 1000 (g/mL) ML

Lab File ID: 13872W

Level: (low/med) LOW

Date Received: 10/29/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 11/04/93

Injection Volume: 2.0 (uL)

Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND			
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-----	Dimethyl Phthalate	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	

SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

EB1

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048370Sample wt/vol: 1000 (g/mL) MLLab File ID: 13872WLevel: (low/med) LOWDate Received: 10/29/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/04/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND	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	0.8 J
117-84-0-----	Di-n-Octyl Phthalate	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

40009

SAMPLE NO.

1X

ORGANICS ANALYSIS DATA SHEET

EB1

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048370Sample wt/vol: 1000 (g/mL) MLLab File ID: 13872WLevel: (low/med) LOWDate Received: 10/29/93% Moisture: _____ decanted: (Y/N) NDate Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/04/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q	U
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

10010

EPA SAMPLE NO.

1F

SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

EB1

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820 SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048370Sample wt/vol: 1000 (g/mL) MLLab File ID: 13872WLevel: (low/med) LOWDate Received: 10/29/93

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/04/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/LNumber TICs found: 5

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	OXYGENATED COMPOUND	5.58	5	J
2.	UNKNOWN	5.92	38	BJ
3.	CYCLOHEXEN-1-OL ISOMER	6.70	11	BJ
4. 930-68-7	2-CYCLOHEXEN-1-ONE	7.68	3	JN
5.	DICHLOROCYCLOHEXANE ISOMER	10.90	2	J

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

EB1

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AS048370Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 10/29/93Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 11/03/93Concentrated Extract Volume: 10000 (uL)Date Analyzed: 11/11/93Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) Y

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q
319-84-6-----	alpha-BHC	0.050 U
319-85-7-----	beta-BHC	0.050 U
319-86-8-----	delta-BHC	0.050 U
58-89-9-----	gamma-BHC (Lindane)	0.050 U
76-44-8-----	Heptachlor	0.050 U
309-00-2-----	Aldrin	0.050 U
1024-57-3-----	Heptachlor epoxide	0.050 U
959-98-8-----	Endosulfan I	0.050 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
7421-93-4-----	Endrin aldehyde	0.10 U
5103-71-9-----	alpha-Chlordane	0.050 U
5103-74-2-----	gamma-Chlordane	0.050 U
8001-35-2-----	Toxaphene	5.0 U
12674-11-2-----	Aroclor-1016	1.0 U
11104-28-2-----	Aroclor-1268	2.0 U
11141-16-5-----	Aroclor-1232	1.0 U
53469-21-9-----	Aroclor-1242	1.0 U
12672-29-6-----	Aroclor-1248	1.0 U
11097-69-1-----	Aroclor-1254	1.0 U
11096-82-5-----	Aroclor-1260	1.0 U

INORGANIC ANALYSES DATA SHEET

1

EPA SAMPLE NO.

EB-1

I-b Name: RECPA ENVIRONMENTAL INC. Contract: NY93-650R
I b Code: RECNY Case No.: 4820 SAS No.: _____ SDG No.: OLINSP
Matrix (soil/water): WATER Lab Sample ID: 8370
Level (low/med): LOW Date Received: 10/29/93
% Solids: 0.0

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

Color Before: _____
Color After: _____

Clarity Before: _____
Clarity After: _____

Texture: _____
Artifacts: _____

Comments:

LAB SAMPLE ID: AS048370-ST000836

APPENDIX B-2

Olin Soil Borings

December 1993

0023

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1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB102

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): SOIL

Lab Sample ID: 3217

Level (low/med): LOW

Date Received: 12/15/93

Solids: 76.2

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	13000			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB_SAMPLE_ID: AS053217-ST000990

CLIENT_SAMPLE_ID: NSB-1(0-2)

0024

U.S. EPA - CLP

EPA SAMPLE NO.

1

INORGANIC ANALYSES DATA SHEET

NSB102

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): WATER

Lab Sample ID: 217

Level (low/med): LOW

Date Received: 12/15/93

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				CV
7439-97-6	Mercury	21.4			NR
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053217-ST001440

CLIENT SAMPLE ID: NSB-1(0-2)

TCLP EXTRACT

U.S. EPA - CLP

1

EPA SAMPLE NO. . .

INORGANIC ANALYSES DATA SHEET

NSB124

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): SOIL Lab Sample ID: 3218

Level (low/med): LOW Date Received: 12/15/93

Solids: 68.8

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	15600			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB_SAMPLE_ID: AS053218-ST000990

CLIENT_SAMPLE_ID: NSB-1(2-4)

0026

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1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB124

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): WATER

Lab Sample ID: 218

Level (low/med): LOW

Date Received: 12/15/93

Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	254			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053218-ST001440

CLIENT SAMPLE ID: NSB-1(2-4)

TCLP EXTRACT

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB146

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): SOIL

Lab Sample ID: 3219

Level (low/med): LOW

Date Received: 12/15/93

Solids: 76.9

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum		-		NR
7440-36-0	Antimony		-		NR
7440-38-2	Arsenic		-		NR
7440-39-3	Barium		-		NR
7440-41-7	Beryllium		-		NR
7440-43-9	Cadmium		-		NR
7440-70-2	Calcium		-		NR
7440-47-3	Chromium		-		NR
7440-48-4	Cobalt		-		NR
7440-50-8	Copper		-		NR
7439-89-6	Iron		-		NR
7439-92-1	Lead		-		NR
7439-95-4	Magnesium		-		NR
7439-96-5	Manganese		-		NR
7439-97-6	Mercury	186	-		CV
7440-02-0	Nickel		-		NR
7440-09-7	Potassium		-		NR
7782-49-2	Selenium		-		NR
7440-22-4	Silver		-		NR
7440-23-5	Sodium		-		NR
7440-28-0	Thallium		-		NR
7440-62-2	Vanadium		-		NR
7440-66-6	Zinc		-		NR
	Cyanide		-		NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB_SAMPLE_ID: AS053219-ST000990
CLIENT_SAMPLE_ID: NSB-1(4-6)

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB146

Lab Name: RECRE ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): WATER Lab Sample ID: 219

Level (low/med): LOW Date Received: 12/15/93

Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	577			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053219-ST001440

CLIENT SAMPLE ID: NSB-1(4-6)

TCLP EXTRACT

0037

U.S. EPA - CLP

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB168

Lab Name: RECR_A ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECN Y Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): SOIL Lab Sample ID: 3220

Level (low/med): LOW Date Received: 12/15/93

% Solids: 84.9

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	6.9			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053220-ST000990
CLIENT SAMPLE ID: NSB-1(6-8)

0038

U.S. EPA - CLP

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB168

Lab Name: RECRA_ENVIRONMENTAL_INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): WATER Lab Sample ID: 220

Level (low/med): LOW Date Received: 12/15/93

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	2.0			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053220-ST001440

CLIENT SAMPLE ID: NSB-1(6-8)

TCLP EXTRACT

0039

U.S. EPA - CLP

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB1810

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): SOIL

Lab Sample ID: 3221

Level (low/med): LOW

Date Received: 12/15/93

% Solids: 85.3

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	8.2			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053221-ST000990
CLIENT SAMPLE ID: NSB-1(8-10)

0040

U.S. EPA - CLP

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB1810

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): WATER

Lab Sample ID: 221

Level (low/med): LOW

Date Received: 12/15/93

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	2.3			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053221-ST001440

CLIENT SAMPLE ID: NSB-1(8-10)

TCLP EXTRACT

INORGANIC ANALYSES DATA SHEET

NSB424

Lab Name: RECRa ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNy Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): SOIL Lab Sample ID: 3222

Level (low/med): LOW Date Received: 12/15/93

% Solids: 88.3

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	217			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053222-ST000990
CLIENT SAMPLE ID: NSB-4 (2-4)

INORGANIC ANALYSES DATA SHEET

NSB424

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): WATER Lab Sample ID: 222

Level (low/med): LOW Date Received: 12/15/93

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	1.3			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053222-ST001440

CLIENT SAMPLE ID: NSB-4 (2-4)

TCLP EXTRACT

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB446

Lab Name: RECRE ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): SOIL Lab Sample ID: 3223

Level (low/med): LOW Date Received: 12/15/93

% Solids: 89.3

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum		-		NR
7440-36-0	Antimony		-		NR
7440-38-2	Arsenic		-		NR
7440-39-3	Barium		-		NR
7440-41-7	Beryllium		-		NR
7440-43-9	Cadmium		-		NR
7440-70-2	Calcium		-		NR
7440-47-3	Chromium		-		NR
7440-48-4	Cobalt		-		NR
7440-50-8	Copper		-		NR
7439-89-6	Iron		-		NR
7439-92-1	Lead		-		NR
7439-95-4	Magnesium		-		NR
7439-96-5	Manganese		-		NR
7439-97-6	Mercury	158	-		CV
7440-02-0	Nickel		-		NR
7440-09-7	Potassium		-		NR
7782-49-2	Selenium		-		NR
7440-22-4	Silver		-		NR
7440-23-5	Sodium		-		NR
7440-28-0	Thallium		-		NR
7440-62-2	Vanadium		-		NR
7440-66-6	Zinc		-		NR
	Cyanide		-		NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053223-ST000990
CLIENT SAMPLE ID: NSB-4 (4-6)

0044

U.S. EPA - CLP

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB446

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): WATER

Lab Sample ID: 223

Level (low/med): LOW

Date Received: 12/15/93

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	3.0			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053223-ST001440

CLIENT SAMPLE ID: NSB-4 (4-6)

TCLP EXTRACT

0045

U.S. EPA - CLP

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB468

Lab Name: RECRA_ENVIRONMENTAL_INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): SOIL Lab Sample ID: 3224

Level (low/med): LOW Date Received: 12/15/93

% Solids: 84.8

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum		-		NR
7440-36-0	Antimony		-		NR
7440-38-2	Arsenic		-		NR
7440-39-3	Barium		-		NR
7440-41-7	Beryllium		-		NR
7440-43-9	Cadmium		-		NR
7440-70-2	Calcium		-		NR
7440-47-3	Chromium		-		NR
7440-48-4	Cobalt		-		NR
7440-50-8	Copper		-		NR
7439-89-6	Iron		-		NR
7439-92-1	Lead		-		NR
7439-95-4	Magnesium		-		NR
7439-96-5	Manganese		-		NR
7439-97-6	Mercury	0.38	-		CV
7440-02-0	Nickel		-		NR
7440-09-7	Potassium		-		NR
7782-49-2	Selenium		-		NR
7440-22-4	Silver		-		NR
7440-23-5	Sodium		-		NR
7440-28-0	Thallium		-		NR
7440-62-2	Vanadium		-		NR
7440-66-6	Zinc		-		NR
	Cyanide		-		NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB_SAMPLE_ID: AS053224-ST000990
CLIENT_SAMPLE_ID: NSB-4(6-8)

0046

U.S. EPA - CLP

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB468

Lab Name: RECRA_ENVIRONMENTAL_INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): WATER Lab Sample ID: 224

Level (low/med): LOW Date Received: 12/15/93

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum		-		NR
7440-36-0	Antimony		-		NR
7440-38-2	Arsenic		-		NR
7440-39-3	Barium		-		NR
7440-41-7	Beryllium		-		NR
7440-43-9	Cadmium		-		NR
7440-70-2	Calcium		-		NR
7440-47-3	Chromium		-		NR
7440-48-4	Cobalt		-		NR
7440-50-8	Copper		-		NR
7439-89-6	Iron		-		NR
7439-92-1	Lead		-		NR
7439-95-4	Magnesium		-		NR
7439-96-5	Manganese		-		NR
7439-97-6	Mercury	0.20	U		CV
7440-02-0	Nickel		-		NR
7440-09-7	Potassium		-		NR
7782-49-2	Selenium		-		NR
7440-22-4	Silver		-		NR
7440-23-5	Sodium		-		NR
7440-28-0	Thallium		-		NR
7440-62-2	Vanadium		-		NR
7440-66-6	Zinc		-		NR
	Cyanide		-		NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB_SAMPLE_ID: AS053224-ST001440

CLIENT_SAMPLE_ID: NSB-4(6-8)

TCLP_EXTRACT

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EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB1413

Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): SOIL Lab Sample ID: 3225

Level (low/med): LOW Date Received: 12/15/93

% Solids: 86.1

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	20.1			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053225-ST000990
CLIENT SAMPLE ID: NSB-14 (1-3)

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB1413

b Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

b Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): WATER Lab Sample ID: 225

vel (low/med): LOW Date Received: 12/15/93

Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	1.7			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053225-ST001440

CLIENT SAMPLE ID: NSB-14(1-3)

TCLP EXTRACT

0029

U.S. EPA - CLP

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB1435

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): SOIL

Lab Sample ID: 3226

Level (low/med): LOW

Date Received: 12/15/93

% Solids: 81.5

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	0.13			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053226-ST000990
CLIENT SAMPLE ID: NSB-14(3-5)

1
INORGANIC ANALYSES DATA SHEET

NSB1435

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): WATER Lab Sample ID: 226

Level (low/med): LOW Date Received: 12/15/93

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	0.56			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB_SAMPLE_ID: AS053226-ST001440

CLIENT_SAMPLE_ID: NSB-14 (3-5)

TCLP_EXTRACT

0031

U.S. EPA - CLP

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB1457

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): SOIL Lab Sample ID: 3227

Level (low/med): LOW Date Received: 12/15/93

% Solids: 81.9

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	0.53			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB_SAMPLE_ID: AS053227-ST000990
CLIENT_SAMPLE_ID: NSB-14(5-7)

INORGANIC ANALYSES DATA SHEET

NSB1457

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECN Y Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): WATER Lab Sample ID: 227

Level (low/med): LOW Date Received: 12/15/93

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	0.20	U		CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB_SAMPLE_ID: AS053227-ST001440

CLIENT_SAMPLE_ID: NSB-14(5-7)

TCLP_EXTRACT

0035

U.S. EPA - CLP

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

NSB1479

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): SOIL Lab Sample ID: 3228

Level (low/med): LOW Date Received: 12/15/93

% Solids: 89.1

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	0.10	U		CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053228-ST000990
CLIENT SAMPLE ID: NSB-14(7-9)

INORGANIC ANALYSES DATA SHEET

NSB1479

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECN Y Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): WATER Lab Sample ID: 228

Level (low/med): LOW Date Received: 12/15/93

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	0.20	U		CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: AS053228-ST001440

CLIENT SAMPLE ID: NSB-14(7-9)

TCLP EXTRACT

0006

EPA SAMPLE NO.

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

NSB1613

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNYCase No.: 4884

SAS No.: _____

SDG No.: NSB1Matrix: (soil/water) SOILLab Sample ID: AS053229Sample wt/vol: 30.5 (g/mL) GLab File ID: 2933V% Moisture: 11 decanted: (Y/N) NDate Received: 12/15/93Extraction: (SepF/Cont/Sonc) SONCDate Extracted: 12/21/94 ^{93 fm}
2/14/94Concentrated Extract Volume: 5000 (uL)Date Analyzed: 01/05/94Injection Volume: 1.00 (uL)Dilution Factor: 1000GPC Cleanup: (Y/N) Y pH: 9.0Sulfur Cleanup: (Y/N) NCONCENTRATION UNITS:
(ug/L or ug/Kg) UG/KG

Q

CAS NO.	COMPOUND		
319-84-6-----	alpha-BHC	110000	C
319-85-7-----	beta-BHC	56000	C
319-86-8-----	delta-BHC	2600	C
58-89-9-----	gamma-BHC (Lindane)	4000	C
76-44-8-----	Heptachlor	1900	U
309-00-2-----	Aldrin	1900	U
1024-57-3-----	Heptachlor epoxide	1900	U
959-98-8-----	Endosulfan I	1900	U
60-57-1-----	Dieldrin	3600	U
72-55-9-----	4,4'-DDE	3600	U
72-20-8-----	Endrin	3600	U
33213-65-9-----	Endosulfan II	3600	U
72-54-8-----	4,4'-DDD	3600	U
1031-07-8-----	Endosulfan sulfate	3600	U
50-29-3-----	4,4'-DDT	3600	U
72-43-5-----	Methoxychlor	19000	U
53494-70-5-----	Endrin ketone	3600	U
7421-93-4-----	Endrin aldehyde	3600	U
5103-71-9-----	alpha-Chlordane	1900	U
5103-74-2-----	gamma-Chlordane	1900	U
8001-35-2-----	Toxaphene	190000	U

0007

EPA SAMPLE NO.

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

Lab Name: RECRA ENVIRON Contract: _____ NSB1613DLLab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: NSB1Matrix: (soil/water) SOIL Lab Sample ID: AS053229DLSample wt/vol: 30.5 (g/mL) G Lab File ID: 2933V% Moisture: 11 decanted: (Y/N) N Date Received: 12/15/93Extraction: (SepF/Cont/Sonc) SONC Date Extracted: 12/21/94 *Lm
2/11/94*Concentrated Extract Volume: 5000 (uL) Date Analyzed: 01/05/94Injection Volume: 1.00 (uL) Dilution Factor: 10000GPC Cleanup: (Y/N) Y pH: 9.0 Sulfur Cleanup: (Y/N) N

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/KG

Q

<u>319-84-6-----alpha-BHC</u>	<u>110000</u>	<u>DC</u>
<u>319-85-7-----beta-BHC</u>	<u>57000</u>	<u>DC</u>
<u>319-86-8-----delta-BHC</u>	<u>19000</u>	<u>U</u>
<u>58-89-9-----gamma-BHC (Lindane)</u>	<u>3600</u>	<u>DCJ</u>
<u>76-44-8-----Heptachlor</u>	<u>19000</u>	<u>U</u>
<u>309-00-2-----Aldrin</u>	<u>19000</u>	<u>U</u>
<u>1024-57-3-----Heptachlor epoxide</u>	<u>19000</u>	<u>U</u>
<u>959-98-8-----Endosulfan I</u>	<u>19000</u>	<u>U</u>
<u>60-57-1-----Dieldrin</u>	<u>36000</u>	<u>U</u>
<u>72-55-9-----4,4'-DDE</u>	<u>36000</u>	<u>U</u>
<u>72-20-8-----Endrin</u>	<u>36000</u>	<u>U</u>
<u>33213-65-9-----Endosulfan II</u>	<u>36000</u>	<u>U</u>
<u>72-54-8-----4,4'-DDD</u>	<u>36000</u>	<u>U</u>
<u>1031-07-8-----Endosulfan sulfate</u>	<u>36000</u>	<u>U</u>
<u>50-29-3-----4,4'-DDT</u>	<u>36000</u>	<u>U</u>
<u>72-43-5-----Methoxychlor</u>	<u>190000</u>	<u>U</u>
<u>53494-70-5-----Endrin ketone</u>	<u>36000</u>	<u>U</u>
<u>7421-93-4-----Endrin aldehyde</u>	<u>36000</u>	<u>U</u>
<u>5103-71-9-----alpha-Chlordane</u>	<u>19000</u>	<u>U</u>
<u>5103-74-2-----gamma-Chlordane</u>	<u>19000</u>	<u>U</u>
<u>8001-35-2-----Toxaphene</u>	<u>1900000</u>	<u>U</u>

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

NSB1635

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884

SAS No.: _____ SDG No.: NSB1

Matrix: (soil/water) SOIL

Lab Sample ID: AS053230

Sample wt/vol: 30.1 (g/mL) G

Lab File ID: 2934V

Moisture: 24 decanted: (Y/N) N

Date Received: 12/15/93

Extraction: (SepF/Cont/Sonc) SONC

Date Extracted: 12/21/94 ⁹³ _{2/4/94}

Concentrated Extract Volume: 5000 (uL)

Date Analyzed: 01/05/94

Injection Volume: 1.00 (uL)

Dilution Factor: 50.0

PC Cleanup: (Y/N) Y pH: 11.4

Sulfur Cleanup: (Y/N) N

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

Q

CAS NO.	COMPOUND		
319-84-6-----	alpha-BHC	2500	C
319-85-7-----	beta-BHC	5200	C
319-86-8-----	delta-BHC	110	J
58-89-9-----	gamma-BHC (Lindane)	71	J
76-44-8-----	Heptachlor	110	U
309-00-2-----	Aldrin	110	U
1024-57-3-----	Heptachlor epoxide	110	U
959-98-8-----	Endosulfan I	110	U
60-57-1-----	Dieldrin	220	U
72-55-9-----	4,4'-DDE	220	U
72-20-8-----	Endrin	220	U
33213-65-9-----	Endosulfan II	220	U
72-54-8-----	4,4'-DDD	220	U
1031-07-8-----	Endosulfan sulfate	220	U
50-29-3-----	4,4'-DDT	220	U
72-43-5-----	Methoxychlor	1100	U
53494-70-5-----	Endrin ketone	220	U
7421-93-4-----	Endrin aldehyde	220	U
5103-71-9-----	alpha-Chlordane	110	U
5103-74-2-----	gamma-Chlordane	110	U
8001-35-2-----	Toxaphene	11000	U

0009

EPA SAMPLE NO.

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

NSB1635DL

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY

Case No.: 4884

SAS No.: _____

SDG No.: NSB1

Matrix: (soil/water) SOIL

Lab Sample ID: AS053230DL

Sample wt/vol: 30.1 (g/mL) G

Lab File ID: 2934V

Moisture: 24 decanted: (Y/N) N

Date Received: 12/15/93

Extraction: (SepF/Cont/Sonc) SONC

Date Extracted: 12/21/94⁹³,
2/1/94

Concentrated Extract Volume: 5000 (uL)

Date Analyzed: 01/05/94

Injection Volume: 1.00 (uL)

Dilution Factor: 500

GPC Cleanup: (Y/N) Y pH: 11.4

Sulfur Cleanup: (Y/N) N

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/KG

Q

CAS NO.	COMPOUND			
319-84-6-----	alpha-BHC	1800	DC	
319-85-7-----	beta-BHC	5400	DC	
319-86-8-----	delta-BHC	1100	U	
58-89-9-----	gamma-BHC (Lindane)	1100	U	
76-44-8-----	Heptachlor	1100	U	
309-00-2-----	Aldrin	1100	U	
1024-57-3-----	Heptachlor epoxide	1100	U	
959-98-8-----	Endosulfan I	2200	U	
60-57-1-----	Dieldrin	2200	U	
72-55-9-----	4,4'-DDE	2200	U	
72-20-8-----	Endrin	2200	U	
33213-65-9-----	Endosulfan II	2200	U	
72-54-8-----	4,4'-DDD	2200	U	
1031-07-8-----	Endosulfan sulfate	2200	U	
50-29-3-----	4,4'-DDT	11000	U	
72-43-5-----	Methoxychlor	2200	U	
53494-70-5-----	Endrin ketone	2200	U	
7421-93-4-----	Endrin aldehyde	1100	U	
5103-71-9-----	alpha-Chlordane	1100	U	
5103-74-2-----	gamma-Chlordane	110000	U	
8001-35-2-----	Toxaphene			

0010

EPA SAMPLE NO.

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

NSB1657

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY

Case No.: 4884

SAS No.: _____

SDG No.: NSB1

Matrix: (soil/water) SOIL

Lab Sample ID: AS053231

Sample wt/vol: 30.2 (g/mL) G

Lab File ID: 2935V

Moisture: 15 decanted: (Y/N) N

Date Received: 12/15/93

Extraction: (SepF/Cont/Sonc) SONC

Date Extracted: 12/21/94 93

Concentrated Extract Volume: 5000 (uL)

Date Analyzed: 01/05/94

Injection Volume: 1.00 (uL)

Dilution Factor: 1000

GPC Cleanup: (Y/N) Y pH: 10.4

Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
319-84-6-----	alpha-BHC	72000	C
319-85-7-----	beta-BHC	50000	C
319-86-8-----	delta-BHC	1500	CJ
58-89-9-----	gamma-BHC (Lindane)	1500	GJ
76-44-8-----	Heptachlor	2000	U
309-00-2-----	Aldrin	2000	U
1024-57-3-----	Heptachlor epoxide	2000	U
959-98-8-----	Endosulfan I	3900	U
60-57-1-----	Dieldrin	3900	U
72-55-9-----	4,4'-DDE	3900	U
72-20-8-----	Endrin	3900	U
33213-65-9-----	Endosulfan II	3900	U
72-54-8-----	4,4'-DDD	3900	U
1031-07-8-----	Endosulfan sulfate	3900	U
50-29-3-----	4,4'-DDT	3900	U
72-43-5-----	Methoxychlor	20000	U
53494-70-5-----	Endrin ketone	3900	U
7421-93-4-----	Endrin aldehyde	3900	U
5103-71-9-----	alpha-Chlordane	2000	U
5103-74-2-----	gamma-Chlordane	2000	U
8001-35-2-----	Toxaphene	200000	U

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

NSB1657DL

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY

Case No.: 4884

SAS No.: _____

SDG No.: NSB1

Matrix: (soil/water) SOIL

Lab Sample ID: AS053231DL

Sample wt/vol: 30.2 (g/mL) G

Lab File ID: 2935V

* Moisture: 15 decanted: (Y/N) N

Date Received: 12/15/93

Extraction: (SepF/Cont/Sonc) SONC

Date Extracted: 12/21/94-93

2/14/94

Concentrated Extract Volume: 5000 (uL)

Date Analyzed: 01/06/94

Injection Volume: 1.00 (uL)

Dilution Factor: 10000

PC Cleanup: (Y/N) Y pH: 10.4

Sulfur Cleanup: (Y/N) N

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/KG

Q

CAS NO.	COMPOUND		
319-84-6-----	alpha-BHC	54000	DC
319-85-7-----	beta-BHC	50000	DC
319-86-8-----	delta-BHC	20000	U
58-89-9-----	gamma-BHC (Lindane)	20000	U
76-44-8-----	Heptachlor	20000	U
309-00-2-----	Aldrin	20000	U
1024-57-3-----	Heptachlor epoxide	20000	U
959-98-8-----	Endosulfan I	20000	U
60-57-1-----	Dieldrin	39000	U
72-55-9-----	4,4'-DDE	39000	U
72-20-8-----	Endrin	39000	U
33213-65-9-----	Endosulfan II	39000	U
72-54-8-----	4,4'-DDD	39000	U
1031-07-8-----	Endosulfan sulfate	39000	U
50-29-3-----	4,4'-DDT	39000	U
72-43-5-----	Methoxychlor	200000	U
53494-70-5-----	Endrin ketone	39000	U
7421-93-4-----	Endrin aldehyde	39000	U
5103-71-9-----	alpha-Chlordane	20000	U
5103-74-2-----	gamma-Chlordane	20000	U
8001-35-2-----	Toxaphene	2000000	U

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

NSB1679

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNYCase No.: 4884

SAS No.: _____

SDG No.: NSB1Matrix: (soil/water) SOILLab Sample ID: AS053232Sample wt/vol: 30.2 (g/mL) GLab File ID: 16461X% Moisture: 41 decanted: (Y/N) NDate Received: 12/15/93Extraction: (SepF/Cont/Sonc) SONCDate Extracted: 12/21/94 ⁹³
_{2/4/94}Concentrated Extract Volume: 5000 (uL)Date Analyzed: 01/05/94Injection Volume: 1.00 (uL)Dilution Factor: 50.0HPLC Cleanup: (Y/N) Y pH: 8.3Sulfur Cleanup: (Y/N) N

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/KG

Q

CAS NO.	COMPOUND	Q
319-84-6-----	alpha-BHC	6200 C
319-85-7-----	beta-BHC	8600 C
319-86-8-----	delta-BHC	150
58-89-9-----	gamma-BHC (Lindane)	1500
76-44-8-----	Heptachlor	140
309-00-2-----	Aldrin	140
1024-57-3-----	Heptachlor epoxide	140
959-98-8-----	Endosulfan I	140
60-57-1-----	Dieldrin	280
72-55-9-----	4,4'-DDE	280
72-20-8-----	Endrin	280
33213-65-9-----	Endosulfan II	280
72-54-8-----	4,4'-DDD	280
1031-07-8-----	Endosulfan sulfate	280
50-29-3-----	4,4'-DDT	280
72-43-5-----	Methoxychlor	1400 U
53494-70-5-----	Endrin ketone	280 U
7421-93-4-----	Endrin aldehyde	280 U
5103-71-9-----	alpha-Chlordane	140 U
5103-74-2-----	gamma-Chlordane	140 U
8001-35-2-----	Toxaphene	14000 U

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

NSB1679DL

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884

SAS No.: _____ SDG No.: NSB1

Matrix: (soil/water) SOIL

Lab Sample ID: AS053232DL

Sample wt/vol: 30.2 (g/mL) G

Lab File ID: 16461X

Moisture: 41 decanted: (Y/N) N

Date Received: 12/15/93

Extraction: (SepF/Cont/Sonc) SONC

Date Extracted: 12/21/94 ⁹³
_{2/14/94}

Concentrated Extract Volume: 5000 (uL)

Date Analyzed: 01/05/94

Injection Volume: 1.00 (uL)

Dilution Factor: 500

PC Cleanup: (Y/N) Y pH: 8.3

Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
319-84-6-----	alpha-BHC	4800	CD
319-85-7-----	beta-BHC	9400	CD
319-86-8-----	delta-BHC	1400	U
58-89-9-----	gamma-BHC (Lindane)	1100	DJ
76-44-8-----	Heptachlor	1400	U
309-00-2-----	Aldrin	1400	U
1024-57-3-----	Heptachlor epoxide	1400	U
959-98-8-----	Endosulfan I	1400	U
60-57-1-----	Dieldrin	2800	U
72-55-9-----	4,4'-DDE	2800	U
72-20-8-----	Endrin	2800	U
33213-65-9-----	Endosulfan II	2800	U
72-54-8-----	4,4'-DDD	2800	U
1031-07-8-----	Endosulfan sulfate	2800	U
50-29-3-----	4,4'-DDT	2800	U
72-43-5-----	Methoxychlor	14000	U
53494-70-5-----	Endrin ketone	2800	U
7421-93-4-----	Endrin aldehyde	2800	U
5103-71-9-----	alpha-Chlordane	1400	U
5103-74-2-----	gamma-Chlordane	1400	U
8001-35-2-----	Toxaphene	140000	U

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

NSB1713

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY

Case No.: 4884

SAS No.: _____

SDG No.: NSB1

Matrix: (soil/water) SOIL

Lab Sample ID: AS053233

Sample wt/vol: 30.7 (g/mL) G

Lab File ID: _____

% Moisture: 14 decanted: (Y/N) N

Date Received: 12/15/93

Extraction: (SepF/Cont/Sonc) SONC

Date Extracted: 12/21/94 93
2/14/94

Concentrated Extract Volume: 5000 (uL)

Date Analyzed: 01/05/94

Injection Volume: 1.00 (uL)

Dilution Factor: 10.0

HPLC Cleanup: (Y/N) Y pH: 9.4

Sulfur Cleanup: (Y/N) N

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/KG

Q

CAS NO.	COMPOUND		
319-84-6-----	alpha-BHC	290	
319-85-7-----	beta-BHC	1200	
319-86-8-----	delta-BHC	25	
58-89-9-----	gamma-BHC (Lindane)	140	
76-44-8-----	Heptachlor	19	U
309-00-2-----	Aldrin	19	U
1024-57-3-----	Heptachlor epoxide	19	U
959-98-8-----	Endosulfan I	19	U
60-57-1-----	Dieldrin	37	U
72-55-9-----	4,4'-DDE	37	U
72-20-8-----	Endrin	37	U
33213-65-9-----	Endosulfan II	37	U
72-54-8-----	4,4'-DDD	37	U
1031-07-8-----	Endosulfan sulfate	37	U
50-29-3-----	4,4'-DDT	37	U
72-43-5-----	Methoxychlor	190	U
53494-70-5-----	Endrin ketone	37	U
7421-93-4-----	Endrin aldehyde	37	U
5103-71-9-----	alpha-Chlordane	19	U
5103-74-2-----	gamma-Chlordane	19	U
8001-35-2-----	Toxaphene	1900	U

0015

EPA SAMPLE NO.

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

NSB1713DL

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884

SAS No.: _____ SDG No.: NSB1

Matrix: (soil/water) SOIL

Lab Sample ID: AS053233DL

Sample wt/vol: 30.7 (g/mL) G

Lab File ID: _____

Moisture: 14 decanted: (Y/N) N

Date Received: 12/15/93

Extraction: (SepF/Cont/Sonc) SONC

Date Extracted: 12/21/93 *1/4/94*

Concentrated Extract Volume: 5000 (uL)

Date Analyzed: 01/05/94

Injection Volume: 1.00 (uL)

Dilution Factor: 100

PC Cleanup: (Y/N) Y pH: 9.4

Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
319-84-6-----	alpha-BHC	220	D
319-85-7-----	beta-BHC	1300	D
319-86-8-----	delta-BHC	190	U
58-89-9-----	gamma-BHC (Lindane)	120	DJ
76-44-8-----	Heptachlor	190	U
309-00-2-----	Aldrin	190	U
1024-57-3-----	Heptachlor epoxide	190	U
959-98-8-----	Endosulfan I	190	U
60-57-1-----	Dieldrin	370	U
72-55-9-----	4,4'-DDE	370	U
72-20-8-----	Endrin	370	U
33213-65-9-----	Endosulfan II	370	U
72-54-8-----	4,4'-DDD	370	U
1031-07-8-----	Endosulfan sulfate	370	U
50-29-3-----	4,4'-DDT	370	U
72-43-5-----	Methoxychlor	1900	U
53494-70-5-----	Endrin ketone	370	U
7421-93-4-----	Endrin aldehyde	370	U
5103-71-9-----	alpha-Chlordane	190	U
5103-74-2-----	gamma-Chlordane	190	U
8001-35-2-----	Toxaphene	19000	U

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

NSB1735

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNYCase No.: 4884

SAS No.: _____

SDG No.: NSB1Matrix: (soil/water) SOILLab Sample ID: AS053234Sample wt/vol: 30.1 (g/mL) G

Lab File ID: _____

Moisture: 26 decanted: (Y/N) NDate Received: 12/15/93Extraction: (SepF/Cont/Sonc) SONCDate Extracted: 12/21/94 ^{12/14/94} ₉₃Concentrated Extract Volume: 5000 (uL)Date Analyzed: 01/07/94Injection Volume: 1.00 (uL)Dilution Factor: 10.0HPLC Cleanup: (Y/N) Y pH: 8.6Sulfur Cleanup: (Y/N) N

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/KG

Q

CAS NO.	COMPOUND	Q
319-84-6-----	alpha-BHC	190
319-85-7-----	beta-BHC	440
319-86-8-----	delta-BHC	12
58-89-9-----	gamma-BHC (Lindane)	52
76-44-8-----	Heptachlor	23
309-00-2-----	Aldrin	23
1024-57-3-----	Heptachlor epoxide	23
959-98-8-----	Endosulfan I	23
60-57-1-----	Dieldrin	44
72-55-9-----	4,4'-DDE	44
72-20-8-----	Endrin	44
33213-65-9-----	Endosulfan II	44
72-54-8-----	4,4'-DDD	44
1031-07-8-----	Endosulfan sulfate	44
50-29-3-----	4,4'-DDT	44
72-43-5-----	Methoxychlor	230
53494-70-5-----	Endrin ketone	44
7421-93-4-----	Endrin aldehyde	44
5103-71-9-----	alpha-Chlordane	23
5103-74-2-----	gamma-Chlordane	23
8001-35-2-----	Toxaphene	2300

0017

EPA SAMPLE NO.

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

NSB1735DL

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884SAS No.: _____ SDG No.: NSB1Matrix: (soil/water) SOILLab Sample ID: AS053234DLSample wt/vol: 30.1 (g/mL) G

Lab File ID: _____

Moisture: 26 decanted: (Y/N) NDate Received: 12/15/93Extraction: (SepF/Cont/Sonc) SONCDate Extracted: 12/21/94 93 2/14/94
*Qn*Concentrated Extract Volume: 5000 (uL)Date Analyzed: 01/07/94Injection Volume: 1.00 (uL)Dilution Factor: 100GPC Cleanup: (Y/N) Y pH: 8.6Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) <u>UG/KG</u>	Q
319-84-6-----	alpha-BHC	150	DJ
319-85-7-----	beta-BHC	450	D
319-86-8-----	delta-BHC	230	U
58-89-9-----	gamma-BHC (Lindane)	48	DJ P <i>12/17/94</i>
76-44-8-----	Heptachlor	230	U
309-00-2-----	Aldrin	230	U
1024-57-3-----	Heptachlor epoxide	230	U
959-98-8-----	Endosulfan I	440	U
60-57-1-----	Dieldrin	440	U
72-55-9-----	4,4'-DDE	440	U
72-20-8-----	Endrin	440	U
33213-65-9-----	Endosulfan II	440	U
72-54-8-----	4,4'-DDD	440	U
1031-07-8-----	Endosulfan sulfate	440	U
50-29-3-----	4,4'-DDT	2300	U
72-43-5-----	Methoxychlor	440	U
53494-70-5-----	Endrin ketone	440	U
7421-93-4-----	Endrin aldehyde	230	U
5103-71-9-----	alpha-Chlordane	230	U
5103-74-2-----	gamma-Chlordane	23000	U
8001-35-2-----	Toxaphene		

0018

EPA SAMPLE NO.

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

NSB1757

b Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884

SAS No.: _____ SDG No.: NSB1

Matrix: (soil/water) SOIL

Lab Sample ID: AS053235

Sample wt/vol: 30.0 (g/mL) G

Lab File ID: _____

Moisture: 14 decanted: (Y/N) N

Date Received: 12/15/93

Extraction: (SepF/Cont/Sonc) SONC

Date Extracted: 12/21/94 93 2/14/94

Concentrated Extract Volume: 5000 (uL)

Date Analyzed: 01/05/94

Injection Volume: 1.00 (uL)

Dilution Factor: 50.0

GPC Cleanup: (Y/N) Y pH: 8.9

Sulfur Cleanup: (Y/N) N

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

Q

CAS NO.	COMPOUND		
319-84-6-----	alpha-BHC	2900	
319-85-7-----	beta-BHC	3100	
319-86-8-----	delta-BHC	220	
58-89-9-----	gamma-BHC (Lindane)	1000	
76-44-8-----	Heptachlor	99	U
309-00-2-----	Aldrin	99	U
1024-57-3-----	Heptachlor epoxide	99	U
959-98-8-----	Endosulfan I	190	U
60-57-1-----	Dieldrin	190	U
72-55-9-----	4,4'-DDE	190	U
72-20-8-----	Endrin	190	U
33213-65-9-----	Endosulfan II	190	U
72-54-8-----	4,4'-DDD	190	U
1031-07-8-----	Endosulfan sulfate	190	U
50-29-3-----	4,4'-DDT	990	U
72-43-5-----	Methoxychlor	190	U
53494-70-5-----	Endrin ketone	190	U
7421-93-4-----	Endrin aldehyde	99	U
5103-71-9-----	alpha-Chlordane	99	U
5103-74-2-----	gamma-Chlordane	99	U
8001-35-2-----	Toxaphene	9900	U

0019

EPA SAMPLE NO.

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

NSB1757DL

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884

SAS No.: _____ SDG No.: NSB1

Matrix: (soil/water) SOIL

Lab Sample ID: AS053235DL

Sample wt/vol: 30.0 (g/mL) G

Lab File ID: _____

Moisture: 14 decanted: (Y/N) N

Date Received: 12/15/93

Extraction: (SepF/Cont/Sonc) SONC

Date Extracted: 12/21/94 73 2/4/94

Concentrated Extract Volume: 5000 (uL)

Date Analyzed: 01/05/94

Injection Volume: 1.00 (uL) -

Dilution Factor: 500

GPC Cleanup: (Y/N) Y pH: 8.9

Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/KG	Q
319-84-6-----	alpha-BHC	2100	D
319-85-7-----	beta-BHC	3100	D
319-86-8-----	delta-BHC	340	DJ
58-89-9-----	gamma-BHC (Lindane)	890	DJ
76-44-8-----	Heptachlor	990	U
309-00-2-----	Aldrin	990	U
1024-57-3-----	Heptachlor epoxide	990	U
959-98-8-----	Endosulfan I	1900	U
60-57-1-----	Dieldrin	1900	U
72-55-9-----	4,4'-DDE	1900	U
72-20-8-----	Endrin	1900	U
33213-65-9-----	Endosulfan II	1900	U
72-54-8-----	4,4'-DDD	1900	U
1031-07-8-----	Endosulfan sulfate	1900	U
50-29-3-----	4,4'-DDT	1900	U
72-43-5-----	Methoxychlor	9900	U
53494-70-5-----	Endrin ketone	1900	U
7421-93-4-----	Endrin aldehyde	1900	U
5103-71-9-----	alpha-Chlordane	990	U
5103-74-2-----	gamma-Chlordane	990	U
8001-35-2-----	Toxaphene	99000	U

0020

EPA SAMPLE NO.

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

NSB1779

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNYCase No.: 4884

SAS No.: _____

SDG No.: NSB1Matrix: (soil/water) SOILLab Sample ID: AS053236Sample wt/vol: 30.8 (g/mL) G

Lab File ID: _____

% Moisture: 16 decanted: (Y/N) NDate Received: 12/15/93Extraction: (SepF/Cont/Sonc) SONCDate Extracted: 12/21/94 93 44/94Concentrated Extract Volume: 5000 (uL)Date Analyzed: 01/07/94Injection Volume: 1.00 (uL)Dilution Factor: 10.0GPC Cleanup: (Y/N) Y pH: 7.9Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) <u>UG/KG</u>	Q
319-84-6-----	alpha-BHC	60	
319-85-7-----	beta-BHC	66	
319-86-8-----	delta-BHC	4.5	J
58-89-9-----	gamma-BHC (Lindane)	15	J
76-44-8-----	Heptachlor	20	U
309-00-2-----	Aldrin	20	U
1024-57-3-----	Heptachlor epoxide	20	U
959-98-8-----	Endosulfan I	20	U
60-57-1-----	Dieldrin	38	U
72-55-9-----	4,4'-DDE	38	U
72-20-8-----	Endrin	38	U
33213-65-9-----	Endosulfan II	38	U
72-54-8-----	4,4'-DDD	38	U
1031-07-8-----	Endosulfan sulfate	38	U
50-29-3-----	4,4'-DDT	38	U
72-43-5-----	Methoxychlor	200	U
53494-70-5-----	Endrin ketone	38	U
7421-93-4-----	Endrin aldehyde	38	U
5103-71-9-----	alpha-Chlordane	20	U
5103-74-2-----	gamma-Chlordane	20	U
8001-35-2-----	Toxaphene	2000	U

APPENDIX B-3

Olin Groundwater Samples

January 1994

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
ANALYSIS DATA SHEET

0017

Client No.

OBA-11B

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: A4024502

Sample wt/vol: 5.00 (g/mL) ML Lab File ID: L7854.MSQ

Level: (low/med) LOW Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____ Heated Purge: N Date Analyzed: 01/26/94

GC Column: DB-624 ID: 0.53 (mm) Dilution Factor: 1.00

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

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND	UG/L	Q
74-87-3-----	Chloromethane	10	U
74-83-9-----	Bromomethane	10	U
75-01-4-----	Vinyl chloride	55	
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	2	J
75-34-3-----	1,1-Dichloroethane	10	U
540-59-0-----	1,2-Dichloroethene (Total)	240	E
67-66-3-----	Chloroform	93	
107-06-2-----	1,2-Dichloroethane	10	U
78-93-3-----	2-Butanone	10	U
71-55-6-----	1,1,1-Trichloroethane	1	J
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	
79-01-6-----	Trichloroethene	740	E
124-48-1-----	Dibromochloromethane	10	U
79-00-5-----	1,1,2-Trichloroethane	10	U
71-43-2-----	Benzene	0.8	J
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	160	
108-88-3-----	Toluene	10	U
79-34-5-----	1,1,2,2-Tetrachloroethane	11	
108-90-7-----	Chlorobenzene	1	BJ
100-41-4-----	Ethyl benzene	10	U
100-42-5-----	Styrene	10	U
1330-20-7-----	Total Xylenes	10	U
108-05-4-----	Vinyl acetate	10	U

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0018

Client No.

OBA-11B

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: A4024502

Sample wt/vol: 5.00 (g/mL) ML Lab File ID: L7854.MSO

Level: (low/med) LOW Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____ Date Analyzed: 01/26/94

GC Column: DB-624 ID: 0.53 (mm) Dilution Factor: 1.00

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

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Number TICs found: 1

CAS NO.	Compound Name	RT	Est. Conc.	Q
1. 95-50-1	1,2-DICHLOROBENZENE	23.88	8	JN

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
ANALYSIS DATA SHEET

0019

Client No.

OBA-11BDL

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: A4024502DL

Sample wt/vol: 5.00 (g/mL) ML Lab File ID: L7859.MSQ

Level: (low/med) LOW Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____ Heated Purge: N Date Analyzed: 01/26/94

GC Column: DB-624 ID: 0.53 (mm) Dilution Factor: 5.00

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

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	UG/L	Q
74-87-3-----	Chloromethane	50	U
74-83-9-----	Bromomethane	50	U
75-01-4-----	Vinyl chloride	40	DJ
75-00-3-----	Chloroethane	50	U
75-09-2-----	Methylene chloride	50	U
67-64-1-----	Acetone	50	U
75-15-0-----	Carbon Disulfide	50	U
75-35-4-----	1,1-Dichloroethene	50	U
75-34-3-----	1,1-Dichloroethane	50	U
540-59-0-----	1,2-Dichloroethene (Total)	170	D
67-66-3-----	Chloroform	79	D
107-06-2-----	1,2-Dichloroethane	50	U
78-93-3-----	2-Butanone	50	U
71-55-6-----	1,1,1-Trichloroethane	50	U
56-23-5-----	Carbon Tetrachloride	50	U
75-27-4-----	Bromodichloromethane	50	U
78-87-5-----	1,2-Dichloropropane	50	U
10061-01-5----	cis-1,3-Dichloropropene	460	D
79-01-6-----	Trichloroethene	50	U
124-48-1-----	Dibromochloromethane	50	U
79-00-5-----	1,1,2-Trichloroethane	50	U
71-43-2-----	Benzene	50	U
10061-02-6----	trans-1,3-Dichloropropene	50	U
75-25-2-----	Bromoform	50	U
108-10-1-----	4-Methyl-2-pentanone	50	U
591-78-6-----	2-Hexanone	100	D
127-18-4-----	Tetrachloroethene	50	U
108-88-3-----	Toluene	8	DJ
79-34-5-----	1,1,2,2-Tetrachloroethane	50	U
108-90-7-----	Chlorobenzene	50	U
100-41-4-----	Ethyl benzene	50	U
100-42-5-----	Styrene	50	U
1330-20-7-----	Total Xylenes	50	U
108-05-4-----	Vinyl acetate	50	U

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0020

Client No.

OBA-11BDL

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024502DL

Sample wt/vol: 5.00 (g/mL) ML

Lab File ID: L7859.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____

Date Analyzed: 01/26/94

GC Column: DB-624 ID: 0.53 (mm)

Dilution Factor: 5.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

Number TICs found: 0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

CAS NO.	Compound Name	RT	Est. Conc.	Q

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0039

Client No.

OBA-11B

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____

SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024502

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16494X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/03/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND	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	6	J
106-46-7-----	1,4-Dichlorobenzene	6	J
95-50-1-----	1,2-Dichlorobenzene	31	U
95-48-7-----	2-Methylphenol	10	U
108-60-1-----	Bis(2-chloroisopropyl) ether	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	25	U
95-95-4-----	2,4,5-Trichlorophenol	10	U
91-58-7-----	2-Chloronaphthalene	25	U
88-74-4-----	2-Nitroaniline	10	U
131-11-3-----	Dimethyl phthalate	10	U
208-96-8-----	Acenaphthylene	10	U
606-20-2-----	2,6-Dinitrotoluene	25	U
99-09-2-----	3-Nitroaniline	25	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0040

Client No.

Lab Name: Recra Environmental

Contract: NY4A4884

OBA-11B

Lab Code: RECNY Case No.: 4884

SAS No.: _____

SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024502

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16494X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/03/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND	10	U
83-32-9-----	Acenaphthene	25	U
51-28-5-----	2,4-Dinitrophenol	25	U
100-02-7-----	4-Nitrophenol	10	U
132-64-9-----	Dibenzofuran	10	U
121-14-2-----	2,4-Dinitrotoluene	10	U
84-66-2-----	Diethyl phthalate	10	U
7005-72-3-----	4-Chlorodiphenylether	10	U
86-73-7-----	Fluorene	25	U
100-01-6-----	4-Nitroaniline	25	U
534-52-1-----	4,6-Dinitro-2-methylphenol	10	U
86-30-6-----	N-nitrosodiphenylamine	10	U
101-55-3-----	4-Bromophenyl phenyl ether	10	U
118-74-1-----	Hexachlorobenzene	25	U
87-86-5-----	Pentachlorophenol	10	U
85-01-8-----	Phenanthrene	10	U
120-12-7-----	Anthracene	10	U
84-74-2-----	Di-n-butyl phthalate	10	U
206-44-0-----	Fluoranthene	10	U
129-00-0-----	Pyrene	10	U
85-68-7-----	Butyl benzyl phthalate	10	U
91-94-1-----	3,3'-Dichlorobenzidine	10	U
56-55-3-----	Benzo(a)anthracene	10	U
218-01-9-----	Chrysene	4	J
117-81-7-----	Bis(2-ethylhexyl) phthalate	10	U
117-84-0-----	Di-n-octyl phthalate	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-----	Dibenzo(a,h)anthracene	10	U
191-24-2-----	Benzo(ghi)perylene	10	U
65-85-0-----	Benzoic acid	10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0041

Client No.

OBA-11B

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024502

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16494X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/03/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND		
100-51-6-----	Benzyl alcohol	10	U
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0042

Client No.

OBA-11B

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024502

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16494X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/03/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

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

Number TICs found: 3

CAS NO.	Compound Name	RT	Est. Conc.	Q
1.	CYCLOHEXEN-1-OL ISOMER	6.32	3	BJ
2.	UNKNOWN	27.28	3	J
3.	UNKNOWN	27.35	2	J

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

OBA11B

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884SAS No.: _____ SDG No.: OBA12Matrix: (soil/water) WATERLab Sample ID: A4024502Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 01/24/94Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 01/26/94Concentrated Extract Volume: 10000 (uL)Date Analyzed: 01/29/94Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) Y

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q
319-84-6-----	alpha-BHC	0.64
319-85-7-----	beta-BHC	0.078 P
319-86-8-----	delta-BHC	0.012 J
58-89-9-----	gamma-BHC (Lindane)	0.12
76-44-8-----	Heptachlor	0.050 U
309-00-2-----	Aldrin	0.050 U
1024-57-3-----	Heptachlor epoxide	0.050 U
959-98-8-----	Endosulfan I	0.050 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
7421-93-4-----	Endrin aldehyde	0.10 U
5103-71-9-----	alpha-Chlordane	0.050 U
5103-74-2-----	gamma-Chlordane	0.050 U
8001-35-2-----	Toxaphene	5.0 U
12674-11-2-----	Aroclor-1016	1.0 U
11104-28-2-----	Aroclor-1221	2.0 U
11141-16-5-----	Aroclor-1232	1.0 U
53469-21-9-----	Aroclor-1242	1.0 U
12672-29-6-----	Aroclor-1248	1.0 U
11097-69-1-----	Aroclor-1254	1.0 U
11096-82-5-----	Aroclor-1260	1.0 U

OLIN CHEMICAL CORP
METHOD 8015 - METHANOL
ANALYSIS DATA SHEET

0070

Client No.

OBA-11B

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024502

Sample wt/vol: 0.001 (g/mL) ML

Lab File ID: _____

Level: (low/med) Low

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____

Date Analyzed: 01/27/94

GC Column: _____ Dia: (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

CONCENTRATION UNITS:

(ug/L or ug/Kg) MG/L

Q

CAS NO. COMPOUND

67-56-1-----Methanol

0.55

U

1
INORGANIC ANALYSES DATA SHEET

EPA SAMPLE NO.

OBA11B

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: OBA12

Matrix (soil/water): WATER Lab Sample ID: 4502

Level (low/med): LOW Date Received: 01/24/94

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	0.29			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB_SAMPLE_ID: A4024502-ST000836
CLIENT_SAMPLE_ID: OBA-11B

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
ANALYSIS DATA SHEET

0021

Client No.

OBA-11C

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: A4024501

Sample wt/vol: 5.00 (g/mL) ML Lab File ID: L7855.MSO

Level: (low/med) LOW Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____ Heated Purge: N Date Analyzed: 01/26/94

GC Column: DB-624 ID: 0.53 (mm) Dilution Factor: 100.00

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

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND	UG/L	Q
74-87-3-----	Chloromethane	1000	U
74-83-9-----	Bromomethane	1000	U
75-01-4-----	Vinyl chloride	1500	
75-00-3-----	Chloroethane	1000	U
75-09-2-----	Methylene chloride	500	J
67-64-1-----	Acetone	1000	U
75-15-0-----	Carbon Disulfide	1000	U
75-35-4-----	1,1-Dichloroethene	1000	
75-34-3-----	1,1-Dichloroethane	1000	U
540-59-0-----	1,2-Dichloroethene (Total)	7100	
67-66-3-----	Chloroform	3400	
107-06-2-----	1,2-Dichloroethane	1000	U
78-93-3-----	2-Butanone	1000	U
71-55-6-----	1,1,1-Trichloroethane	1000	U
56-23-5-----	Carbon Tetrachloride	1000	U
75-27-4-----	Bromodichloromethane	1000	U
78-87-5-----	1,2-Dichloropropane	1000	U
10061-01-5-----	cis-1,3-Dichloropropene	1000	E
79-01-6-----	Trichloroethene	25000	
124-48-1-----	Dibromochloromethane	1000	U
79-00-5-----	1,1,2-Trichloroethane	1000	U
71-43-2-----	Benzene	1000	U
10061-02-6-----	trans-1,3-Dichloropropene	1000	U
75-25-2-----	Bromoform	1000	U
108-10-1-----	4-Methyl-2-pentanone	1000	U
591-78-6-----	2-Hexanone	4700	
127-18-4-----	Tetrachloroethene	1000	U
108-88-3-----	Toluene	380	J
79-34-5-----	1,1,2,2-Tetrachloroethane	50	BJ
108-90-7-----	Chlorobenzene	1000	U
100-41-4-----	Ethyl benzene	1000	U
100-42-5-----	Styrene	1000	U
1330-20-7-----	Total Xylenes	1000	U
108-05-4-----	Vinyl acetate	1000	U

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0022

Client No.

OBA-11C

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024501

Sample wt/vol: 5.00 (g/mL) ML

Lab File ID: L7855.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____

Date Analyzed: 01/26/94

GC Column: DB-624 ID: 0.53 (mm)

Dilution Factor: 100.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

Number TICs found: 0

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

CAS NO.	Compound Name	RT	Est. Conc.	Q

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
ANALYSIS DATA SHEET

0023

Client No.

OBA-11CDL

Lab Name: Recra Environmental Contract: _____
 Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12
 Matrix: (soil/water) WATER Lab Sample ID: A4024501DL
 Sample wt/vol: 5.00 (g/mL) ML Lab File ID: L7860.MSQ
 Level: (low/med) LOW Date Samp/Recv: 01/24/94 01/24/94
 % Moisture: not dec. _____ Heated Purge: N Date Analyzed: 01/26/94
 GC Column: DB-624 ID: 0.53 (mm) Dilution Factor: 200.00
 Soil Extract Volume: _____ (uL) Soil Aliquot Volume: _____ (uL)

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

Q

CAS NO.	COMPOUND	UG/L	Q
74-87-3-----	Chloromethane	2000	U
74-83-9-----	Bromomethane	2000	U
75-01-4-----	Vinyl chloride	1300	DJ
75-00-3-----	Chloroethane	2000	U
75-09-2-----	Methylene chloride	380	DJ
67-64-1-----	Acetone	2000	U
75-15-0-----	Carbon Disulfide	2000	U
75-35-4-----	1,1-Dichloroethene	2000	U
75-34-3-----	1,1-Dichloroethane	6200	D
540-59-0-----	1,2-Dichloroethene (Total)	3300	D
67-66-3-----	Chloroform	2000	U
107-06-2-----	1,2-Dichloroethane	2000	U
78-93-3-----	2-Butanone	2000	U
71-55-6-----	1,1,1-Trichloroethane	2000	U
56-23-5-----	Carbon Tetrachloride	2000	U
75-27-4-----	Bromodichloromethane	2000	U
78-87-5-----	1,2-Dichloropropane	2000	U
10061-01-5----	cis-1,3-Dichloropropene	21000	D
79-01-6-----	Trichloroethene	2000	U
124-48-1-----	Dibromochloromethane	2000	U
79-00-5-----	1,1,2-Trichloroethane	2000	U
71-43-2-----	Benzene	2000	U
10061-02-6----	trans-1,3-Dichloropropene	2000	U
75-25-2-----	Bromoform	2000	U
108-10-1-----	4-Methyl-2-pentanone	2000	U
591-78-6-----	2-Hexanone	4400	D
127-18-4-----	Tetrachloroethene	2000	U
108-88-3-----	Toluene	350	DJ
79-34-5-----	1,1,2,2-Tetrachloroethane	2000	U
108-90-7-----	Chlorobenzene	2000	U
100-41-4-----	Ethyl benzene	2000	U
100-42-5-----	Styrene	2000	U
1330-20-7-----	Total Xylenes	2000	U
108-05-4-----	Vinyl acetate	2000	U

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0024

Client No.

OBA-11CDL

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024501DL

Sample wt/vol: 5.00 (g/mL) ML

Lab File ID: L7860.MSQ

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____

Date Analyzed: 01/26/94

GC Column: DB-624 ID: 0.53 (mm)

Dilution Factor: 200.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

Number TICs found: 0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

CAS NO.	Compound Name	RT	Est. Conc.	Q

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0043

Client No.

OBA-11C

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____

SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024501

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16491X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND		
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	21	
106-46-7-----	1,4-Dichlorobenzene	16	
95-50-1-----	1,2-Dichlorobenzene	87	E
95-48-7-----	2-Methylphenol	10	U
108-60-1-----	Bis(2-chloroisopropyl) ether	10	U
106-44-5-----	4-Methylphenol	8	J
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	34	
120-82-1-----	1,2,4-Trichlorobenzene	10	U
91-20-3-----	Naphthalene	10	U
106-47-8-----	4-Chloroaniline	1	J
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	25	U
95-95-4-----	2,4,5-Trichlorophenol	10	U
91-58-7-----	2-Chloronaphthalene	25	U
88-74-4-----	2-Nitroaniline	10	U
131-11-3-----	Dimethyl phthalate	10	U
208-96-8-----	Acenaphthylene	10	U
606-20-2-----	2,6-Dinitrotoluene	25	U
99-09-2-----	3-Nitroaniline		

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0044

Client No.

OBA-11C

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024501

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16491X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

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

UG/L

Q

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg)	UG/L	Q
83-32-9-----	Acenaphthene		10	U
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-----	Diethyl phthalate		10	U
7005-72-3-----	4-Chlorodiphenylether		10	U
86-73-7-----	Fluorene		25	U
100-01-6-----	4-Nitroaniline		25	U
534-52-1-----	4,6-Dinitro-2-methylphenol		10	U
86-30-6-----	N-nitrosodiphenylamine		10	U
101-55-3-----	4-Bromophenyl phenyl ether		10	U
118-74-1-----	Hexachlorobenzene		25	U
87-86-5-----	Pentachlorophenol		10	U
85-01-8-----	Phanthrene		10	U
120-12-7-----	Anthracene		0.4	J
84-74-2-----	Di-n-butyl phthalate		10	U
206-44-0-----	Fluoranthene		10	U
129-00-0-----	Pyrene		10	U
85-68-7-----	Butyl benzyl phthalate		10	U
91-94-1-----	3,3'-Dichlorobenzidine		10	U
56-55-3-----	Benzo(a)anthracene		10	U
218-01-9-----	Chrysene		0.3	J
117-81-7-----	Bis(2-ethylhexyl) phthalate		10	U
117-84-0-----	Di-n-octyl phthalate		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-----	Dibenzo(a,h)anthracene		10	U
191-24-2-----	Benzo(ghi)perylene		10	U
65-85-0-----	Benzoic acid		10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0045

Client No.

OBA-11C

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024501

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16491X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND		
100-51-6-----	Benzyl alcohol	10	U
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0046

Client No.

OBA-11C

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: A4024501

Sample wt/vol: 1000.0 (g/mL) ML Lab File ID: 16491X.MSO

Level: (low/med) LOW Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL) Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL) Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

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

Number TICs found: 7

CAS NO.	Compound Name	RT	Est. Conc.	Q
1.	POLYCHLORINATED COMPOUND	10.53	4	J
2. 42769-38-0	1134-TETRACHLORO13-BUTADIENE	11.72	3	JN
3.	UNKNOWN	12.67	7	J
4.	OXYGENATED COMPOUND	19.65	3	J
5.	UNKNOWN ACID	25.23	5	J
6.	UNKNOWN	27.42	6	J
7.	UNKNOWN	27.70	7	J

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0047
Client No.

OBA-11CDL

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024501DL

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16499X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/04/94

Injection Volume: 2.00 (uL)

Dilution Factor: 2.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND		
108-95-2-----	Phenol	20	U
111-44-4-----	Bis(2-chloroethyl) ether	20	U
95-57-8-----	2-Chlorophenol	20	U
541-73-1-----	1,3-Dichlorobenzene	24	D
106-46-7-----	1,4-Dichlorobenzene	18	DJ
95-50-1-----	1,2-Dichlorobenzene	100	D
95-48-7-----	2-Methylphenol	20	U
108-60-1-----	Bis(2-chloroisopropyl) ether	20	U
106-44-5-----	4-Methylphenol	8	DJ
621-64-7-----	N-Nitroso-Di-n-propylamine	20	U
67-72-1-----	Hexachloroethane	20	U
98-95-3-----	Nitrobenzene	20	U
78-59-1-----	Isophorone	20	U
88-75-5-----	2-Nitrophenol	20	U
105-67-9-----	2,4-Dimethylphenol	20	U
111-91-1-----	Bis(2-chloroethoxy) methane	20	U
120-83-2-----	2,4-Dichlorophenol	20	U
120-82-1-----	1,2,4-Trichlorobenzene	40	D
91-20-3-----	Naphthalene	20	U
106-47-8-----	4-Chloroaniline	20	U
87-68-3-----	Hexachlorobutadiene	20	U
59-50-7-----	4-Chloro-3-methylphenol	20	U
91-57-6-----	2-Methylnaphthalene	20	U
77-47-4-----	Hexachlorocyclopentadiene	20	U
88-06-2-----	2,4,6-Trichlorophenol	20	U
95-95-4-----	2,4,5-Trichlorophenol	50	U
91-58-7-----	2-Chloronaphthalene	20	U
88-74-4-----	2-Nitroaniline	50	U
131-11-3-----	Dimethyl phthalate	20	U
208-96-8-----	Acenaphthylene	20	U
606-20-2-----	2,6-Dinitrotoluene	20	U
99-09-2-----	3-Nitroaniline	50	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0048

Client No.

OBA-11CDL

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024501DL

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16499X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/04/94

Injection Volume: 2.00 (uL)

Dilution Factor: 2.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND		
83-32-9-----	Acenaphthene	20	U
51-28-5-----	2,4-Dinitrophenol	50	U
100-02-7-----	4-Nitrophenol	50	U
132-64-9-----	Dibenzofuran	20	U
121-14-2-----	2,4-Dinitrotoluene	20	U
84-66-2-----	Diethyl phthalate	20	U
7005-72-3-----	4-Chlorodiphenylether	20	U
86-73-7-----	Fluorene	50	U
100-01-6-----	4-Nitroaniline	50	U
534-52-1-----	4,6-Dinitro-2-methylphenol	20	U
86-30-6-----	N-nitrosodiphenylamine	20	U
101-55-3-----	4-Bromophenyl phenyl ether	20	U
118-74-1-----	Hexachlorobenzene	50	U
87-86-5-----	Pentachlorophenol	20	U
85-01-8-----	Phenanthrene	20	U
120-12-7-----	Anthracene	20	U
84-74-2-----	Di-n-butyl phthalate	20	U
206-44-0-----	Fluoranthene	20	U
129-00-0-----	Pyrene	20	U
85-68-7-----	Butyl benzyl phthalate	20	U
91-94-1-----	3,3'-Dichlorobenzidine	20	U
56-55-3-----	Benzo(a)anthracene	20	U
218-01-9-----	Chrysene	20	U
117-81-7-----	Bis(2-ethylhexyl) phthalate	20	U
117-84-0-----	Di-n-octyl phthalate	20	U
205-99-2-----	Benzo(b)fluoranthene	20	U
207-08-9-----	Benzo(k)fluoranthene	20	U
50-32-8-----	Benzo(a)pyrene	20	U
193-39-5-----	Indeno(1,2,3-cd)pyrene	20	U
53-70-3-----	Dibenzo(a,h)anthracene	20	U
191-24-2-----	Benzo(ghi)perylene	20	U
65-85-0-----	Benzoic acid	20	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0049

Client No.

OBA-11CDL

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024501DL

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16499X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/04/94

Injection Volume: 2.00 (uL)

Dilution Factor: 2.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND		
100-51-6-----	Benzyl alcohol	20	U
108-43-0-----	3-Chlorophenol	20	U
106-48-9-----	4-Chlorophenol	20	U
576-24-9-----	2,3-Dichlorophenol	20	U
583-78-8-----	2,5-Dichlorophenol	20	U
95-77-2-----	3,4-Dichlorophenol	20	U
591-35-5-----	3,5-Dichlorophenol	20	U
15950-66-0----	2,3,4-Trichlorophenol	20	U
933-78-8-----	2,3,5-Trichlorophenol	20	U
933-75-5-----	2,3,6-Trichlorophenol	20	U
609-19-8-----	3,4,5-Trichlorophenol	20	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	20	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	20	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	20	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0050

Client No.

OBA-11CDL

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: A4024501DL

Sample wt/vol: 1000.0 (g/mL) ML Lab File ID: 16499X.MSO

Level: (low/med) LOW Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL) Date Analyzed: 02/04/94

Injection Volume: 2.00 (uL) Dilution Factor: 2.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Number TICs found: 7

CAS NO.	Compound Name	RT	Est. Conc.	Q
1.	POLYCHLORINATED COMPOUND	10.47	4	J
2.	TRICHLOROBENZENE ISOMER	13.33	7	J
3.	UNKNOWN	25.10	5	J
4.	UNKNOWN	27.22	6	J
5.	UNKNOWN	27.28	4	J
6.	UNKNOWN	27.57	6	J
7.	UNKNOWN	27.78	4	J

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

OBA11C

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNYCase No.: 4884

SAS No.: _____

SDG No.: OBA12Matrix: (soil/water) WATERLab Sample ID: A4024501Sample wt/vol: 800.0 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 01/24/94Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 01/26/94Concentrated Extract Volume: 10000 (uL)Date Analyzed: 01/29/94Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) Y

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) <u>UG/L</u>	Q
319-84-6-----	alpha-BHC	0.73	
319-85-7-----	beta-BHC	0.092	P
319-86-8-----	delta-BHC	0.016	JP
58-89-9-----	gamma-BHC (Lindane)	0.14	
76-44-8-----	Heptachlor	0.062	U
309-00-2-----	Aldrin	0.062	U
1024-57-3-----	Heptachlor epoxide	0.062	U
959-98-8-----	Endosulfan I	0.062	U
60-57-1-----	Dieldrin	0.12	U
72-55-9-----	4,4'-DDE	0.12	U
72-20-8-----	Endrin	0.12	U
33213-65-9-----	Endosulfan II	0.12	U
72-54-8-----	4,4'-DDD	0.12	U
1031-07-8-----	Endosulfan sulfate	0.12	U
50-29-3-----	4,4'-DDT	0.12	U
72-43-5-----	Methoxychlor	0.62	U
53494-70-5-----	Endrin ketone	0.12	U
7421-93-4-----	Endrin aldehyde	0.12	U
5103-71-9-----	alpha-Chlordane	0.062	U
5103-74-2-----	gamma-Chlordane	0.062	U
8001-35-2-----	Toxaphene	6.2	U
12674-11-2-----	Aroclor-1016	1.2	U
11104-28-2-----	Aroclor-1221	2.5	U
11141-16-5-----	Aroclor-1232	1.2	U
53469-21-9-----	Aroclor-1242	1.2	U
12672-29-6-----	Aroclor-1248	1.2	U
11097-69-1-----	Aroclor-1254	1.2	U
11096-82-5-----	Aroclor-1260	1.2	U

OLIN CHEMICAL CORP
METHOD 8015 - METHANOL
ANALYSIS DATA SHEET

0071

Client No.

OBA-11C

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024501

Sample wt/vol: 0.001 (g/mL) ML

Lab File ID: _____

Level: (low/med) Low

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____

Date Analyzed: 01/27/94

GC Column: _____ Dia: (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

CONCENTRATION UNITS:

(ug/L or ug/Kg) MG/L

Q

CAS NO. COMPOUND

<u>67-56-1-----Methanol</u>	<u>0.55</u>	<u>U</u>
-----------------------------	-------------	----------

0080

U.S. EPA - CLP

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

OBA11C

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: OBA12

Matrix (soil/water): WATER Lab Sample ID: 4501

Level (low/med): LOW Date Received: 01/24/94

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	0.39			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: A4024501-ST000836
CLIENT SAMPLE ID: OBA-11C

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
ANALYSIS DATA SHEET

0025

Client No.

OBA-12B

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023601

Sample wt/vol: 5.00 (g/mL) ML

Lab File ID: L7818.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: not dec. _____ Heated Purge: N

Date Analyzed: 01/25/94

GC Column: DB-624 ID: 0.53 (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	10	U
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
108-88-3-----	Toluene	10	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10	U
108-90-7-----	Chlorobenzene	10	U
100-41-4-----	Ethyl benzene	10	U
100-42-5-----	Styrene	10	U
1330-20-7-----	Total Xylenes	10	U
108-05-4-----	Vinyl acetate	10	U

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0026

Client No.

OBA-12B

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023601

Sample wt/vol: 5.00 (g/mL) ML

Lab File ID: L7818.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: not dec. _____

Date Analyzed: 01/25/94

GC Column: DB-624 ID: 0.53 (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

Number TICs found: 0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

CAS NO.	Compound Name	RT	Est. Conc.	Q

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0051

Client No.

OBA-12B

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023601

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16487X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND	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-----	Bis(2-chloroisopropyl) ether	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	25	U
95-95-4-----	2,4,5-Trichlorophenol	10	U
91-58-7-----	2-Chloronaphthalene	25	U
88-74-4-----	2-Nitroaniline	10	U
131-11-3-----	Dimethyl phthalate	10	U
208-96-8-----	Acenaphthylene	10	U
606-20-2-----	2,6-Dinitrotoluene	25	U
99-09-2-----	3-Nitroaniline		

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0052

Client No.

OBA-12B

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023601

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16487X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND	UG/L	Q
83-32-9-----	Acenaphthene	10	U
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-----	Diethyl phthalate	10	U
7005-72-3-----	4-Chlorodiphenylether	10	U
86-73-7-----	Fluorene	25	U
100-01-6-----	4-Nitroaniline	25	U
534-52-1-----	4,6-Dinitro-2-methylphenol	10	U
86-30-6-----	N-nitrosodiphenylamine	10	U
101-55-3-----	4-Bromophenyl phenyl ether	10	U
118-74-1-----	Hexachlorobenzene	25	U
87-86-5-----	Pentachlorophenol	10	U
85-01-8-----	Phenanthrene	10	U
120-12-7-----	Anthracene	0.5	J
84-74-2-----	Di-n-butyl phthalate	10	U
206-44-0-----	Fluoranthene	10	U
129-00-0-----	Pyrene	10	U
85-68-7-----	Butyl benzyl phthalate	10	U
91-94-1-----	3,3'-Dichlorobenzidine	10	U
56-55-3-----	Benzo(a)anthracene	10	U
218-01-9-----	Chrysene	2	J
117-81-7-----	Bis(2-ethylhexyl) phthalate	10	U
117-84-0-----	Di-n-octyl phthalate	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-----	Dibenzo(a,h)anthracene	10	U
191-24-2-----	Benzo(ghi)perylene	10	U
65-85-0-----	Benzoic acid	10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0053

Client No.

OBA-12B

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: A4023601

Sample wt/vol: 1000.0 (g/mL) ML Lab File ID: 16487X.MSO

Level: (low/med) LOW Date Samp/Recv: 01/21/94 01/21/94

% Moisture: _____ decanted: (Y/N) N Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL) Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL) Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND		
100-51-6-----	Benzyl alcohol	10	U
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0054

Client No.

OBA-12B

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: A4023601

Sample wt/vol: 1000.0 (g/mL) ML Lab File ID: 16487X.MSO

Level: (low/med) LOW Date Samp/Recv: 01/21/94 01/21/94

% Moisture: _____ decanted: (Y/N) N Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL) Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL) Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

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

CAS NO.	Compound Name	RT	Est. Conc.	Q

0066

EPA SAMPLE NO.

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

OBA12B

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884SAS No.: _____ SDG No.: OBA12Matrix: (soil/water) WATERLab Sample ID: A4023601Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 01/21/94Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 01/26/94Concentrated Extract Volume: 10000 (uL)Date Analyzed: 01/29/94Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) Y

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q
319-84-6-----	alpha-BHC	0.077
319-85-7-----	beta-BHC	0.027 J
319-86-8-----	delta-BHC	0.050 U
58-89-9-----	gamma-BHC (Lindane)	0.023 J
76-44-8-----	Heptachlor	0.050 U
309-00-2-----	Aldrin	0.050 U
1024-57-3-----	Heptachlor epoxide	0.050 U
959-98-8-----	Endosulfan I	0.050 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
7421-93-4-----	Endrin aldehyde	0.10 U
5103-71-9-----	alpha-Chlordane	0.050 U
5103-74-2-----	gamma-Chlordane	0.050 U
8001-35-2-----	Toxaphene	5.0 U
12674-11-2-----	Aroclor-1016	1.0 U
11104-28-2-----	Aroclor-1221	2.0 U
11141-16-5-----	Aroclor-1232	1.0 U
53469-21-9-----	Aroclor-1242	1.0 U
12672-29-6-----	Aroclor-1248	1.0 U
11097-69-1-----	Aroclor-1254	1.0 U
11096-82-5-----	Aroclor-1260	1.0 U

OLIN CHEMICAL CORP
METHOD 8015 - METHANOL
ANALYSIS DATA SHEET

0072

Client No.

OBA-12B

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023601

Sample wt/vol: 0.001 (g/mL) ML

Lab File ID: _____

Level: (low/med) Low

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: not dec. _____

Date Analyzed: 01/26/94

GC Column: _____ Dia: _____ (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

CONCENTRATION UNITS:

(ug/L or ug/Kg) MG/L Q

CAS NO. COMPOUND

<u>67-56-1-----Methanol</u>	<u>0.55</u>	<u>U</u>
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0081

U.S. EPA - CLP.

1

EPA SAMPLE NO.

INORGANIC ANALYSES DATA SHEET

OBA12B

Lab Name: RECRA_ENVIRONMENTAL_INC. Contract: NY93-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: OBA12

Matrix (soil/water): WATER Lab Sample ID: 3601

Level (low/med): LOW Date Received: 01/21/94

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	1.3			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB_SAMPLE_ID: A4023601-ST000836

CLIENT_SAMPLE_ID: OBA-12B

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
ANALYSIS DATA SHEET

0029

Client No.

QA-1

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023603

Sample wt/vol: 5.00 (g/mL) ML

Lab File ID: L7817.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: not dec. _____ Heated Purge: N Date Analyzed: 01/25/94

GC Column: DB-624 ID: 0.53 (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	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
108-88-3-----	Toluene	10	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10	U
108-90-7-----	Chlorobenzene	10	U
100-41-4-----	Ethyl benzene	10	U
100-42-5-----	Styrene	10	U
1330-20-7-----	Total Xylenes	10	U
108-05-4-----	Vinyl acetate	10	U

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0030

Client No.

QA-1

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023603

Sample wt/vol: 5.00 (g/mL) ML

Lab File ID: L7817.MSQ

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: not dec. _____

Date Analyzed: 01/25/94

GC Column: DB-624 ID: 0.53 (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

Number TICs found: 0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

CAS NO.	Compound Name	RT	Est. Conc.	Q

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0059

Client No.

QA-1

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023603

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16489X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND	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-----	Bis(2-chloroisopropyl) ether	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	25	U
95-95-4-----	2,4,5-Trichlorophenol	10	U
91-58-7-----	2-Chloronaphthalene	25	U
88-74-4-----	2-Nitroaniline	10	U
131-11-3-----	Dimethyl phthalate	10	U
208-96-8-----	Acenaphthylene	10	U
606-20-2-----	2,6-Dinitrotoluene	25	U
99-09-2-----	3-Nitroaniline	10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0060

Client No.

Lab Name: Recra Environmental Contract: NY4A4884

QA-1

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023603

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16489X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND	UG/L	Q
83-32-9-----	Acenaphthene	10	U
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-----	Diethyl phthalate	10	U
7005-72-3-----	4-Chlorodiphenylether	10	U
86-73-7-----	Fluorene	25	U
100-01-6-----	4-Nitroaniline	25	U
534-52-1-----	4,6-Dinitro-2-methylphenol	10	U
86-30-6-----	N-nitrosodiphenylamine	10	U
101-55-3-----	4-Bromophenyl phenyl ether	10	U
118-74-1-----	Hexachlorobenzene	25	U
87-86-5-----	Pentachlorophenol	10	U
85-01-8-----	Phenanthrene	10	U
120-12-7-----	Anthracene	0.4	J
84-74-2-----	Di-n-butyl phthalate	10	U
206-44-0-----	Fluoranthene	10	U
129-00-0-----	Pyrene	10	U
85-68-7-----	Butyl benzyl phthalate	10	U
91-94-1-----	3,3'-Dichlorobenzidine	10	U
56-55-3-----	Benzo(a)anthracene	10	U
218-01-9-----	Chrysene	0.7	J
117-81-7-----	Bis(2-ethylhexyl) phthalate	10	U
117-84-0-----	Di-n-octyl phthalate	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-----	Dibenzo(a,h)anthracene	10	U
191-24-2-----	Benzo(ghi)perylene	10	U
65-85-0-----	Benzoic acid	10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0061

Client No.

QA-1

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: A4023603

Sample wt/vol: 1000.0 (g/mL) ML Lab File ID: 16489X.MSO

Level: (low/med) LOW Date Samp/Recv: 01/21/94 01/21/94

% Moisture: _____ decanted: (Y/N) N Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL) Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL) Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND	CONCENTRATION UNITS:	UG/L	Q
100-51-6-----	Benzyl alcohol	10	U	
108-43-0-----	3-Chlorophenol	10	U	
106-48-9-----	4-Chlorophenol	10	U	
576-24-9-----	2,3-Dichlorophenol	10	U	
583-78-8-----	2,5-Dichlorophenol	10	U	
95-77-2-----	3,4-Dichlorophenol	10	U	
591-35-5-----	3,5-Dichlorophenol	10	U	
15950-66-0-----	2,3,4-Trichlorophenol	10	U	
933-78-8-----	2,3,5-Trichlorophenol	10	U	
933-75-5-----	2,3,6-Trichlorophenol	10	U	
609-19-8-----	3,4,5-Trichlorophenol	10	U	
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U	
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U	
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U	

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0062

Client No.

QA-1

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023603

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16489X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

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

Number TICs found: 0

CAS NO.	Compound Name	RT	Est. Conc.	Q

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

QA1

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884SAS No.: _____ SDG No.: QBA12Matrix: (soil/water) WATERLab Sample ID: A4023603Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 01/21/94Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 01/26/94Concentrated Extract Volume: 10000 (uL)Date Analyzed: 01/29/94Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) Y

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/LQ

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) <u>UG/L</u>	<u>Q</u>
319-84-6-----	alpha-BHC	0.061	
319-85-7-----	beta-BHC	0.029	J
319-86-8-----	delta-BHC	0.050	U
58-89-9-----	gamma-BHC (Lindane)	0.015	JP
76-44-8-----	Heptachlor	0.050	U
309-00-2-----	Aldrin	0.050	U
1024-57-3-----	Heptachlor epoxide	0.050	U
959-98-8-----	Endosulfan I	0.050	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
7421-93-4-----	Endrin aldehyde	0.10	U
5103-71-9-----	alpha-Chlordane	0.050	U
5103-74-2-----	gamma-Chlordane	0.050	U
8001-35-2-----	Toxaphene	5.0	U
12674-11-2-----	Aroclor-1016	1.0	U
11104-28-2-----	Aroclor-1221	2.0	U
11141-16-5-----	Aroclor-1232	1.0	U
53469-21-9-----	Aroclor-1242	1.0	U
12672-29-6-----	Aroclor-1248	1.0	U
11097-69-1-----	Aroclor-1254	1.0	U
11096-82-5-----	Aroclor-1260	1.0	U

OLIN CHEMICAL CORP
METHOD 8015 - METHANOL
ANALYSIS DATA SHEET

0074

Client No.

QA-1

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: A4023603

Sample wt/vol: 0.001 (g/mL) ML Lab File ID: _____

Level: (low/med) Low Date Samp/Recv: 01/21/94 01/21/94

% Moisture: not dec. _____

Date Analyzed: 01/27/94

GC Column: _____ Dia: _____ (mm)

Dilution Factor: 1.00

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

CONCENTRATION UNITS:

(ug/L or ug/Kg) MG/L

Q

CAS NO.	COMPOUND		
<u>67-56-1-----</u>	<u>Methanol</u>	<u>0.55</u>	<u>U</u>

1
INORGANIC ANALYSES DATA SHEET

EPA SAMPLE NO.

QA-1

Lab Name: RECRA_ENVIRONMENTAL_INC. Contract: NY93-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: OBA12

Matrix (soil/water): WATER Lab Sample ID: 3603

Level (low/med): LOW Date Received: 01/21/94

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	1.6			CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB_SAMPLE_ID: A4023603-ST000836

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
ANALYSIS DATA SHEET

0027

Client No.

OBA-12C

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023602

Sample wt/vol: 5.00 (g/mL) ML

Lab File ID: L7819.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: not dec. _____ Heated Purge: N Date Analyzed: 01/25/94

GC Column: DB-624 ID: 0.53 (mm)

Dilution Factor: 100.00

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

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND	UG/L	Q
74-87-3-----	Chloromethane	1000	U
74-83-9-----	Bromomethane	1000	U
75-01-4-----	Vinyl chloride	4300	
75-00-3-----	Chloroethane	1000	U
75-09-2-----	Methylene chloride	1000	U
67-64-1-----	Acetone	1000	U
75-15-0-----	Carbon Disulfide	1000	U
75-35-4-----	1,1-Dichloroethene	1000	U
75-34-3-----	1,1-Dichloroethane	1000	U
540-59-0-----	1,2-Dichloroethene (Total)	14000	
67-66-3-----	Chloroform	1000	U
107-06-2-----	1,2-Dichloroethane	1000	U
78-93-3-----	2-Butanone	1000	U
71-55-6-----	1,1,1-Trichloroethane	1000	U
56-23-5-----	Carbon Tetrachloride	1000	U
75-27-4-----	Bromodichloromethane	1000	U
78-87-5-----	1,2-Dichloropropane	1000	U
10061-01-5-----	cis-1,3-Dichloropropene	3400	
79-01-6-----	Trichloroethene	1000	U
124-48-1-----	Dibromochloromethane	1000	U
79-00-5-----	1,1,2-Trichloroethane	89	J
71-43-2-----	Benzene	1000	U
10061-02-6-----	trans-1,3-Dichloropropene	1000	U
75-25-2-----	Bromoform	1000	U
108-10-1-----	4-Methyl-2-pentanone	1000	U
591-78-6-----	2-Hexanone	200	J
127-18-4-----	Tetrachloroethene	1000	U
108-88-3-----	Toluene	1000	U
79-34-5-----	1,1,2,2-Tetrachloroethane	40	J
108-90-7-----	Chlorobenzene	1000	U
100-41-4-----	Ethyl benzene	1000	U
100-42-5-----	Styrene	1000	U
1330-20-7-----	Total Xylenes	1000	U
108-05-4-----	Vinyl acetate	1000	U

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0028

Client No.

OBA-12C

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: A4023602

Sample wt/vol: 5.00 (g/mL) ML

Lab File ID: L7819.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: not dec. _____

Date Analyzed: 01/25/94

GC Column: DB-624 ID: 0.53 (mm)

Dilution Factor: 100.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

Number TICs found: 0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

CAS NO.	Compound Name	RT	Est. Conc.	Q

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0055

Client No.

OBA-12C

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023602

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16488X.MSQ

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND	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	
106-46-7-----	1,4-Dichlorobenzene	5	J
95-50-1-----	1,2-Dichlorobenzene	14	
95-48-7-----	2-Methylphenol	10	U
108-60-1-----	Bis(2-chloroisopropyl) ether	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	2	J
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	2	J
95-95-4-----	2,4,5-Trichlorophenol	40	
91-58-7-----	2-Chloronaphthalene	10	U
88-74-4-----	2-Nitroaniline	25	
131-11-3-----	Dimethyl phthalate	10	U
208-96-8-----	Acenaphthylene	10	U
606-20-2-----	2,6-Dinitrotoluene	25	U
99-09-2-----	3-Nitroaniline	10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0056

Client No.

OBA-12C

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023602

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16488X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND		
83-32-9-----	-Acenaphthene	10	U
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-----	-Diethyl phthalate	10	U
7005-72-3-----	-4-Chlorodiphenylether	10	U
86-73-7-----	-Fluorene	25	U
100-01-6-----	-4-Nitroaniline	25	U
534-52-1-----	-4,6-Dinitro-2-methylphenol	10	U
86-30-6-----	-N-nitrosodiphenylamine	10	U
101-55-3-----	-4-Bromophenyl phenyl ether	10	U
118-74-1-----	-Hexachlorobenzene	10	U
87-86-5-----	-Pentachlorophenol	25	U
85-01-8-----	-Phenanthrene	10	U
120-12-7-----	-Anthracene	0.4	J
84-74-2-----	-Di-n-butyl phthalate	10	U
206-44-0-----	-Fluoranthene	10	U
129-00-0-----	-Pyrene	10	U
85-68-7-----	-Butyl benzyl phthalate	10	U
91-94-1-----	-3,3'-Dichlorobenzidine	10	U
56-55-3-----	-Benzo(a)anthracene	10	U
218-01-9-----	-Chrysene	0.6	J
117-81-7-----	-Bis(2-ethylhexyl) phthalate	10	U
117-84-0-----	-Di-n-octyl phthalate	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-----	-Dibenzo(a,h)anthracene	10	U
191-24-2-----	-Benzo(ghi)perylene	10	U
65-85-0-----	-Benzoic acid	10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0057

Client No.

OBA-12C

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023602

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16488X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND		
100-51-6-----	Benzyl alcohol	10	U
108-43-0-----	3-Chlorophenol	4	J
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	74	
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	1	J
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0058

Client No.

OBA-12C

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023602

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16488X.MSQ

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

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

Number TICs found: 4

CAS NO.	Compound Name	RT	Est. Conc.	Q
1. 110-56-5	1,4-DICHLOROBUTANE	6.78	6	JN
2.	UNKNOWN	7.80	24	J
3.	CHLOROMETHYL TOLUENE	7.93	6	J
4.	CHLORINATED COMPOUND	16.55	8	J

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

OBA12C

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884SAS No.: _____ SDG No.: OBA12Matrix: (soil/water) WATERLab Sample ID: A4023602Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 01/21/94Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 01/26/94Concentrated Extract Volume: 10000 (uL) Date Analyzed: 01/29/94Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0 Sulfur Cleanup: (Y/N) Y

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/LQ

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) <u>UG/L</u>	<u>Q</u>
319-84-6-----	alpha-BHC	0.021	J
319-85-7-----	beta-BHC	0.050	U
319-86-8-----	delta-BHC	0.050	U
58-89-9-----	gamma-BHC (Lindane)	0.050	U
76-44-8-----	Heptachlor	0.050	U
309-00-2-----	Aldrin	0.050	U
1024-57-3-----	Heptachlor epoxide	0.050	U
959-98-8-----	Endosulfan I	0.050	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	0.50	U
72-43-5-----	Methoxychlor	0.10	U
53494-70-5-----	Endrin ketone	0.10	U
7421-93-4-----	Endrin aldehyde	0.050	U
5103-71-9-----	alpha-Chlordane	0.050	U
5103-74-2-----	gamma-Chlordane	5.0	U
8001-35-2-----	Toxaphene	1.0	U
12674-11-2-----	Aroclor-1016	2.0	U
11104-28-2-----	Aroclor-1221	1.0	U
11141-16-5-----	Aroclor-1232	1.0	U
53469-21-9-----	Aroclor-1242	1.0	U
12672-29-6-----	Aroclor-1248	1.0	U
11097-69-1-----	Aroclor-1254	1.0	U
11096-82-5-----	Aroclor-1260	1.0	U

OLIN CHEMICAL CORP
METHOD 8015 - METHANOL
ANALYSIS DATA SHEET

0073

Client No.

OBA-12C

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023602

Sample wt/vol: 0.001 (g/mL) ML

Lab File ID: _____

Level: (low/med) Low

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: not dec. _____

Date Analyzed: 01/26/94

GC Column: _____ Dia: _____ (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

CONCENTRATION UNITS:

(ug/L or ug/Kg) MG/L

Q

CAS NO. COMPOUND

67-56-1-----Methanol

0.55 U

INORGANIC ANALYSES DATA SHEET

OBA12C

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: OBA12

Matrix (soil/water): WATER Lab Sample ID: 3602

Level (low/med): LOW Date Received: 01/21/94

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	0.20	U		CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB SAMPLE ID: A4023602-ST000836
CLIENT SAMPLE ID: OBA-12C

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
ANALYSIS DATA SHEET

0015

Client No.

EB-1

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: A4024503

Sample wt/vol: 5.00 (g/mL) ML Lab File ID: L7853.MSO

Level: (low/med) LOW Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____ Heated Purge: N Date Analyzed: 01/26/94

GC Column: DB-624 ID: 0.53 (mm) Dilution Factor: 1.00

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

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	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	2	J
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	7	J
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
108-88-3-----	Toluene	10	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10	U
108-90-7-----	Chlorobenzene	10	U
100-41-4-----	Ethyl benzene	10	U
100-42-5-----	Styrene	10	U
1330-20-7-----	Total Xylenes	10	U
108-05-4-----	Vinyl acetate	10	U

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0016

Client No.

EB-1

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: A4024503

Sample wt/vol: 5.00 (g/mL) ML Lab File ID: L7853.MSO

Level: (low/med) LOW Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____ Date Analyzed: 01/26/94

GC Column: DB-624 ID: 0.53 (mm) Dilution Factor: 1.00

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

Number TICs found: 0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

CAS NO.	Compound Name	RT	Est. Conc.	Q

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0035

Client No.

EB-1

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024503

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16495X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/03/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND		
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-----	Bis(2-chloroisopropyl) ether	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-----	Dimethyl phthalate	10	U
208-96-8-----	Acenaphthylene	10	U
606-20-2-----	2,6-Dinitrotoluene	10	U
99-09-2-----	3-Nitroaniline	25	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0036

Client No.

EB-1

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024503

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16495X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/03/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND			
83-32-9-----	Acenaphthene	10		U
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-----	Diethyl phthalate	10		U
7005-72-3-----	4-Chlorodiphenylether	10		U
86-73-7-----	Fluorene	25		U
100-01-6-----	4-Nitroaniline	25		U
534-52-1-----	4,6-Dinitro-2-methylphenol	10		U
86-30-6-----	N-nitrosodiphenylamine	10		U
101-55-3-----	4-Bromophenyl phenyl ether	10		U
118-74-1-----	Hexachlorobenzene	25		U
87-86-5-----	Pentachlorophenol	10		U
85-01-8-----	Phenanthrene	10		U
120-12-7-----	Anthracene	10		U
84-74-2-----	Di-n-butyl phthalate	10		U
206-44-0-----	Fluoranthene	10		U
129-00-0-----	Pyrene	10		U
85-68-7-----	Butyl benzyl phthalate	10		U
91-94-1-----	3,3'-Dichlorobenzidine	10		U
56-55-3-----	Benzo(a)anthracene	10		U
218-01-9-----	Chrysene	0.4		J
117-81-7-----	Bis(2-ethylhexyl) phthalate	10		U
117-84-0-----	Di-n-octyl phthalate	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-----	Dibenzo(a,h)anthracene	10		U
191-24-2-----	Benzo(ghi)perylene	10		U
65-85-0-----	Benzoic acid	10		U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0037

Client No.

EB-1

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____

SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024503

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16495X.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/03/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND		
100-51-6-----	Benzyl alcohol	10	U
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0038

Client No.

EB-1

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Sample wt/vol: 1000.0 (g/mL) ML

Level: (low/med) LOW

% Moisture: _____ decanted: (Y/N) N

Concentrated Extract Volume: 1000 (uL)

Injection Volume: 2.00 (uL)

GPC Cleanup: (Y/N) N pH: 7.0

Number TICs found: 1

Lab Sample ID: A4024503

Lab File ID: 16495X.MSO

Date Samp/Recv: 01/24/94 01/24/94

Date Extracted: 01/27/94

Date Analyzed: 02/03/94

Dilution Factor: 1.00

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

CAS NO.	Compound Name	RT	Est. Conc.	Q
1.	CYCLOHEXEN-1-OL ISOMER	6.33	5	BJ

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

EB1

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884SAS No.: _____ SDG No.: OBA12Matrix: (soil/water) WATERLab Sample ID: A4024503Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: 01/24/94Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 01/26/94Concentrated Extract Volume: 10000 (uL)Date Analyzed: 01/29/94Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) Y

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q
319-84-6-----	alpha-BHC	0.050 U
319-85-7-----	beta-BHC	0.050 U
319-86-8-----	delta-BHC	0.050 U
58-89-9-----	gamma-BHC (Lindane)	0.050 U
76-44-8-----	Heptachlor	0.050 U
309-00-2-----	Aldrin	0.050 U
1024-57-3-----	Heptachlor epoxide	0.050 U
959-98-8-----	Endosulfan I	0.050 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
7421-93-4-----	Endrin aldehyde	0.10 U
5103-71-9-----	alpha-Chlordane	0.050 U
5103-74-2-----	gamma-Chlordane	0.050 U
8001-35-2-----	Toxaphene	5.0 U
12674-11-2-----	Aroclor-1016	1.0 U
11104-28-2-----	Aroclor-1221	2.0 U
11141-16-5-----	Aroclor-1232	1.0 U
53469-21-9-----	Aroclor-1242	1.0 U
12672-29-6-----	Aroclor-1248	1.0 U
11097-69-1-----	Aroclor-1254	1.0 U
11096-82-5-----	Aroclor-1260	1.0 U

OLIN CHEMICAL CORP
METHOD 8015 - METHANOL
ANALYSIS DATA SHEET

0069

Client No.

EB-1

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024503

Sample wt/vol: 0.001 (g/mL) ML

Lab File ID: _____

Level: (low/med) Low

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____

Date Analyzed: 01/27/94

GC Column: _____ Dia: _____ (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

CONCENTRATION UNITS:

(ug/L or ug/Kg) MG/L

Q

CAS NO. COMPOUND

<u>67-56-1-----Methanol</u>	<u>0.55</u>	<u>U</u>
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INORGANIC ANALYSES DATA SHEET

EB-1

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: OBA12

Matrix (soil/water): WATER

Lab Sample ID: 4503

Level (low/med): LOW

Date Received: 01/24/94

% Solids: 0.0

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

CAS No.	Analyte	Concentration	C	Q	M
7429-90-5	Aluminum				NR
7440-36-0	Antimony				NR
7440-38-2	Arsenic				NR
7440-39-3	Barium				NR
7440-41-7	Beryllium				NR
7440-43-9	Cadmium				NR
7440-70-2	Calcium				NR
7440-47-3	Chromium				NR
7440-48-4	Cobalt				NR
7440-50-8	Copper				NR
7439-89-6	Iron				NR
7439-92-1	Lead				NR
7439-95-4	Magnesium				NR
7439-96-5	Manganese				NR
7439-97-6	Mercury	0.20	U		CV
7440-02-0	Nickel				NR
7440-09-7	Potassium				NR
7782-49-2	Selenium				NR
7440-22-4	Silver				NR
7440-23-5	Sodium				NR
7440-28-0	Thallium				NR
7440-62-2	Vanadium				NR
7440-66-6	Zinc				NR
	Cyanide				NR

Color Before: Clarity Before: Texture:

Color After: Clarity After: Artifacts:

Comments:

LAB_SAMPLE_ID: A4024503-ST000836

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
ANALYSIS DATA SHEET

0033

Client No.

TRIP BLANK

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023604

Sample wt/vol: 5.00 (g/mL) ML

Lab File ID: L7816.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: not dec. _____ Heated Purge: N Date Analyzed: 01/25/94

GC Column: DB-624 ID: 0.53 (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND		
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
108-88-3-----	Toluene	10	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10	U
108-90-7-----	Chlorobenzene	10	U
100-41-4-----	Ethyl benzene	10	U
100-42-5-----	Styrene	10	U
1330-20-7-----	Total Xylenes	10	U
108-05-4-----	Vinyl acetate	10	U

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0034

Client No.

TRIP BLANK

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023604

Sample wt/vol: 5.00 (g/mL) ML

Lab File ID: L7816.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: not dec. _____

Date Analyzed: 01/25/94

GC Column: DB-624 ID: 0.53 (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

Number TICs found: 0

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

CAS NO.	Compound Name	RT	Est. Conc.	Q

OLIN CHEMICAL CORP
METHOD 8015 - METHANOL
ANALYSIS DATA SHEET

0076

Client No.

TRIP BLANK

Lab Name: Recra Environmental

Contract: NY4A4884

Lab Code: RECNY Case No.: 4884

SAS No.: _____

SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4023604

Sample wt/vol: 0.001 (g/mL) ML

Lab File ID: _____

Level: (low/med) Low

Date Samp/Recv: 01/21/94 01/21/94

% Moisture: not dec. _____

Date Analyzed: 01/27/94

GC Column: _____ Dia: (mm)

Dilution Factor: 1.00

Soil Extract Volume: (uL)

Soil Aliquot Volume: (uL)

CONCENTRATION UNITS:

(ug/L or ug/Kg)

MG/L

Q

CAS NO. COMPOUND

67-56-1-----Methanol

0.55

U

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
ANALYSIS DATA SHEET

0031

Client No.

TB-2

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024504

Sample wt/vol: 5.00 (g/mL) ML

Lab File ID: L7852.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____ Heated Purge: N Date Analyzed: 01/26/94

GC Column: DB-624 ID: 0.53 (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	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
108-88-3-----	Toluene	10	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10	U
108-90-7-----	Chlorobenzene	10	U
100-41-4-----	Ethyl benzene	10	U
100-42-5-----	Styrene	10	U
1330-20-7-----	Total Xylenes	10	U
108-05-4-----	Vinyl acetate	10	U

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0032

Client No.

TB-2

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: A4024504

Sample wt/vol: 5.00 (g/mL) ML

Lab File ID: L7852.MSO

Level: (low/med) LOW

Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____

Date Analyzed: 01/26/94

GC Column: DB-624 ID: 0.53 (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

Number TICs found: 0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

CAS NO.	Compound Name	RT	Est. Conc.	Q

OLIN CHEMICAL CORP
METHOD 8015 - METHANOL
ANALYSIS DATA SHEET

0075

Client No.

TB-2

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: A4024504

Sample wt/vol: 0.001 (g/mL) ML Lab File ID: _____

Level: (low/med) Low Date Samp/Recv: 01/24/94 01/24/94

% Moisture: not dec. _____ Date Analyzed: 01/27/94

GC Column: _____ Dia: (mm) Dilution Factor: 1.00

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

CONCENTRATION UNITS:

(ug/L or ug/Kg) MG/L Q

CAS NO.	COMPOUND		
67-56-1-----	Methanol	0.55	U

APPENDIX C

QC Summary Forms

APPENDIX C-1

DuPont/Olin Groundwater Split Samples

October 1993

FORM 2A
ANALYTICAL QA/QC: HOLDING
TIME WORKSHEET

DuPont/Olin Groundwater Split Samples

Location: DuPont/Olin Split - Niagara Falls
 Data Type: CLP
 Quarter: 4th
 Year: 1993
 Auditor: TMV
 Reviewer: AJM
 Page: 1 of 1

SOIL ID	DATE RECEIVED	MERCURY		BNAs			PESTICIDES/PCBs				
		DATE ANALYZED	NO. OF DAYS	DATE EXTRACTED	NO. OF DAYS	DATE ANALYZED	NO. OF DAYS BETWEEN EXTRACTION & ANALYSIS	DATE EXTRACTED	NO. OF DAYS	DATE ANALYZED	NO. OF DAYS BETWEEN EXTRACTION & ANALYSIS
MW-15A	10/07/93	10/28/93	21	10/12/93	5	10/18/93	6	10/12/93	5	11/05/93	24
MW-15CD	10/15/93	10/28/93	13	10/19/93	4	11/03/93	15	10/19/93	4	11/05/93	17
MW-15CD DL	10/15/93			10/19/93	4	11/03/93	15				
MW-19A	10/15/93	10/28/93	13	10/19/93	4	11/03/93	15	10/19/93	4	11/05/93	17
MW-19B	10/15/93	10/28/93	13	10/19/93	4	11/03/93	15	10/19/93	4	11/05/93	17
MW-19CD-1	10/15/93	10/28/93	13	10/19/93	4	11/03/93	15	10/19/93	4	11/05/93	17
MW-20B	10/15/93	10/28/93	13	10/19/93	4	11/03/93	15	10/19/93	4	11/05/93	17
MW-22B	10/29/93	11/05/93	7	11/02/93	4	11/04/93	2	11/03/93	5	11/11/93	8
MW-22C	10/29/93	11/05/93	7	11/02/93	4	11/03/93	1	11/03/93	5	11/11/93	8
MW-22D	10/29/93	11/05/93	7	11/02/93	4	11/03/93	1	11/03/93	5	11/11/93	8
MW-22F	10/29/93	11/05/93	7	11/02/93	4	11/04/93	2	11/03/93	5	11/11/93	8
MW-26CD	10/29/93	11/05/93	7	11/02/93	4	11/04/93	2	11/03/93	5	11/11/93	8
QA-1	10/15/93	10/28/93	13	10/19/93	4	11/03/93	15	10/19/93	4	11/05/93	17
EB-1	10/29/93	11/05/93	7	11/02/93	4	11/04/93	2	11/03/93	5	11/11/93	8

J0090

2C
WATER SEMIVOLATILE SURROGATE RECOVERY

Lab Name: RECRA ENVIRON

Contract: NY93-577

Lab Code: RECNY

Case No.: 4820

SAS No.: _____

SDG No.: OLINSP

	EPA SAMPLE NO.	S1 (NBZ) #	S2 (FBP) #	S3 (TPH) #	S4 (PHL) #	S5 (2FP) #	S6 (TBP) #	S7 (2CP) #	S8 (DCB) #	TOT OUT
01	EB1	94	93	84	86	80	81	86	93	0
02	MW15A	88	78	61	96	97	97	96	80	0
03	MW15CD	75	72	50	69	72	86	75	65	0
04	MW15CDDL	73 D	69 D	51 D	64 D	71 D	83 D	71 D	62 D	0
05	MW19A	68	70	43	58	66	83	70	59	0
06	MW19B	70	69	56	59	70	77	70	64	0
07	MW19CD1	81	66	83	76	70	93	75	57	0
08	MW20B	85	71	35	80	74	92	82	63	0
09	MW22B	91	84	67	68	63	65	75	81	0
10	MW22C	90	82	52	87	77	90	82	82	0
11	MW22D	92	85	60	84	75	89	83	84	0
12	MW22F	91	86	64	84	79	88	84	84	0
13	MW26CD	90	83	37	84	71	85	83	85	0
14	QA1	65	53	61	56	66	67	62	50	0
15	MW22BMS	84	87	59	75	63	70	78	80	0
16	MW22BMSD	87	86	61	77	76	75	80	84	0
17	SBLK81	96	91	100	98	93	87	98	83	0
18	SBLK83	84	84	93	77	85	87	84	73	0
19	SBLK85	84	81	83	82	68	74	76	79	0

QC LIMITS

S1 (NBZ) = Nitrobenzene-d5	(35-114)
S2 (FBP) = 2-Fluorobiphenyl	(43-116)
S3 (TPH) = Terphenyl-d14	(33-141)
S4 (PHL) = Phenol-d5	(10-110)
S5 (2FP) = 2-Fluorophenol	(21-110)
S6 (TBP) = 2,4,6-Tribromophenol	(10-123)
S7 (2CP) = 2-Chlorophenol-d4	(33-110) (advisory)
S8 (DCB) = 1,2-Dichlorobenzene-d4	(16-110) (advisory)

Column to be used to flag recovery values

* Values outside of contract required QC limits

D Surrogate diluted out

J0091

2E
WATER PESTICIDE SURROGATE RECOVERY

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPGC Column(1): DB608ID: 0.53 (mm)GC Column(2): DB1701 ID: 0.53 (mm)

EPA SAMPLE NO.	TCX 1 %REC #	TCX 2 %REC #	DCB 1 %REC #	DCB 2 %REC #	OTHER (1)	OTHER (2)	TOT OUT
01 PBLK96	70	69	69	66			0
02 PBLK45	76	74	74	71			0
03 PBLK59	80	80	81	82			0
04 EB1	91	76	60	48*			1
05 MW15A	78	78	82	82			0
06 MW15CD	95	73	0D	0D			2
07 MW19A	62	62	27*	26*			3
08 MW19B	63	59*	25*	22*			1
09 MW19CD1	78	67	52*	60			2
10 MW20B	70	66	20*	18*			0
11 MW22B	83	81	72	72			1
12 MW22C	124	77	65	57*			0
13 MW22D	90	90	70	70			2
14 MW22F	84	82	42*	44*			2
15 MW26CD	70	68	39*	39*			3
16 QA1	60	58*	35*	32*			0
17 MW22BMS	86	82	70	70			0
18 MW22BMSD	88	82	70	65			0

ADVISORY
QC LIMITS

(60-150)

(60-150)

TCX = Tetrachloro-m-xylene

DCB = Decachlorobiphenyl

Column to be used to flag recovery values

* Values outside of contract required QC limits

D Surrogate diluted out

10092

3C

WATER SEMIVOLATILE MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix Spike - EPA Sample No.: MW22B

COMPOUND	SPIKE ADDED (ug/L)	SAMPLE CONCENTRATION (ug/L)	MS CONCENTRATION (ug/L)	MS % REC #	QC LIMITS REC.
Phenol	75.00	0	48.38	65	12-110
2-Chlorophenol	75.00	0	52.90	71	27-123
1,4-Dichlorobenzene	50.00	0	38.62	77	36- 97
N-Nitroso-di-n-prop. (1)	50.00	0	30.77	62	41-116
1,2,4-Trichlorobenzene	50.00	0	38.51	77	39- 98
4-Chloro-3-methylphenol	75.00	0	45.56	61	23- 97
Acenaphthene	50.00	0	32.66	65	46-118
4-Nitrophenol	75.00	0	57.45	77	10- 80
2,4-Dinitrotoluene	50.00	0	42.08	84	24- 96
Pentachlorophenol	75.00	0	63.25	84	9-103
Pyrene	50.00	0	38.22	76	26-127

COMPOUND	SPIKE ADDED (ug/L)	MSD CONCENTRATION (ug/L)	MSD % REC #	MSD % RPD #	QC LIMITS RPD	QC LIMITS REC.
Phenol	75.00	47.08	63	3	42	12-110
2-Chlorophenol	75.00	56.55	75	5	40	27-123
1,4-Dichlorobenzene	50.00	38.24	76	1	28	36- 97
N-Nitroso-di-n-prop. (1)	50.00	29.76	60	3	38	41-116
1,2,4-Trichlorobenzene	50.00	39.14	78	1	28	39- 98
4-Chloro-3-methylphenol	75.00	48.35	64	5	42	23- 97
Acenaphthene	50.00	32.30	65	0	31	46-118
4-Nitrophenol	75.00	62.00	83 *	8	50	10- 80
2,4-Dinitrotoluene	50.00	40.77	82	2	38	24- 96
Pentachlorophenol	75.00	65.75	88	5	50	9-103
Pyrene	50.00	40.46	81	6	31	26-127

(1) N-Nitroso-di-n-propylamine

Column to be used to flag recovery and RPD values with an asterisk

* Values outside of QC limits

RPD: 0 out of 11 outside limitsSpike Recovery: 1 out of 22 outside limitsCOMMENTS: ,,,MW22B,,,AS048368, JOB 3683 BN7577
AUTOSAMPLR I50W

30093

3E

WATER PESTICIDE MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix Spike - EPA Sample No.: MW22B

COMPOUND	SPIKE ADDED (ug/L)	SAMPLE CONCENTRATION (ug/L)	MS CONCENTRATION (ug/L)	MS % REC #	QC LIMITS REC.
gamma-BHC (Lindane) _____	0.625	0	0.646	103	56-123
Heptachlor _____	0.625	0	0.581	93	40-131
Aldrin _____	0.625	0	0.532	85	40-120
Dieldrin _____	1.250	0	1.29	103	52-126
Endrin _____	1.250	0	1.41	113	56-121
4,4'-DDT _____	1.250	0	1.20	96	38-127

COMPOUND	SPIKE ADDED (ug/L)	MSD CONCENTRATION (ug/L)	MSD % REC #	% RPD #	QC LIMITS RPD	REC.
gamma-BHC (Lindane) _____	0.625	0.660	106	3	15	56-123
Heptachlor _____	0.625	0.635	102	9	20	40-131
Aldrin _____	0.625	0.600	96	12	22	40-120
Dieldrin _____	1.250	1.33	106	3	18	52-126
Endrin _____	1.250	1.49	119	5	21	56-121
4,4'-DDT _____	1.250	1.28	102	6	27	38-127

Column to be used to flag recovery and RPD values with an asterisk

* Values outside of QC limits

RPD: 0 out of 6 outside limitsSpike Recovery: 0 out of 12 outside limits

COMMENTS:

1003a

U.S. EPA - CLP

5A
SPIKE SAMPLE RECOVERY

EPA SAMPLE NO.

Lab Name: RECRa ENVIRONMENTAL INC.

Contract:NY93-650R

MW-22BS

Lab Code: RECNY

Case No.: 4820

SAS No.:

SDG No.: OLINSP

Matrix: WATER

Matrix: Solids for Saini

Level (low/med) : LOW

Solids for Sample: 0.0

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

Comments:

U.S. EPA - CLP

30095

6
DUPLICATES

EPA SAMPLE NO.

MW-22BD

ab Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650R

Lab Code: RECNV Case No.: 4820_ SAS No.: _____ SDG No.: OLINSP

Matrix (soil/water): WATER Level (low/med): LOW

: Solids for Sample: 0.0 % Solids for Duplicate: 0.0

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

J0096

EPA SAMPLE NO.

4B

SEMIVOLATILE METHOD BLANK SUMMARY

SBLK81

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820 SAS No.: _____ SDG No.: OLINSPLab File ID: 15494YLab Sample ID: AM003594Instrument ID: I50YDate Extracted: 10/12/93Matrix: (soil/water) WATERDate Analyzed: 10/18/93Level: (low/med) LOWTime Analyzed: 1358

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED
01 MW15A	AS046888	15495Y	10/18/93

COMMENTS: SBLK81 JOB3397 BN7334
AUTOSAMPLR I50Y

0097

1B
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

SBLK81

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820 SAS No.: _____SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AM003594Sample wt/vol: 1000 (g/mL) MLLab File ID: 15494YLevel: (low/med) LOW

Date Received: _____

% Moisture: _____ decanted: (Y/N) Date Extracted: 10/12/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 10/18/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND	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-----	Dimethyl Phthalate	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
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

Lab Name: RECRA ENVIRON

Contract: NY93-577

SBLK81

Lab Code: RECNY

Case No.: 4820

SAS No.: _____

SDG No.: OLINSP

Matrix: (soil/water) WATER

Lab Sample ID: AM003594

Sample wt/vol: 1000 (g/mL) ML

Lab File ID: 15494Y

Level: (low/med) LOW

Date Received: _____

% Moisture: _____ decanted: (Y/N)

Date Extracted: 10/12/93

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 10/18/93

Injection Volume: 2.0 (uL)

Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

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

CAS NO.	COMPOUND	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	10 U
117-84-0-----	Di-n-Octyl Phthalate	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

1X
ORGANICS ANALYSIS DATA SHEET

SAMPLE NO.

SBLK81

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820 SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AM003594Sample wt/vol: 1000 (g/mL) MLLab File ID: 15494YLevel: (low/med) LOW

Date Received: _____

% Moisture: _____ decanted: (Y/N) NDate Extracted: 10/12/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 10/18/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q	
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

1F
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

SBLK81

Lab Name: RECRA ENVIRON

Contract: NY93-577

Lab Code: RECNY Case No.: 4820 SAS No.: _____ SDG No.: OLINSP

Matrix: (soil/water) WATER

Lab Sample ID: AM003594

Sample wt/vol: 1000 (g/mL) ML

Lab File ID: 15494Y

Level: (low/med) LOW

Date Received: _____

% Moisture: _____ decanted: (Y/N)

Date Extracted: 10/12/93

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 10/18/93

Injection Volume: 2.0 (uL)

Dilution Factor: 1.0

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

Number TICs found: 1

(ug/L or ug/Kg) UG/L

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	CYCLOHEXEN-1-OL ISOMER	5.25	8	J

JO161

EPA SAMPLE NO.

4B

SEMIVOLATILE METHOD BLANK SUMMARY

SBLK83

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPLab File ID: 13841WLab Sample ID: AM003595Instrument ID: I50WDate Extracted: 10/19/93Matrix: (soil/water) WATERDate Analyzed: 11/03/93Level: (low/med) LOWTime Analyzed: 0339

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED
01 MW15CD	AS047418	13846W	11/03/93
02 MW15CDDL	AS047418DL	13859W	11/03/93
03 MW19A	AS047416	13844W	11/03/93
04 MW19B	AS047417	13845W	11/03/93
05 MW19CD1	AS047415	13843W	11/03/93
06 MW20B	AS047414	13842W	11/03/93
07 QA1	AS047419	13854W	11/03/93

COMMENTS: ,,, SBLK83,,, JOB 3485
AUTOSAMPLR I50W

1B
SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

SBLK83

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AM003595Sample wt/vol: 1000 (g/mL) MLLab File ID: 13841WLevel: (low/med) LOW

Date Received: _____

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	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	Dimethyl Phthalate	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

EPA SAMPLE NO.

1C

SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

SBLK83

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AM003595Sample wt/vol: 1000 (g/mL) MLLab File ID: 13841WLevel: (low/med) LOW

Date Received: _____

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND			
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	1	J	
117-84-0-----	Di-n-Octyl Phthalate	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	

1X
ORGANICS ANALYSIS DATA SHEET

SAMPLE NO.

SBLK83

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AM003595Sample wt/vol: 1000 (g/mL) MLLab File ID: 13841WLevel: (low/med) LOW

Date Received: _____

% Moisture: _____ decanted: (Y/N) NDate Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND		
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

30105

EPA SAMPLE NO.

1F
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

Lab Name: RECRA ENVIRONContract: NY93-577

SBLK83

Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AM003595Sample wt/vol: 1000 (g/mL) MLLab File ID: 13841WLevel: (low/med) LOW

Date Received: _____

% Moisture: _____ decanted: (Y/N) Date Extracted: 10/19/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
=====	=====	=====	=====	=====

JO106

EPA SAMPLE NO.

4B

SEMIVOLATILE METHOD BLANK SUMMARY

Lab Name: RECRA ENVIRON

Contract: NY93-577

SBLK85

Lab Code: RECNY Case No.: 4820

SAS No.: SDG No.: OLINSP

Lab File ID: 13864W

Lab Sample ID: AM003589

Instrument ID: I50W

Date Extracted: 11/02/93

Matrix: (soil/water) WATER

Date Analyzed: 11/03/93

Level: (low/med) LOW

Time Analyzed: 2151

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

	EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED
01	EB1	AS048370	13872W	11/04/93
02	MW22B	AS048368	13868W	11/04/93
03	MW22C	AS048365	13865W	11/03/93
04	MW22D	AS048366	13866W	11/03/93
05	MW22F	AS048367	13867W	11/04/93
06	MW26CD	AS048369	13871W	11/04/93
07	MW22BMS	AS048368MS	13869W	11/04/93
08	MW22BMSD	AS048368SD	13870W	11/04/93

COMMENTS: ,,, SBLK85, ,,, JOB 3683 BN7565
AUTOSAMPLR I50W

J0107

EPA SAMPLE NO.

1B

SEMOVOLATILE ORGANICS ANALYSIS DATA SHEET

SBLK85

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNYCase No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AM003589Sample wt/vol: 1000 (g/mL) MLLab File ID: 13864WLevel: (low/med) LOW

Date Received: _____

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND	10	U
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-----	Dimethyl Phthalate	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
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

SBLK85

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820

SAS No.: _____

SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AM003589Sample wt/vol: 1000 (g/mL) MLLab File ID: 13864WLevel: (low/med) LOW

Date Received: _____

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND	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	10 U
117-84-0-----	Di-n-Octyl Phthalate	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

1X
ORGANICS ANALYSIS DATA SHEET

SAMPLE NO.

SBLK85

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AM003589Sample wt/vol: 1000 (g/mL) MLLab File ID: 13864WLevel: (low/med) LOW

Date Received: _____

% Moisture: _____ decanted: (Y/N) NDate Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	10	U
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

10110

EPA SAMPLE NO.

1F
SEMIVOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

SBLK85

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AM003589Sample wt/vol: 1000 (g/mL) MLLab File ID: 13864WLevel: (low/med) LOW

Date Received: _____

% Moisture: _____ decanted: (Y/N) _____

Date Extracted: 11/02/93Concentrated Extract Volume: 1000 (uL)Date Analyzed: 11/03/93Injection Volume: 2.0 (uL)Dilution Factor: 1.0GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

Number TICs found: 3(ug/L or ug/Kg) UG/L

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	OXYGENATED COMPOUND	5.57	9	J
2.	UNKNOWN	5.92	38	J
3.	CYCLOHEXEN-1-OL ISOMER	6.68	9	J

1011

4C

EPA SAMPLE NO.

PESTICIDE METHOD BLANK SUMMARY

PBLK45

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPLab Sample ID: AG001320

Lab File ID: _____

Matrix: (soil/water) WATERExtraction: (SepF/Cont/Sonc) SEPFSulfur Cleanup: (Y/N) NDate Extracted: 10/19/93Date Analyzed (1): 11/04/93Date Analyzed (2): 11/04/93Time Analyzed (1): 0541Time Analyzed (2): 0541Instrument ID (1): 5890A9Instrument ID (2): 5890B9GC Column (1): DB608 ID: 0.53 (mm) GC Column (2): DB1701 ID: 0.53 (mm)

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

EPA SAMPLE NO.	LAB SAMPLE ID	DATE ANALYZED 1	DATE ANALYZED 2
01 MW15CD	AS047418	11/05/93	11/05/93
02 MW19A	AS047416	11/05/93	11/05/93
03 MW19B	AS047417	11/05/93	11/05/93
04 MW19CD1	AS047415	11/05/93	11/05/93
05 MW20B	AS047414	11/05/93	11/05/93
06 QA1	AS047419	11/05/93	11/05/93

COMMENTS:

0112

EPA SAMPLE NO.

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

PBLK45

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AG001320Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: _____

Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 10/19/93Concentrated Extract Volume: 10000 (uL)Date Analyzed: 11/04/93Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) N

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) <u>UG/L</u>	Q
319-84-6-----	alpha-BHC	0.050	U
319-85-7-----	beta-BHC	0.050	U
319-86-8-----	delta-BHC	0.050	U
58-89-9-----	gamma-BHC (Lindane)	0.050	U
76-44-8-----	Heptachlor	0.050	U
309-00-2-----	Aldrin	0.050	U
1024-57-3-----	Heptachlor epoxide	0.050	U
959-98-8-----	Endosulfan I	0.050	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
7421-93-4-----	Endrin aldehyde	0.10	U
5103-71-9-----	alpha-Chlordane	0.050	U
5103-74-2-----	gamma-Chlordane	0.050	U
8001-35-2-----	Toxaphene	5.0	U
12674-11-2-----	Aroclor-1016	1.0	U
11104-28-2-----	Aroclor-1268	2.0	U
11141-16-5-----	Aroclor-1232	1.0	U
53469-21-9-----	Aroclor-1242	1.0	U
12672-29-6-----	Aroclor-1248	1.0	U
11097-69-1-----	Aroclor-1254	1.0	U
11096-82-5-----	Aroclor-1260	1.0	U

J0113

EPA SAMPLE NO.

4C

PESTICIDE METHOD BLANK SUMMARY

PBLK59

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPLab Sample ID: AG001335

Lab File ID: _____

Matrix: (soil/water) WATERExtraction: (SepF/Cont/Sonc) SEPFSulfur Cleanup: (Y/N) YDate Extracted: 11/03/93Date Analyzed (1): 11/11/93Date Analyzed (2): 11/11/93Time Analyzed (1): 0438Time Analyzed (2): 0438Instrument ID (1): 5890A9Instrument ID (2): 5890B9GC Column (1): DB608 ID: 0.53 (mm) GC Column (2): DB1701 ID: 0.53 (mm)

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

EPA SAMPLE NO.	LAB SAMPLE ID	DATE ANALYZED 1	DATE ANALYZED 2
01 EB1	AS048370	11/11/93	11/11/93
02 MW22B	AS048368	11/11/93	11/11/93
03 MW22C	AS048365	11/11/93	11/11/93
04 MW22D	AS048366	11/11/93	11/11/93
05 MW22F	AS048367	11/11/93	11/11/93
06 MW26CD	AS048369	11/11/93	11/11/93
07 MW22BMS	AS048368MS	11/11/93	11/11/93
08 MW22BMSD	AS048368SD	11/11/93	11/11/93

COMMENTS:

J0114

EPA SAMPLE NO.

1D

PESTICIDE ORGANICS ANALYSIS DATA SHEET

PBLK59

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATERLab Sample ID: AG001335Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: _____

Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 11/03/93Concentrated Extract Volume: 10000 (uL)Date Analyzed: 11/11/93Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) Y

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	Q
319-84-6-----	alpha-BHC	0.050 U
319-85-7-----	beta-BHC	0.050 U
319-86-8-----	delta-BHC	0.050 U
58-89-9-----	gamma-BHC (Lindane)	0.050 U
76-44-8-----	Heptachlor	0.050 U
309-00-2-----	Aldrin	0.050 U
1024-57-3-----	Heptachlor epoxide	0.050 U
959-98-8-----	Endosulfan I	0.050 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
7421-93-4-----	Endrin aldehyde	0.10 U
5103-71-9-----	alpha-Chlordane	0.050 U
5103-74-2-----	gamma-Chlordane	0.050 U
8001-35-2-----	Toxaphene	5.0 U
12674-11-2-----	Aroclor-1016	1.0 U
11104-28-2-----	Aroclor-1268	2.0 U
11141-16-5-----	Aroclor-1232	1.0 U
53469-21-9-----	Aroclor-1242	1.0 U
12672-29-6-----	Aroclor-1248	1.0 U
11097-69-1-----	Aroclor-1254	1.0 U
11096-82-5-----	Aroclor-1260	1.0 U

0115

4C
PESTICIDE METHOD BLANK SUMMARY

EPA SAMPLE NO.

PBLK96

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820SAS No.: _____ SDG No.: OLINSPLab Sample ID: AG001264

Lab File ID: _____

Matrix: (soil/water) WATERExtraction: (SepF/Cont/Sonc) SEPFSulfur Cleanup: (Y/N) YDate Extracted: 10/12/93Date Analyzed (1): 11/05/93Date Analyzed (2): 11/05/93Time Analyzed (1): 0513Time Analyzed (2): 0513Instrument ID (1): 5890A9Instrument ID (2): 5890B9GC Column (1): DB608 ID: 0.53 (mm) GC Column (2): DB1701 ID: 0.53 (mm)

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

	EPA SAMPLE NO.	LAB SAMPLE ID	DATE ANALYZED 1	DATE ANALYZED 2
01	<u>MW15A</u>	<u>AS046888</u>	<u>11/05/93</u>	<u>11/05/93</u>

COMMENTS:

J0116

EPA SAMPLE NO.

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

PBLK96

Lab Name: RECRA ENVIRONContract: NY93-577Lab Code: RECNY Case No.: 4820 SAS No.: _____ SDG No.: OLINSPMatrix: (soil/water) WATER Lab Sample ID: AG001264Sample wt/vol: 1000 (g/mL) ML Lab File ID: _____

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

Extraction: (SepF/Cont/Sonc) SEPF Date Extracted: 10/12/93Concentrated Extract Volume: 10000 (uL) Date Analyzed: 11/05/93Injection Volume: 1.00 (uL) Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0 Sulfur Cleanup: (Y/N) Y

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

Q

CAS NO.	COMPOUND	Q
319-84-6-----	alpha-BHC	0.050 U
319-85-7-----	beta-BHC	0.050 U
319-86-8-----	delta-BHC	0.050 U
58-89-9-----	gamma-BHC (Lindane)	0.050 U
76-44-8-----	Heptachlor	0.050 U
309-00-2-----	Aldrin	0.050 U
1024-57-3-----	Heptachlor epoxide	0.050 U
959-98-8-----	Endosulfan I	0.050 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
7421-93-4-----	Endrin aldehyde	0.10 U
5103-71-9-----	alpha-Chlordane	0.050 U
5103-74-2-----	gamma-Chlordane	0.050 U
8001-35-2-----	Toxaphene	5.0 U
12674-11-2-----	Aroclor-1016	1.0 U
11104-28-2-----	Aroclor-1268	2.0 U
11141-16-5-----	Aroclor-1232	1.0 U
53469-21-9-----	Aroclor-1242	1.0 U
12672-29-6-----	Aroclor-1248	1.0 U
11097-69-1-----	Aroclor-1254	1.0 U
11096-82-5-----	Aroclor-1260	1.0 U

3
BLANKS

ab Name: RECRA ENVIRONMENTAL INC.

Contract: NY93-650R

Lab Code: RECNY

Case No.: 4820

SAS No.:

SDG No.: OLINSP

Preparation Blank Matrix (soil/water): WATER

Preparation Blank Concentration Units (ug/L or mg/kg): UG/L

3
BLANKS

Sub Name: RECREA ENVIRONMENTAL INC.

Contract: NY93-650R

Lab Code: RECNY

Case No.: 4820

SAS No.: _____

SDG No.: OLINSPI

Preparation Blank Matrix (soil/water): WATER

Preparation Blank Concentration Units (ug/L or mg/kg): UG/L

FORM 8
ANALYTICAL QA/QC: EQUIPMENT
BLANK WORKSHEET

DuPont/Olin Groundwater Split Samples

Olin Rinsate Blank*

Location: Olin Niagara Falls
Data Type: CLP
Quarter: 4th
Year: 1993
Auditor: AJM
Reviewer: MSJ
Page: 1 of 3

DATE	SAMPLE ID	COMPOUND	COMPOUND	COMPOUND	COMPOUND
10/29/93	EB-1	bis(2-ethylhexyl) phthalate	TIC oxygenated compound	TIC-unknown	TIC-cyclohexen-1-ol-isomer
		0.8 ug/l	5 ug/l	38 ug/l	11 ug/l

* Detected in semi-VOC fraction

FORM 8
ANALYTICAL QA/QC: EQUIPMENT
BLANK WORKSHEET

DuPont/Olin Groundwater Split Samples

Olin Rinsate Blank*

Location: Olin Niagara Falls
Data Type: CLP
Quarter: 4th
Year: 1993
Auditor: AJM
Reviewer: MSJ
Page: 2 of 3

DATE	SAMPLE ID	COMPOUND	COMPOUND
10/29/93	EB-1 (cont.)	TIC-2-cyclohexen-1-one	TIC-dichlorocyclohexane isomer
		3 ug/l	2 ug/l

* Detected in semi-VOC fraction

FORM 8
ANALYTICAL QA/QC: EQUIPMENT
BLANK WORKSHEET

DuPont/Niagara Plant Rinsate Blanks*

Location: Olin Niagara Falls
Data Type: CLP
Quarter: 4th
Year: 1993
Auditor: AJM
Reviewer: MSJ
Page: 3 of 3

DATE	SAMPLE ID	COMPOUND
10/07/93	EB-1	Applicable Olin PAL compounds non-detect
10/07/93	EB-2	Applicable Olin PAL compounds non-detect
10/15/93	EB-1	Applicable Olin PAL compounds non-detect
10/15/93	EB-2	Applicable Olin PAL compounds non-detect
10/29/93	EB-1	Applicable Olin PAL compounds non-detect
10/29/93	EB-2	Applicable Olin PAL compounds non-detect

* Associated investigative samples were analyzed for Olin PAL-semi-VOCs, TCL-pest/PCBs and mercury. Equipment blanks are from the DuPont Niagara Plant fourth quarter 1993 sampling, and were only analyzed for the DuPont Indicator Chemicals which included: 2 PAL semi-VOC compounds, 4-TCL pesticides and 7 Aroclors.

APPENDIX C-2

Olin Soil Borings

December 1993

FORM 2A
ANALYTICAL QA/QC: HOLDING
TIME WORKSHEET

Soil Borings

Location: Olin Niagara Falls
 Data Type: CLP
 Quarter: 4th
 Year: 1993
 Auditor: MSJ
 Reviewer: AJM
 Page: 1 of 2

Pesticides/PCBs					
SOIL ID	DATE RECEIVED	DATE EXTRACTED	NO. OF DAYS	DATE ANALYZED	NO. OF DAYS BETWEEN EXTRACTION AND ANALYSIS
NSB 16 1-3	12/15/93	12/21/93	6	01/05/94	15
NSB 16 1-3 DL	12/15/93	12/21/93	6	01/05/94	15
NSB 16 3-5	12/15/93	12/21/93	6	01/05/94	15
NSB 16 3-5 DL	12/15/93	12/21/93	6	01/05/94	15
NSB 16 5-7	12/15/93	12/21/93	6	01/05/94	15
NSB 16 5-7 DL	12/15/93	12/21/93	6	01/06/95	16
NSB 16 7-9	12/15/93	12/21/93	6	01/05/94	15
NSB 16 7-9 DL	12/15/93	12/21/93	6	01/05/94	15
NSB 17 1-3	12/15/93	12/21/93	6	01/05/94	15
NSB 17 1-3 DL	12/15/93	12/21/93	6	01/05/94	15
NSB 17 3-5	12/15/93	12/21/93	6	01/07/94	17
NSB 17 3-5 DL	12/15/93	12/21/93	6	01/07/94	17
NSB 17 5-7	12/15/93	12/21/93	6	01/05/94	15
NSB 17 5-7 DL	12/15/93	12/21/93	6	01/05/94	15
NSB 17 7-9	12/15/93	12/21/93	6	01/07/94	17

FORM 2A
ANALYTICAL QA/QC: HOLDING
TIME WORKSHEET

Soil Borings

Location: Olin Niagara Falls
 Data Type: CLP
 Quarter: 4th
 Year: 1993
 Auditor: TMV
 Reviewer: AJM
 Page: 2 of 2

SOIL ID	DATE SAMPLED	DATE ANALYZED	NO. OF DAYS	TCLP MERCURY					
				TCLP EXTRACTION DATE	NO. OF DAYS FROM COLLECTION	PREPARATIVE EXTRACTION DATE	NO. OF DAYS FROM TCLP EXTRACTION	DATE ANALYZED	NO. OF DAYS FROM PREPARATIVE EXTRACTION
NSB 1 0-2	12/07/93	01/05/94	29	01/04/94	28	01/05/94	1	01/06/94	1
NSB 1 2-4	12/07/93	01/05/94	29	01/04/94	28	01/05/94	1	01/06/94	1
NSB 1 4-6	12/07/93	01/05/94	29	01/04/94	28	01/05/94	1	01/06/94	1
NSB 1 6-8	12/07/93	01/05/94	29	01/04/94	28	01/05/94	1	01/06/94	1
NSB 1 8-10	12/07/93	01/05/94	29	01/04/94	28	01/05/94	1	01/06/94	1
NSB 4 2-4	12/08/93	01/05/94	28	01/04/94	27	01/05/94	1	01/06/94	1
NSB 4 4-6	12/08/93	01/05/94	28	01/04/94	27	01/05/94	1	01/06/94	1
NSB 4 6-8	12/08/93	01/05/94	28	01/04/94	27	01/05/94	1	01/06/94	1
NSB 14 1-3	12/14/93	01/05/94	22	01/04/94	21	01/05/94	1	01/06/94	1
NSB 14 3-5	12/14/93	01/05/94	22	01/04/94	21	01/05/94	1	01/06/94	1
NSB 14 5-7	12/14/93	01/05/94	22	01/04/94	21	01/05/94	1	01/06/94	1
NSB 14 7-9	12/14/93	01/05/94	22	01/04/94	21	01/05/94	1	01/06/94	1

**FORM 2.1
EXCEEDANCE OF HOLDING
TIME LIMITS**

Soil Borings

Location: On Niagara Falls
Data Type: CLP
Quarter: 4th
Year: 93
Auditor: TMV
Reviewer: AJM
Page: 1 of 1

PARAMETER	SAMPLE NUMBER	NO. OF DAYS EXCEEDING HOLD TIMES
Total Mercury	NSB 1 0-2	1
Total Mercury	NSB 1 2-4	1
Total Mercury	NSB 1 4-6	1
Total Mercury	NSB 1 6-8	1
Total Mercury	NSB 1 8-10	1

0047

2F
SOIL PESTICIDE SURROGATE RECOVERY

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNYCase No.: 4884SAS No.: _____ SDG No.: NSB1GC Column(1): DB608ID: 0.53 (mm)GC Column(2): DB1701 ID: 0.53 (mm)

EPA SAMPLE NO.	TCX %REC #	TCX %REC #	DCB %REC #	DCB %REC #	OTHER (1)	OTHER (2)	TOT OUT
01 PBLK19	96	96	185*	96			1
02 NSB1613	OD	OD	OD	OD			0
03 NSB1613DL	OD	OD	OD	OD			0
04 NSB1613MS	OD	OD	OD	OD			0
05 NSB1613MSD	OD	OD	OD	OD			0
06 NSB1635	OD	OD	OD	OD			0
07 NSB1635DL	OD	OD	OD	OD			0
08 NSB1657	OD	OD	OD	OD			0
09 NSB1657DL	OD	OD	OD	OD			0
10 NSB1679	OD	OD	OD	OD			0
11 NSB1679DL	OD	OD	OD	OD			0
12 NSB1713	126	100	161*	82			1
13 NSB1713DL	OD	OD	OD	OD			0
14 NSB1735	97	88	142	115			0
15 NSB1735DL	OD	OD	OD	OD			0
16 NSB1757	OD	OD	OD	OD			0
17 NSB1757DL	OD	OD	OD	OD			0
18 NSB1779	91	82	120	99			0

**ADVISORY
QC LIMITS**

TCX = Tetrachloro-m-xylene

(60-150)

DCB = Decachlorobiphenyl

(60-150)

Column to be used to flag recovery values

* Values outside of contract required QC limits

D Surrogate diluted out

0048

3F
SOIL PESTICIDE MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNYCase No.: 4884

SAS No.: _____

SDG No.: NSB1Matrix Spike - EPA Sample No.: NSB1613

COMPOUND	SPIKE ADDED (ug/Kg)	SAMPLE CONCENTRATION (ug/Kg)	MS CONCENTRATION (ug/Kg)	MS % REC #	QC LIMITS REC.
gamma-BHC (Lindane) _____	18.600	3980	4220	1290 *	46-127
Heptachlor _____	18.600	0	0	0 *	35-130
Aldrin _____	18.600	0	0	0 *	34-132
Dieldrin _____	37.200	0	0	0 *	31-134
Endrin _____	37.200	0	0	0 *	42-139
4,4'-DDT _____	37.200	0	0	0 *	23-134

COMPOUND	SPIKE ADDED (ug/Kg)	MSD CONCENTRATION (ug/Kg)	MSD % REC #	% RPD #	QC LIMITS RPD	REC.
gamma-BHC (Lindane) _____	18.500	2900	-999 *	1573 *	50	46-127
Heptachlor _____	18.500	0	0 *	0	31	35-130
Aldrin _____	18.500	0	0 *	0	43	34-132
Dieldrin _____	37.100	0	0 *	0	38	31-134
Endrin _____	37.100	0	0 *	0	45	42-139
4,4'-DDT _____	37.100	0	0 *	0	50	23-134

Column to be used to flag recovery and RPD values with an asterisk

* Values outside of QC limits

RPD: 1 out of 6 outside limitsSpike Recovery: 12 out of 12 outside limits

COMMENTS:

0049

U.S. EPA - CLP

5A

EPA SAMPLE NO.

SPIKE SAMPLE RECOVERY

NSB102S

Lab Name: RECRA ENVIRONMENTAL INC.

Contract: NY92-650

Lab Code: RECNY

Case No.: 4884

SAS No.: _____

SDG No.: NSB1

Matrix (soil/water): SOIL

Level (low/med): LOW

Solids for Sample: 76.2

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

Analyte	Control Limit %R	Spiked Sample Result (SSR) C	Sample Result (SR) C	Spike Added (SA)	%R	Q	M
Aluminum							NR
Antimony							NR
Arsenic							NR
Barium							NR
Beryllium							NR
Cadmium							NR
Calcium							NR
Chromium							NR
Cobalt							NR
Copper							NR
Iron							NR
Lead							NR
Magnesium							NR
Manganese							CV
Mercury		13643.4803	12559.6717	0.60	180635		
Nickel							NR
Potassium							NR
Selenium							NR
Silver							NR
Sodium							NR
Thallium							NR
Vanadium							NR
Zinc							NR
Cyanide							NR

Comments:

5A

EPA SAMPLE NO.

SPIKE SAMPLE RECOVERY

NSB102S

Lab Name: RECRA ENVIRONMENTAL INC.

Contract: NY92-650

Lab Code: RECNY

Case No.: 4884

SAS No.: _____

SDG No.: NSB1_____

Matrix (soil/water): WATER

Level (low/med): LOW

Solids for Sample: 0.0

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

Analyte	Control Limit %R	Spiked Sample Result (SSR) C	Sample Result (SR) C	Spike Added (SA)	%R	Q	M
Aluminum						NR	
Antimony						NR	
Arsenic						NR	
Barium						NR	
Beryllium						NR	
Cadmium						NR	
Calcium						NR	
Chromium						NR	
Cobalt						NR	
Copper						NR	
Iron						NR	
Lead						NR	
Magnesium						NR	
Manganese						NR	
Mercury		22.7280	21.3720	1.00	135.6	CV	
Nickel						NR	
Potassium						NR	
Selenium						NR	
Silver						NR	
Sodium						NR	
Thallium						NR	
Vanadium						NR	
Zinc						NR	
Cyanide						NR	

Comments:

U.S. EPA - CLP

6
DUPLICATES

EPA SAMPLE NO.

NSB102D

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

b Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): SOIL Level (low/med): LOW

Solids for Sample: 76.2 % Solids for Duplicate: 77.7

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

Analyte	Control Limit	Sample (S) C	Duplicate (D) C	RPD	Q	M
Aluminum					NR	
Antimony					NR	
Arsenic					NR	
Barium					NR	
Beryllium					NR	
Cadmium					NR	
Calcium					NR	
Chromium					NR	
Cobalt					NR	
Copper					NR	
Iron					NR	
Lead					NR	
Magnesium					NR	
Manganese					NR	
Mercury	3147.4	12559.6717	13896.8257	10.1	CV	
Nickel					NR	
Potassium					NR	
Selenium					NR	
Silver					NR	
Sodium					NR	
Thallium					NR	
Vanadium					NR	
Zinc					NR	
Cyanide					NR	

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6
DUPLICATES

EPA SAMPLE NO.

NSB102D

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY92-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: NSB1

Matrix (soil/water): WATER Level (low/med): LOW

Solids for Sample: 0.0 % Solids for Duplicate: 0.0

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

Analyte	Control Limit	Sample (S)	C	Duplicate (D)	C	RPD	Q	M
Aluminum			-		-		-	NR
Antimony			-		-		-	NR
Arsenic			-		-		-	NR
Barium			-		-		-	NR
Beryllium			-		-		-	NR
Cadmium			-		-		-	NR
Calcium			-		-		-	NR
Chromium			-		-		-	NR
Cobalt			-		-		-	NR
Copper			-		-		-	NR
Iron			-		-		-	NR
Lead			-		-		-	NR
Magnesium			-		-		-	NR
Manganese			-		-		-	CV
Mercury		21.3720	-	23.0218	-	7.4	-	NR
Nickel			-		-		-	NR
Potassium			-		-		-	NR
Selenium			-		-		-	NR
Silver			-		-		-	NR
Sodium			-		-		-	NR
Thallium			-		-		-	NR
Vanadium			-		-		-	NR
Zinc			-		-		-	NR
Cyanide			-		-		-	NR

0053

EPA SAMPLE NO.

4C
PESTICIDE METHOD BLANK SUMMARY

PBLK19

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884SAS No.: _____ SDG No.: NSB1Lab Sample ID: AG001514Lab File ID: 2932VMatrix: (soil/water) SOILExtraction: (SepF/Cont/Sonc) SONCSulfur Cleanup: (Y/N) NDate Extracted: 12/21/94 93 ⁴
3/14/94Date Analyzed (1): 01/05/94Date Analyzed (2): 01/05/94Time Analyzed (1): 0447Time Analyzed (2): 0447Instrument ID (1): 5890A9Instrument ID (2): 5890B9GC Column (1): DB608 ID: 0.53 (mm) GC Column (2): DB1701 ID: 0.53 (mm)

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

EPA SAMPLE NO.	LAB SAMPLE ID	DATE ANALYZED 1	DATE ANALYZED 2
01 NSB1613	AS053229	01/05/94	01/05/94
02 NSB1613DL	AS053229DL	01/05/94	01/05/94
03 NSB1613MS	AS053229MS	01/05/94	01/05/94
04 NSB1613MSD	AS053229SD	01/05/94	01/05/94
05 NSB1635	AS053230	01/05/94	01/05/94
06 NSB1635DL	AS053230DL	01/05/94	01/05/94
07 NSB1657	AS053231	01/05/94	01/05/94
08 NSB1657DL	AS053231DL	01/06/94	01/06/94
09 NSB1679	AS053232	01/05/94	01/05/94
10 NSB1679DL	AS053232DL	01/05/94	01/05/94
11 NSB1713	AS053233	01/05/94	01/05/94
12 NSB1713DL	AS053233DL	01/05/94	01/05/94
13 NSB1735	AS053234	01/07/94	01/07/94
14 NSB1735DL	AS053234DL	01/07/94	01/07/94
15 NSB1757	AS053235	01/05/94	01/05/94
16 NSB1757DL	AS053235DL	01/05/94	01/05/94
17 NSB1779	AS053236	01/07/94	01/07/94

COMMENTS:

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE 0054.

PBLK19

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884SAS No.: _____ SDG No.: NSB1Matrix: (soil/water) SOILLab Sample ID: AG001514Sample wt/vol: 30.0 (g/mL) GLab File ID: 2932V

% Moisture: _____ decanted: (Y/N) _____

Date Received: _____

Extraction: (SepF/Cont/Sonc) SONCDate Extracted: 12/21/94 *7/1/94*Concentrated Extract Volume: 5000 (uL)Date Analyzed: 01/05/94Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) Y pH: 7.0CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/KG Q

CAS NO.	COMPOUND	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 U
53494-70-5-----	Endrin ketone	3.3 U
7421-93-4-----	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 U

U.S. EPA - CLP

3
BLANKS

Lab Name: RECRA_ENVIRONMENTAL_INC._

Contract: NY92-650_

Lab Code: RECNY_

Case No.: 4884_

SAS No.: _____

SDG No.: NSB1_

Preparation Blank Matrix (soil/water): SOIL_

Preparation Blank Concentration Units (ug/L or mg/kg): MG/KG

Analyte	Initial Calib. Blank (ug/L)	C	Continuing Calibration Blank (ug/L)						Prepa- ration Blank	C	M
			1	C	2	C	3	C			
Aluminum											NR
Antimony											NR
Arsenic											NR
Barium											NR
Beryllium											NR
Cadmium											NR
Calcium											NR
Chromium											NR
Cobalt											NR
Copper											NR
Iron											NR
Lead											NR
Magnesium											NR
Manganese											NR
Mercury	0.2	U	0.2	U	0.2	U	0.2	U	0.100	U	CV
Nickel											NR
Potassium											NR
Selenium											NR
Silver											NR
Sodium											NR
Thallium											NR
Vanadium											NR
Zinc											NR
Cyanide											NR

U.S. EPA - CLP

3
BLANKS

ab Name: RECRA_ENVIRONMENTAL_INC._

Contract: NY92-650_

Lab Code: RECNY_

Case No.: 4884_

SAS No.: _____

SDG No.: NSB1_

reparation Blank Matrix (soil/water): WATER

Preparation Blank Concentration Units (ug/L or mg/kg): UG/L_

Analyte	Initial Calib. Blank (ug/L)	C	Continuing Calibration Blank (ug/L)						Prepa- ration Blank	C	M
			1	C	2	C	3	C			
Aluminum		-		-		-		-		-	NR
Antimony		-		-		-		-		-	NR
Arsenic		-		-		-		-		-	NR
Barium		-		-		-		-		-	NR
Beryllium		-		-		-		-		-	NR
Cadmium		-		-		-		-		-	NR
Calcium		-		-		-		-		-	NR
Chromium		-		-		-		-		-	NR
Cobalt		-		-		-		-		-	NR
Copper		-		-		-		-		-	NR
Iron		-		-		-		-		-	NR
Lead		-		-		-		-		-	NR
Magnesium		-		-		-		-		-	NR
Manganese		-		-		-		-		-	NR
Mercury		0.2	U						0.200	U	CV
Nickel		-		-		-		-		-	NR
Potassium		-		-		-		-		-	NR
Selenium		-		-		-		-		-	NR
Silver		-		-		-		-		-	NR
Sodium		-		-		-		-		-	NR
Thallium		-		-		-		-		-	NR
Vanadium		-		-		-		-		-	NR
Zinc		-		-		-		-		-	NR
Cyanide		-		-		-		-		-	NR

3
BLANKS

Lab Name: RECRA_ENVIRONMENTAL_INC._

Contract: NY92-650_

Lab Code: RECNY_

Case No.: 4884_

SAS No.: _____

SDG No.: NSB1_

Preparation Blank Matrix (soil/water): _____

Preparation Blank Concentration Units (ug/L or mg/kg): _____

Analyte	Initial Calib. Blank (ug/L)	C	Continuing Calibration						Prepa- ration Blank	C	M
			1	C	2	C	3	C			
Aluminum		-		-		-		-		-	NR
Antimony		-		-		-		-		-	NR
Arsenic		-		-		-		-		-	NR
Barium		-		-		-		-		-	NR
Beryllium		-		-		-		-		-	NR
Cadmium		-		-		-		-		-	NR
Calcium		-		-		-		-		-	NR
Chromium		-		-		-		-		-	NR
Cobalt		-		-		-		-		-	NR
Copper		-		-		-		-		-	NR
Iron		-		-		-		-		-	NR
Lead		-		-		-		-		-	NR
Magnesium		-		-		-		-		-	NR
Manganese		-		-		-		-		-	CV
Mercury	0.2	U	0.2	U	0.2	U	0.2	U			NR
Nickel		-		-		-		-		-	NR
Potassium		-		-		-		-		-	NR
Selenium		-		-		-		-		-	NR
Silver		-		-		-		-		-	NR
Sodium		-		-		-		-		-	NR
Thallium		-		-		-		-		-	NR
Vanadium		-		-		-		-		-	NR
Zinc		-		-		-		-		-	NR
Cyanide		-		-		-		-		-	NR

U.S. EPA - CLP

3
BLANKS

Lab Name: RECRA ENVIRONMENTAL INC.

Contract: NY92-650

Lab Code: RECNY

Case No.: 4884

SAS No.: _____

SDG No.: NSB1

Preparation Blank Matrix (soil/water): _____

Preparation Blank Concentration Units (ug/L or mg/kg): _____

Analyte	Initial Calib. Blank (ug/L)	C	Continuing Calibration Blank (ug/L)						Prepa- ration Blank	C	M
			1	C	2	C	3	C			
Aluminum		-		-		-		-		-	NR
Antimony		-		-		-		-		-	NR
Arsenic		-		-		-		-		-	NR
Barium		-		-		-		-		-	NR
Beryllium		-		-		-		-		-	NR
Cadmium		-		-		-		-		-	NR
Calcium		-		-		-		-		-	NR
Chromium		-		-		-		-		-	NR
Cobalt		-		-		-		-		-	NR
Copper		-		-		-		-		-	NR
Iron		-		-		-		-		-	NR
Lead		-		-		-		-		-	NR
Magnesium		-		-		-		-		-	NR
Manganese		-		-		-		-		-	NR
Mercury		-	0.2	U	0.2	U					CV
Nickel		-		-		-		-		-	NR
Potassium		-		-		-		-		-	NR
Selenium		-		-		-		-		-	NR
Silver		-		-		-		-		-	NR
Sodium		-		-		-		-		-	NR
Thallium		-		-		-		-		-	NR
Vanadium		-		-		-		-		-	NR
Zinc		-		-		-		-		-	NR
Cyanide		-		-		-		-		-	NR

APPENDIX C-3

Olin Groundwater Samples

January 1994

FORM 2A
ANALYTICAL QA/QC: HOLDING
TIME WORKSHEET

January 1994 Groundwater Samples

Location: Olin Niagara Falls
 Data Type: CLP
 Quarter: 1st
 Year: 1994
 Auditor: AJM
 Reviewer: MSJ
 Page: 1 of 2

		VOCs		BNAs			PESTICIDES/PCBs				
SAMPLE ID	DATE RECEIVED	DATE ANALYZED	NO. OF DAYS	DATE EXTRACTED	NO. OF DAYS	DATE ANALYZED	NO. OF DAYS BETWEEN EXTRACTION & ANALYSIS	DATE EXTRACTED	NO. OF DAYS	DATE ANALYZED	NO. OF DAYS BETWEEN EXTRACTION & ANALYSIS
OBA-11B	01/24/94	01/26/94	2	01/27/94	3	02/03/94	7	01/26/94	2	01/29/94	3
OBA-11B DL	01/24/94	01/26/94	2								
OBA-11C	01/24/94	01/26/94	2	01/27/94	3	02/02/94	6	01/26/94	2	01/29/94	3
OBA-11C DL	01/24/94	01/26/94	2	01/27/94	3	02/04/94	8				
OBA-12B	01/21/94	01/25/94	4	01/26/94	5	02/02/94	7	01/26/94	01/29/94	01/29/94	3
OBA-12C	01/21/94	01/25/94	4	01/26/94	5	02/02/94	7	01/26/94	01/29/94	01/29/94	3
QA-1	01/21/94	01/25/94	4	01/26/94	5	02/02/94	7	01/26/94	01/29/94	01/29/94	3
EB-1	01/24/94	01/26/94	2	01/27/94	3	02/03/94	7	01/26/94	01/29/94	01/29/94	3
Trip Blank 1	01/21/94	01/25/94	4								
Trip Blank 2	01/24/94	01/26/94	2								

FORM 2A
ANALYTICAL QA/QC: HOLDING
TIME WORKSHEET

January 1994 Groundwater Samples

Location: Olin Niagara Falls
 Data Type: CLP
 Quarter: 1st
 Year: 1994
 Auditor: AJM
 Reviewer: MSJ
 Page: 2 of 2

SAMPLE ID	DATE RECEIVED	METHANOL		MERCURY	
		DATE ANALYZED	NO. OF DAYS	DATE ANALYZED	NO. OF DAYS
OBA-11B	01/24/94	01/27/94	3	02/03/94	10
OBA-11C	01/24/94	01/27/94	3	02/03/94	10
OBA-12B	01/21/94	01/26/94	5	02/03/94	13
OBA-12C	01/21/94	01/26/94	5	02/03/94	13
QA-1	01/21/94	01/27/94	6	02/03/94	13
EB-1	01/24/94	01/27/94	3	02/03/94	10
Trip Blank 1	01/21/94	01/27/94	3		
Trip Blank 2	01/24/94	01/27/94	3		

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
WATER SURROGATE RECOVERY

0084

Lab Name: Recra Environmental

Contract: _____

Lab Code: RECONY

Case No.: 4884

SAS No.: _____

SDG No.: OBA12

	Client Sample ID	TOL %REC	#	BFB %REC	#	DCE %REC	#							TOT OUT
1	EB-1	97		95		108								0
2	OBA-11B	98		96		104								0
3	OBA-11BDL	96		98		105								0
4	OBA-11C	100		94		105								0
5	OBA-11C MS	94		92		105								0
6	OBA-11C SD	94		91		104								0
7	OBA-11CDL	100		99		104								0
8	OBA-12B	101		99		107								0
9	OBA-12C	101		99		107								0
10	QA-1	101		99		105								0
11	TB-2	98		98		108								0
12	TRIP BLANK	98		97		105								0
13	VBLK77	99		98		107								0
14	VBLK79	99		95		105								0

QC LIMITS

TOL	= Toluene-D8	(88-110)
BFB	= p-Bromofluorobenzene	(86-115)
DCE	= 1,2-Dichloroethane-D4	(76-114)

Column to be used to flag recovery values
 * Values outside of contract required QC limits
 D Surrogates diluted out

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
WATER SURROGATE RECOVERY

0085

Lab Name: Recra Environmental

Contract: NY4A4884

Lab Code: RECONY

Case No.: 4884

SAS No.: _____

SDG No.: OBA12

	Client Sample ID	NBZ %REC	FBP #	TPH %REC	PHL %REC	2FP %REC	TBP %REC	2CP %REC	DCB %REC	TOT OUT
1	EB-1	81	76	80	72	63	87	69	69	0
2	OBA-11B	82	78	56	73	64	96	73	79	0
3	OBA-11C	79	75	57	72	68	98	71	74	0
4	OBA-11C MS	81	73	58	73	68	96	71	75	0
5	OBA-11C SD	80	72	58	72	64	96	70	74	0
6	OBA-11CDL	89	83	74	80	69	95	81	86	0
7	OBA-12B	79	78	58	79	65	91	76	80	0
8	OBA-12C	79	81	42	75	72	95	74	78	0
9	QA-1	82	77	60	74	66	92	69	73	0
10	SBLK01	80	77	76	66	67	83	66	71	0
11	SBLK02	82	84	89	80	65	80	75	82	0

QC LIMITS

NBZ	= Nitrobenzene-D5	(35-114)
FBP	= 2-Fluorobiphenyl	(43-116)
TPH	= Terphenyl-D14	(33-141)
PHL	= Phenol-D5	(10-110)
2FP	= 2-Fluorophenol	(21-110)
TBP	= 2,4,6-Tribromophenol	(10-123)
2CP	= 2-Chlorophenol-d4	(33-110)
DCB	= 1,2-Dichlorobenzene-d4	(16-110)

- # Column to be used to flag recovery values
- * Values outside of contract required QC limits
- D Surrogates diluted out

2E
WATER PESTICIDE SURROGATE RECOVERY

0086

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNYCase No.: 4884SAS No.: _____ SDG No.: OBA12GC Column(1): DB608ID: 0.53 (mm)GC Column(2): DB1701 ID: 0.53 (mm)

	EPA SAMPLE NO.	TCX %REC #	TCX %REC #	DCB %REC #	DCB %REC #	OTHER (1)	OTHER (2)	TOT OUT
01	PBLK47	58*	53*	68	67			2
02	PBLK50	66	60	75	75			0
03	EB1	74	67	35*	35*			2
04	OBA11B	80	68	50*	49*			0
05	OBA11C	85	72	68	68			1
06	OBA12B	63	59*	60	61			0
07	OBA12C	125	60	84	86			0
08	QA1	77	74	66	68			0
09	OBA11CMS	83	73	70	72			0
10	OBA11CMSP	88	73	72	70			0

ADVISORY

QC LIMITS

(60-150)

(60-150)

TCX = Tetrachloro-m-xylene

DCB = Decachlorobiphenyl

Column to be used to flag recovery values

* Values outside of contract required QC limits

D Surrogate diluted out

2
 NONHALOGENATED VOLATILE ORGANICS SURROGATE RECOVERY
 METHOD 8015

Lab Name: RECRA ENVIRONMENTAL, INC.Contract: NY4A4884Lab Code: RECNY Case No.: 4884SAS No.: _____ SDG No.: OBA12Level: (low/med) LOW

	SAMPLE NO.	S1 2-HEX #	OTHER
01	EB-1	95	
02	OBA-11C	104	
03	OBA-11CMS	88	
04	OBA-11CMSD	99	
05	OBA-11B	98	
06	OBA-12B	89	
07	OBA-12C	90	
08	QA-1	88	
09	TB-2	99	
10	TRIP BLANK	89	
11	VBLK38	91	
12	VBLK39	90	

ADVISORY
 QC LIMITS
 (54-138)

S1 S- Hexanone

Column to be used to flag recovery values

D - Surrogate diluted out

* Values outside of QC limits

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
WATER MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

0088

Lab Name: Recra Environmental, Inc.

Contract: _____

Lab Samp ID: A4024501

Lab Code: RECNY

Case No.: 4884

SAS No.: _____

SDG No.: OBA12

Matrix Spike - Client Sample No.: OBA-11C

COMPOUND	SPIKE ADDED UG/L	SAMPLE CONCENTRATION UG/L	MS CONCENTRATION UG/L	MS % REC #	QC LIMITS REC.
1,1-Dichloroethene	5000	0	5500	110	61 - 145
Trichloroethene	5000	25000	31000	120	71 - 120
Benzene	5000	0	4800	96	76 - 127
Toluene	5000	0	4800	96	76 - 125
Chlorobenzene	5000	50	4900	97	75 - 130

COMPOUND	SPIKE ADDED UG/L	MSD CONCENTRATION UG/L	MSD % REC #	% RPD #	RPD	QC LIMITS REC.
1,1-Dichloroethene	5000	5800	116	5	14	61 - 145
Trichloroethene	5000	32000	140 *	15 *	14	71 - 120
Benzene	5000	5000	100	4	11	76 - 127
Toluene	5000	5000	100	4	13	76 - 125
Chlorobenzene	5000	5000	99	2	13	75 - 130

Column to be used to flag recovery and RPD values with an asterisk

* Values outside of QC limits

RPD: 1 out of 5 outside limits

Spike recovery: 1 out of 10 outside limits

Comments: _____

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
WATER MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

0089

Lab Name: Recra Environmental, Inc.

Contract: NY4A4884

Lab Samp ID: A4024501

Lab Code: RECNY Case No.: 4884

SAS No.: _____

SDG No.: OBA12

Matrix Spike - Client Sample No.: OBA-11C

COMPOUND	SPIKE ADDED UG/L	SAMPLE CONCENTRATION UG/L	MS CONCENTRATION UG/L	MS % REC #	QC LIMITS REC.
Phenol	75	0	50	67	12 - 110
2-Chlorophenol	75	0	50	67	27 - 123
1,4-Dichlorobenzene	50	16	43	54	36 - 97
N-Nitroso-Di-n-propyl(1)	50	0	29	58	41 - 116
1,2,4-Trichlorobenzene	50	34	66	64	39 - 98
4-Chloro-3-methylphenol	75	0	65	87	23 - 97
Acenaphthene	50	0	72	96 *	10 - 80
4-Nitrophenol	75	0	43	86	24 - 96
2,4-Dinitrotoluene	50	0	95	127 *	9 - 103
Pentachlorophenol	75	0	37	74	26 - 127
Pyrene	50	0			

COMPOUND	SPIKE ADDED UG/L	MSD CONCENTRATION UG/L	MSD % REC #	% RPD #	RPD	QC LIMITS REC.
Phenol	75	46	61	9	42	12 - 110
2-Chlorophenol	75	54	72	7	40	27 - 123
1,4-Dichlorobenzene	50	44	56	4	28	36 - 97
N-Nitroso-Di-n-propyl(1)	50	27	54	7	38	41 - 116
1,2,4-Trichlorobenzene	50	66	64	0	28	39 - 98
4-Chloro-3-methylphenol	75	66	88	1	42	23 - 97
Acenaphthene	50	36	72	3	31	46 - 118
4-Nitrophenol	75	72	96 *	0	50	10 - 80
2,4-Dinitrotoluene	50	40	80	7	38	24 - 96
Pentachlorophenol	75	94	125 *	2	50	9 - 103
Pyrene	50	36	72	3	31	26 - 127

(1) N-Nitroso-Di-n-propylamine

Column to be used to flag recovery and RPD values with an asterisk

* Values outside of QC limits

RPD: 0 out of 11 outside limits

Spike recovery: 4 out of 22 outside limits

Comments: _____

0090

3E

WATER PESTICIDE MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNYCase No.: 4884

SAS No.: _____

SDG No.: OBA12Matrix Spike - EPA Sample No.: OBA11C

COMPOUND	SPIKE ADDED (ug/L)	SAMPLE CONCENTRATION (ug/L)	MS CONCENTRATION (ug/L)	MS % REC #	QC LIMITS REC.
gamma-BHC (Lindane) _____	0.625	0.144	0.699	89	56-123
Heptachlor _____	0.625	0	0.490	78	40-131
Aldrin _____	0.625	0	0.501	80	40-120
Dieldrin _____	1.250	0	1.14	91	52-126
Endrin _____	1.250	0	1.36	109	56-121
4,4'-DDT _____	1.250	0	1.05	84	38-127

COMPOUND	SPIKE ADDED (ug/L)	MSD CONCENTRATION (ug/L)	MSD % REC #	% RPD #	QC LIMITS RPD	REC.
gamma-BHC (Lindane) _____	0.625	0.720	92	3	15	56-123
Heptachlor _____	0.625	0.497	80	3	20	40-131
Aldrin _____	0.625	0.524	84	5	22	40-120
Dieldrin _____	1.250	1.19	95	4	18	52-126
Endrin _____	1.250	1.38	110	1	21	56-121
4,4'-DDT _____	1.250	1.06	85	1	27	38-127

Column to be used to flag recovery and RPD values with an asterisk

* Values outside of QC limits

RPD: 0 out of 6 outside limitsSpike Recovery: 0 out of 12 outside limits

COMMENTS:

3
 NONHALOGENATED VOLATILE ORGANICS MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY
 METHOD 8015

Lab Name: RECRA ENVIRONMENTAL, INC.

Contract No.: NY4A4884

Lab Code: RECNY Case No.: 4884

SAS No.: _____ SDG No.: OBA12

Matrix Spike Sample No.: OBA-11C

Level: (low/med) LOW

COMPOUND	SPIKE ADDED (MG/L)	SAMPLE CONCENTRATION (MG/L)	MS CONCENTRATION (MG/L)	MS % REC#	QC LIMIT REC.
Methanol	10	0	9.1	91	70-123

COMPOUND	SPIKE ADDED (MG/L)	MSD CONCENTRATION (MG/L)	MSD % REC#	% RPD #	QC LIMITS RPD	REC
Methanol	10	8.8	88	3.4	15	70-123

Column to be used to flag recovery and RPD values with an asterisk

* Values outside of QC limits

Spike Recovery: 0 out of 2 outside limits
 RPD: 0 out of 1 outside limits

COMMENTS: _____

6
DUPLICATES

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: OBA12

Matrix (soil/water): WATER Level (low/med): LOW

% Solids for Sample: 0.0 % Solids for Duplicate: 0.0

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

Analyte	Control Limit	Sample (S)	C	Duplicate (D)	C	RPD	Q	M
Aluminum			-		-		-	NR
Antimony			-		-		-	NR
Arsenic			-		-		-	NR
Barium			-		-		-	NR
Beryllium			-		-		-	NR
Cadmium			-		-		-	NR
Calcium			-		-		-	NR
Chromium			-		-		-	NR
Cobalt			-		-		-	NR
Copper			-		-		-	NR
Iron			-		-		-	NR
Lead			-		-		-	NR
Magnesium			-		-		-	NR
Manganese			-		-		-	NR
Mercury	0.2	0.3920	-	0.3920	-	0.0	-	CV
Nickel			-		-		-	NR
Potassium			-		-		-	NR
Selenium			-		-		-	NR
Silver			-		-		-	NR
Sodium			-		-		-	NR
Thallium			-		-		-	NR
Vanadium			-		-		-	NR
Zinc			-		-		-	NR
Cyanide			-		-		-	NR

5A

SPIKE SAMPLE RECOVERY

OBA11CS

Lab Name: RECRA ENVIRONMENTAL INC.

Contract: NY93-650

Lab Code: RECNY

Case No.: 4884

SAS No.: SDG No.: OBA12

Matrix (soil/water): WATER

Level (low/med): LOW

% Solids for Sample: 0.0

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

Analyte	Control Limit %R	Spiked Sample Result (SSR) C	Sample Result (SR) C	Spike Added (SA)	%R	Q	M
Aluminum						NR	
Antimony						NR	
Arsenic						NR	
Barium						NR	
Beryllium						NR	
Cadmium						NR	
Calcium						NR	
Chromium						NR	
Cobalt						NR	
Copper						NR	
Iron						NR	
Lead						NR	
Magnesium						NR	
Manganese						NR	
Mercury	75-125	1.5670	0.3920	1.00	117.5	CV	
Nickel						NR	
Potassium						NR	
Selenium						NR	
Silver						NR	
Sodium						NR	
Thallium						NR	
Vanadium						NR	
Zinc						NR	
Cyanide						NR	

Comments:

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
METHOD BLANK SUMMARY

0094

Client No.

VBLK77

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Lab File ID: L7807.MSQ Lab Sample ID: AM004226

Date Analyzed: 01/25/94 Time Analyzed: 11:02

GC Column: DB-624 ID: 0.53 (mm) Heated Purge: (Y/N) N

Instrument ID: I50L

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

	CLIENT SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	TIME ANALYZED
1	OBA-12B	A4023601	L7818.MSQ	17:45
2	OBA-12C	A4023602	L7819.MSQ	18:19
3	QA-1	A4023603	L7817.MSQ	17:11
4	TRIP BLANK	A4023604	L7816.MSQ	16:36

Comments: _____

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
ANALYSIS DATA SHEET

0095

Client No.

VBLK77

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: AM004226

Sample wt/vol: 5.00 (g/mL) ML Lab File ID: L7807.MSO

Level: (low/med) LOW Date Samp/Recv: _____

% Moisture: not dec. _____ Heated Purge: N Date Analyzed: 01/25/94

GC Column: DB-624 ID: 0.53 (mm) Dilution Factor: 1.00

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

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND	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
108-88-3-----	Toluene	10	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10	U
108-90-7-----	Chlorobenzene	10	U
100-41-4-----	Ethyl benzene	10	U
100-42-5-----	Styrene	10	U
1330-20-7-----	Total Xylenes	10	U
108-05-4-----	Vinyl acetate	10	U

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0096

Client No.

VBLK77

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: AM004226

Sample wt/vol: 5.00 (g/mL) ML

Lab File ID: L7807.MSO

Level: (low/med) LOW

Date Samp/Recv: _____

% Moisture: not dec. _____

Date Analyzed: 01/25/94

GC Column: DB-624 ID: 0.53 (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

Number TICs found: 0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

CAS NO.	Compound Name	RT	Est. Conc.	Q

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
METHOD BLANK SUMMARY

0097

Client No.

VBLK79

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Lab File ID: L7844.MSQ Lab Sample ID: AM004227

Date Analyzed: 01/26/94 Time Analyzed: 12:27

GC Column: DB-624 ID: 0.53 (mm) Heated Purge: (Y/N) N

Instrument ID: I50L

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

CLIENT SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	TIME ANALYZED
1 EB-1	A4024503	L7853.MSQ	17:33
2 OBA-11B	A4024502	L7854.MSQ	18:07
3 OBA-11BDL	A4024502DL	L7859.MSQ	20:58
4 OBA-11C	A4024501	L7855.MSQ	18:41
5 OBA-11C MS	A4024501MS	L7861.MSQ	22:03
6 OBA-11C SD	A4024501SD	L7862.MSQ	22:37
7 OBA-11CDL	A4024501DL	L7860.MSQ	21:29
8 TB-2	A4024504	L7852.MSQ	16:59

Comments: _____

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
ANALYSIS DATA SHEET

0098

Client No.

VBLK79

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: AM004227

Sample wt/vol: 5.00 (g/mL) ML Lab File ID: L7844.MSO

Level: (low/med) LOW Date Samp/Recv: _____

% Moisture: not dec. _____ Heated Purge: N Date Analyzed: 01/26/94

GC Column: DB-624 ID: 0.53 (mm) Dilution Factor: 1.00

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

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L Q

CAS NO.	COMPOUND	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
108-88-3-----	Toluene	0.9	J
79-34-5-----	1,1,2,2-Tetrachloroethane	10	U
108-90-7-----	Chlorobenzene	0.8	J
100-41-4-----	Ethyl benzene	10	U
100-42-5-----	Styrene	10	U
1330-20-7-----	Total Xylenes	10	U
108-05-4-----	Vinyl acetate	10	U

OLIN CHEMICAL CORP
EPA 3/90 - VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0099
Client No.

VBLK79

Lab Name: Recra Environmental Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: AM004227

Sample wt/vol: 5.00 (g/mL) ML Lab File ID: L7844.MSQ

Level: (low/med) LOW Date Samp/Recv: _____

% Moisture: not dec. _____ Date Analyzed: 01/26/94

GC Column: DB-624 ID: 0.53 (mm) Dilution Factor: 1.00

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

Number TICs found: 0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

CAS NO.	Compound Name	RT	Est. Conc.	Q

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
METHOD BLANK SUMMARY

0100
Client No.

Lab Name: Recra Environmental Contract: NY4A4884

SBLK01

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Lab File ID: 16486X.MSQ Lab Sample ID: AM004229

Instrument ID: I50X Date Extracted: 01/26/94

Matrix: (soil/water) WATER Date Analyzed: 02/02/94

Level: (low/med) LOW Time Analyzed: 17:29

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

	CLIENT SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED
1	OBA-12B	A4023601	16487X.MSQ	02/02/94
2	OBA-12C	A4023602	16488X.MSQ	02/02/94
3	QA-1	A4023603	16489X.MSQ	02/02/94

Comments: _____

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0101

Client No.

SBLK01

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: AM004229

Sample wt/vol: 1000.0 (g/mL) ML Lab File ID: 16486X.MSO

Level: (low/med) LOW Date Samp/Recv: _____

% Moisture: _____ decanted: (Y/N) N Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL) Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL) Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	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-----	Bis(2-chloroisopropyl) ether	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-----	Dimethyl phthalate	10	U
208-96-8-----	Acenaphthylene	10	U
606-20-2-----	2,6-Dinitrotoluene	10	U
99-09-2-----	3-Nitroaniline	25	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0102

Client No.

SBLK01

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: AM004229

Sample wt/vol: 1000.0 (g/mL) ML Lab File ID: 16486X.MSQ

Level: (low/med) LOW Date Samp/Recv: _____

% Moisture: _____ decanted: (Y/N) N Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL) Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL) Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND		
83-32-9-----	Acenaphthene	10	U
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-----	Diethyl phthalate	10	U
7005-72-3-----	4-Chlorodiphenylether	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	10	U
101-55-3-----	4-Bromophenyl phenyl ether	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
84-74-2-----	Di-n-butyl phthalate	10	U
206-44-0-----	Fluoranthene	10	U
129-00-0-----	Pyrene	10	U
85-68-7-----	Butyl benzyl phthalate	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	10	U
117-84-0-----	Di-n-octyl phthalate	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-----	Dibenzo(a,h)anthracene	10	U
191-24-2-----	Benzo(ghi)perylene	10	U
65-85-0-----	Benzoic acid	10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0103

Client No.

SBLK01

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: AM004229

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16486X.MSO

Level: (low/med) LOW

Date Samp/Recv: _____

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg) UG/L

Q

CAS NO.	COMPOUND	UG/L	Q
100-51-6-----	Benzyl alcohol	10	U
108-43-0-----	3-Chlorophenol	10	U
106-48-9-----	4-Chlorophenol	10	U
576-24-9-----	2,3-Dichlorophenol	10	U
583-78-8-----	2,5-Dichlorophenol	10	U
95-77-2-----	3,4-Dichlorophenol	10	U
591-35-5-----	3,5-Dichlorophenol	10	U
15950-66-0-----	2,3,4-Trichlorophenol	10	U
933-78-8-----	2,3,5-Trichlorophenol	10	U
933-75-5-----	2,3,6-Trichlorophenol	10	U
609-19-8-----	3,4,5-Trichlorophenol	10	U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10	U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10	U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0104

Client No.

SBLK01

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: AM004229

Sample wt/vol: 1000.0 (g/mL) ML Lab File ID: 16486X.MSO

Level: (low/med) LOW Date Samp/Recv: _____

% Moisture: _____ decanted: (Y/N) N Date Extracted: 01/26/94

Concentrated Extract Volume: 1000 (uL) Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL) Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

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

Number TICs found: 1

CAS NO.	Compound Name	RT	Est. Conc.	Q
1.	UNKNOWN	33.67	3	J

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
METHOD BLANK SUMMARY

0105
Client No.

Lab Name: Recra Environmental Contract: NY4A4884

SBLK02

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Lab File ID: 16490X.MSQ Lab Sample ID: AM004231

Instrument ID: I50X Date Extracted: 01/27/94

Matrix: (soil/water) WATER Date Analyzed: 02/02/94

Level: (low/med) LOW Time Analyzed: 20:46

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

	CLIENT SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED
1	EB-1	A4024503	16495X.MSQ	02/03/94
2	OBA-11B	A4024502	16494X.MSQ	02/03/94
3	OBA-11C	A4024501	16491X.MSQ	02/02/94
4	OBA-11C MS	A4024501MS	16492X.MSQ	02/02/94
5	OBA-11C SD	A4024501SD	16493X.MSQ	02/02/94
6	OBA-11CDL	A4024501DL	16499X.MSQ	02/04/94

Comments: _____

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0106

Client No.

SBLK02

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: AM004231

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16490X.MSO

Level: (low/med) LOW

Date Samp/Recv: _____

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND	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-----	Bis(2-chloroisopropyl) ether	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-----	Dimethyl phthalate	10	U
208-96-8-----	Acenaphthylene	10	U
606-20-2-----	2,6-Dinitrotoluene	10	U
99-09-2-----	3-Nitroaniline	25	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0107

Client No.

SBLK02

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: AM004231

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16490X.MSO

Level: (low/med) LOW

Date Samp/Recv: _____

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND	UG/L	Q
83-32-9-----	Acenaphthene	10	U
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-----	Diethyl phthalate	10	U
7005-72-3-----	4-Chlorodiphenylether	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	10	U
101-55-3-----	4-Bromophenyl phenyl ether	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
84-74-2-----	Di-n-butyl phthalate	10	U
206-44-0-----	Fluoranthene	10	U
129-00-0-----	Pyrene	10	U
85-68-7-----	Butyl benzyl phthalate	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	10	U
117-84-0-----	Di-n-octyl phthalate	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-----	Dibenzo(a,h)anthracene	10	U
191-24-2-----	Benzo(ghi)perylene	10	U
65-85-0-----	Benzoic acid	10	U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
ANALYSIS DATA SHEET

0108

Client No.

SBLK02

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: AM004231

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16490X.MSO

Level: (low/med) LOW

Date Samp/Recv: _____

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

(ug/L or ug/Kg)

UG/L

Q

CAS NO.	COMPOUND			
100-51-6-----	Benzyl alcohol	10		U
108-43-0-----	3-Chlorophenol	10		U
106-48-9-----	4-Chlorophenol	10		U
576-24-9-----	2,3-Dichlorophenol	10		U
583-78-8-----	2,5-Dichlorophenol	10		U
95-77-2-----	3,4-Dichlorophenol	10		U
591-35-5-----	3,5-Dichlorophenol	10		U
15950-66-0-----	2,3,4-Trichlorophenol	10		U
933-78-8-----	2,3,5-Trichlorophenol	10		U
933-75-5-----	2,3,6-Trichlorophenol	10		U
609-19-8-----	3,4,5-Trichlorophenol	10		U
490-51-3-----	2,3,4,5-Tetrachlorophenol	10		U
935-95-5-----	2,3,5,6-Tetrachlorophenol	10		U
58-90-2-----	2,3,4,6-Tetrachlorophenol	10		U

OLIN CHEMICAL CORP
EPA 3/90 - SEMI-VOLATILES
TENTATIVELY IDENTIFIED COMPOUNDS

0109

Client No.

SBLK02

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: AM004231

Sample wt/vol: 1000.0 (g/mL) ML

Lab File ID: 16490X.MSO

Level: (low/med) LOW

Date Samp/Recv: _____

% Moisture: _____ decanted: (Y/N) N

Date Extracted: 01/27/94

Concentrated Extract Volume: 1000 (uL)

Date Analyzed: 02/02/94

Injection Volume: 2.00 (uL)

Dilution Factor: 1.00

GPC Cleanup: (Y/N) N pH: 7.0

CONCENTRATION UNITS:

Number TICs found: 2 (ug/L or ug/Kg) UG/L

CAS NO.	Compound Name	RT	Est. Conc.	Q
1.	CYCLOHEXEN-1-OL	6.32	12	J
2.	UNKNOWN	12.07	3	J

0110

EPA SAMPLE NO.

4C

PESTICIDE METHOD BLANK SUMMARY

PBLK47

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNYCase No.: 4884

SAS No.: _____

SDG No.: OBA12Lab Sample ID: AG001547

Lab File ID: _____

Matrix: (soil/water) WATERExtraction: (SepF/Cont/Sonc) SEPFSulfur Cleanup: (Y/N) YDate Extracted: 01/26/94Date Analyzed (1): 01/29/94Date Analyzed (2): 01/29/94Time Analyzed (1): 0738Time Analyzed (2): 0738Instrument ID (1): 5890A9Instrument ID (2): 5890B9GC Column (1): DB608 ID: 0.53 (mm) GC Column (2): DB1701 ID: 0.53 (mm)

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

EPA SAMPLE NO.	LAB SAMPLE ID	DATE ANALYZED 1	DATE ANALYZED 2
01 OBA12B	A4023601	01/29/94	01/29/94
02 OBA12C	A4023602	01/29/94	01/29/94
03 QA1	A4023603	01/29/94	01/29/94

COMMENTS:

0111

EPA SAMPLE NO.

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

PBLK47

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNYCase No.: 4884

SAS No.: _____

SDG No.: OBA12Matrix: (soil/water) WATERLab Sample ID: AG001547Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: _____

Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 01/26/94Concentrated Extract Volume: 10000 (uL)Date Analyzed: 01/29/94Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0Sulfur Cleanup: (Y/N) Y

CAS NO.	COMPOUND	CONCENTRATION UNITS:	
		(ug/L or ug/Kg) <u>UG/L</u>	Q
319-84-6-----	alpha-BHC	0.050	U
319-85-7-----	beta-BHC	0.050	U
319-86-8-----	delta-BHC	0.050	U
58-89-9-----	gamma-BHC (Lindane)	0.050	U
76-44-8-----	Heptachlor	0.050	U
309-00-2-----	Aldrin	0.050	U
1024-57-3-----	Heptachlor epoxide	0.050	U
959-98-8-----	Endosulfan I	0.050	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
7421-93-4-----	Endrin aldehyde	0.10	U
5103-71-9-----	alpha-Chlordane	0.050	U
5103-74-2-----	gamma-Chlordane	0.050	U
8001-35-2-----	Toxaphene	5.0	U
12674-11-2-----	Aroclor-1016	1.0	U
11104-28-2-----	Aroclor-1221	2.0	U
11141-16-5-----	Aroclor-1232	1.0	U
53469-21-9-----	Aroclor-1242	1.0	U
12672-29-6-----	Aroclor-1248	1.0	U
11097-69-1-----	Aroclor-1254	1.0	U
11096-82-5-----	Aroclor-1260	1.0	U

0112

EPA SAMPLE NO.

4C

PESTICIDE METHOD BLANK SUMMARY

PBLK50

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884SAS No.: _____ SDG No.: OBA12Lab Sample ID: AG001550

Lab File ID: _____

Matrix: (soil/water) WATERExtraction: (SepF/Cont/Sonc) SEPFSulfur Cleanup: (Y/N) YDate Extracted: 01/26/94Date Analyzed (1): 01/29/94Date Analyzed (2): 01/29/94Time Analyzed (1): 1220Time Analyzed (2): 1220Instrument ID (1): 5890A9Instrument ID (2): 5890B9GC Column (1): DB608 ID: 0.53 (mm) GC Column (2): DB1701 ID: 0.53 (mm)

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

EPA SAMPLE NO.	LAB SAMPLE ID	DATE ANALYZED 1	DATE ANALYZED 2
01 EB1	A4024503	01/29/94	01/29/94
02 OBA11B	A4024502	01/29/94	01/29/94
03 OBA11C	A4024501	01/29/94	01/29/94
04 OBA11CMS	A4024501MS	01/29/94	01/29/94
05 OBA11CMSP	A4024501SD	01/29/94	01/29/94

COMMENTS:

0113

EPA SAMPLE NO.

1D
PESTICIDE ORGANICS ANALYSIS DATA SHEET

PBLK50

Lab Name: RECRA ENVIRON

Contract: _____

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12Matrix: (soil/water) WATERLab Sample ID: AG001550Sample wt/vol: 1000 (g/mL) ML

Lab File ID: _____

% Moisture: _____ decanted: (Y/N) _____

Date Received: _____

Extraction: (SepF/Cont/Sonc) SEPFDate Extracted: 01/26/94Concentrated Extract Volume: 10000 (uL)Date Analyzed: 01/29/94Injection Volume: 1.00 (uL)Dilution Factor: 1.00GPC Cleanup: (Y/N) N pH: 7.0 Sulfur Cleanup: (Y/N) Y

CONCENTRATION UNITS:

COMPOUND

(ug/L or ug/Kg) UG/LQ

<u>319-84-6-----alpha-BHC</u>	<u>0.050</u>	<u>U</u>
<u>319-85-7-----beta-BHC</u>	<u>0.050</u>	<u>U</u>
<u>319-86-8-----delta-BHC</u>	<u>0.050</u>	<u>U</u>
<u>58-89-9-----gamma-BHC (Lindane)</u>	<u>0.050</u>	<u>U</u>
<u>76-44-8-----Heptachlor</u>	<u>0.050</u>	<u>U</u>
<u>309-00-2-----Aldrin</u>	<u>0.050</u>	<u>U</u>
<u>1024-57-3-----Heptachlor epoxide</u>	<u>0.050</u>	<u>U</u>
<u>959-98-8-----Endosulfan I</u>	<u>0.050</u>	<u>U</u>
<u>60-57-1-----Dieldrin</u>	<u>0.10</u>	<u>U</u>
<u>72-55-9-----4, 4'-DDE</u>	<u>0.10</u>	<u>U</u>
<u>72-20-8-----Endrin</u>	<u>0.10</u>	<u>U</u>
<u>33213-65-9-----Endosulfan II</u>	<u>0.10</u>	<u>U</u>
<u>72-54-8-----4, 4'-DDD</u>	<u>0.10</u>	<u>U</u>
<u>1031-07-8-----Endosulfan sulfate</u>	<u>0.10</u>	<u>U</u>
<u>50-29-3-----4, 4'-DDT</u>	<u>0.10</u>	<u>U</u>
<u>72-43-5-----Methoxychlor</u>	<u>0.50</u>	<u>U</u>
<u>53494-70-5-----Endrin ketone</u>	<u>0.10</u>	<u>U</u>
<u>7421-93-4-----Endrin aldehyde</u>	<u>0.10</u>	<u>U</u>
<u>5103-71-9-----alpha-Chlordane</u>	<u>0.050</u>	<u>U</u>
<u>5103-74-2-----gamma-Chlordane</u>	<u>0.050</u>	<u>U</u>
<u>8001-35-2-----Toxaphene</u>	<u>5.0</u>	<u>U</u>
<u>12674-11-2-----Aroclor-1016</u>	<u>1.0</u>	<u>U</u>
<u>11104-28-2-----Aroclor-1221</u>	<u>2.0</u>	<u>U</u>
<u>11141-16-5-----Aroclor-1232</u>	<u>1.0</u>	<u>U</u>
<u>53469-21-9-----Aroclor-1242</u>	<u>1.0</u>	<u>U</u>
<u>12672-29-6-----Aroclor-1248</u>	<u>1.0</u>	<u>U</u>
<u>11097-69-1-----Aroclor-1254</u>	<u>1.0</u>	<u>U</u>
<u>11096-82-5-----Aroclor-1260</u>	<u>1.0</u>	<u>U</u>

4
NONHALOGENATED VOLATILE ORGANICS METHOD BLANK SUMMARY
METHOD 8015

Lab Name: RECRA ENVIRONMENTAL, INC.

Contract No.: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Lab Sample ID: AG001554

Lab File ID: _____

Matrix: (soil/water) WATER

Level: (low/med) LOW

Date Analyzed (1): 01/26/94

Date Analyzed (2): _____

Time Analyzed (1): 22:00

Time Analyzed (2): _____

Instrument ID (1): HP5890-2

Instrument ID (2): _____

GC Column ID (1): NUKOL

GC Column ID (2): _____

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

SAMPLE NO.		LAB SAMPLE ID	DATE ANALYZED 1	DATE ANALYZED 2
01	OBA-12B	A4023601	01/26/94	
02	OBA-12C	A4023602	01/26/94	
03	QA-1	A4023603	01/27/94	
04	TRIP BLANK	A4023604	01/27/94	

COMMENTS: _____

OLIN CHEMICAL CORP
METHOD 8015 - METHANOL
ANALYSIS DATA SHEET

0115

Client No.

VBLK38

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER

Lab Sample ID: AG001554

Sample wt/vol: 0.001 (g/mL) ML

Lab File ID: _____

Level: (low/med) Low

Date Samp/Recv: _____

% Moisture: not dec. _____

Date Analyzed: 01/26/94

GC Column: _____ Dia: _____ (mm)

Dilution Factor: 1.00

Soil Extract Volume: _____ (uL)

Soil Aliquot Volume: _____ (uL)

CONCENTRATION UNITS:

(ug/L or ug/Kg) MG/L

Q

CAS NO. COMPOUND

<u>67-56-1-----Methanol</u>	<u>0.55</u>	<u>U</u>
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4
 NONHALOGENATED VOLATILE ORGANICS METHOD BLANK SUMMARY
 METHOD 8015

Lab Name: RECRA ENVIRONMENTAL, INC.

Contract No.: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Lab Sample ID: AG001555

Lab File ID: _____

Matrix: (soil/water) WATER

Level: (low/med) LOW

Date Analyzed (1): 01/27/94

Date Analyzed (2): _____

Time Analyzed (1): 10:14

Time Analyzed (2): _____

Instrument ID (1): HP5890-2

Instrument ID (2): _____

GC Column ID (1): NUKOL

GC Column ID (2): _____

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

SAMPLE NO.		LAB SAMPLE ID	DATE ANALYZED 1	DATE ANALYZED 2
01	OBA-11B	A4024502	01/27/94	
02	OBA-11C	A4024501	01/27/94	
03	OBA-11CMS	A4024501MS	01/27/94	
04	OBA-11CMSD	A4024501SD	01/27/94	
05	EB-1	A4024503	01/27/94	
06	TB-2	A4024504	01/27/94	

COMMENTS: _____

OLIN CHEMICAL CORP
METHOD 8015 - METHANOL
ANALYSIS DATA SHEET

0117

Client No.

VBLK39

Lab Name: Recra Environmental Contract: NY4A4884

Lab Code: RECNY Case No.: 4884 SAS No.: _____ SDG No.: OBA12

Matrix: (soil/water) WATER Lab Sample ID: AG001555

Sample wt/vol: 0.001 (g/mL) ML Lab File ID: _____

Level: (low/med) Low Date Samp/Recv: _____

% Moisture: not dec. _____ Date Analyzed: 01/27/94

GC Column: _____ Dia: _____ (mm) Dilution Factor: 1.00

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

CONCENTRATION UNITS:
(ug/L or ug/Kg) MG/L Q

CAS NO.	COMPOUND		
67-56-1-----	Methanol	0.55	<input type="checkbox"/> U

3
BLANKS

Lab Name: RECRA ENVIRONMENTAL INC. Contract: NY93-650

Lab Code: RECNY Case No.: 4884 SAS No.: SDG No.: OBA12

Preparation Blank Matrix (soil/water): WATER

Preparation Blank Concentration Units (ug/L or mg/kg): UG/L

Analyte	Initial Calib. Blank (ug/L)	C	Continuing Calibration Blank (ug/L)					Prepa- ration Blank	C	M
			1	C	2	C	3			
Aluminum										NR
Antimony										NR
Arsenic										NR
Barium										NR
Beryllium										NR
Cadmium										NR
Calcium										NR
Chromium										NR
Cobalt										NR
Copper										NR
Iron										NR
Lead										NR
Magnesium										NR
Manganese										NR
Mercury	0.2	U	0.2	U					0.200	U
Nickel										NR
Potassium										NR
Selenium										NR
Silver										NR
Sodium										NR
Thallium										NR
Vanadium										NR
Zinc										NR
Cyanide										NR

FORM 8
ANALYTICAL QA/QC: EQUIPMENT
BLANK WORKSHEET

January 1994 Groundwater Samples

Rinsate Blanks

Location: Olin Niagara Falls
Data Type: CLP
Quarter: 1st
Year: 1994
Auditor: AJM
Reviewer: MSJ
Page: 1 of 1

DATE	COMPOUND	COMPOUND	COMPOUND
01/24/94	chloroform	carbon tetrachloride	bis(2-ethylhexyl)phthalate
	2 ug/l	7 ug/l	0.4 ug/l

**FORM 10
TRIP BLANK WORKSHEET**

January 1994 Groundwater Samples

Location: Olin Niagara Falls
Data Type: CLP / Non CLP
Quarter: 1st
Year: 1994
Auditor: AJM
Reviewer: MSJ
Page: 1 of 1

PARAMETERS	SAMPLE DATE	SAMPLE DATE
	01/21/94	01/24/94
VOCs - CLP	ND	ND
methanol - Non CLP	ND	ND