

ANALYTICAL RESULTS

Prepared For

Olin Corporation
P.O. Box 748
Niagara Falls, New York 14302

Prepared By

Recra Environmental, Inc.
10 Hazelwood Drive, Suite 106
Amherst, New York 14228-2298

METHODOLOGIES

The specific methodologies employed in obtaining the enclosed analytical results are indicated on the specific data table. The method numbers presented refer to the following U.S. Environmental Protection Agency reference.

- * U.S. Environmental Protection Agency "Test Methods for Evaluating Solid Waste - Physical/Chemical Methods." Office of Solid Waste and Emergency Response. November 1986, SW-846, Third Edition.
- * The Toxicity Characteristic Leaching Procedure was performed in accordance with modified method 1311, 40 CFR, Appendix II to Part 261, June 1990.

COMMENTS

Comments pertain to data on one or all pages of this report.

The enclosed data has been reported utilizing USEPA data qualifiers (Q) as defined on the Organic and Inorganic Data Comment Pages.

Quality control analysis was performed on a batch basis. All results were within acceptable limits.

TCLP Matrix Spike quality control analysis was not performed at the request of Olin Corporation. Therefore, the measured values for samples NIACHLOR TANK SLUDGE 2C06101 and C-2 EXCAVATION 2C06102 on the enclosed TCLP data have not been corrected for analytical bias as required by the referenced TCLP protocol.

The TCLP extractions were performed on March 12, 1992.



**RECRA
ENVIRONMENTAL
INC.**

Chemical and Environmental Analysis Services



March 26, 1992

Mr. Salvatore D'Angelo
Olin Corporation
P.O. Box 748
Niagara Falls, NY 14302

RE: Analytical Results

Dear Mr. D'Angelo:

Please find enclosed results concerning the analyses of the samples recently submitted by your firm. The Pertinent Information regarding these analyses is listed below.

Quote #: Q90-331
Matrix: Soil, Sludge
Samples Received: 3/6/92
Sample Dates: 1/27/92, 3/2/92

If you have any questions concerning these data, please contact Ms. Candace Steady, Project Manager, at (716) 691-2600 and refer to the I.D. number listed below. It has been our pleasure to provide Olin Corporation with Environmental Testing Services. We look forward to serving you in the future.

Sincerely,

RECRA ENVIRONMENTAL, INC.

Kenneth C. Malinowski, PhD
Vice President

RMM/KCM/dms
Enclosure

I.D. #92-0786
#92-0786A
#NY0A2507

Laboratory Name RECRA ENVIRONMENTAL, INC.

USEPA Defined Organic Data Qualifiers:

U - Indicates compound was analyzed for but not detected.

J - Indicates an estimated value. This flag is used either when estimating a concentration for tentatively identified compounds where a 1:1 response is assumed, or when the mass spectral data indicate the presence of a compound that meets the identification criteria but the result is less than the sample quantitation limit but greater than zero.

C - This flag applies to pesticide results where the identification has been confirmed by GC/MS.

B - This flag is used when the analyte is found in the associated blank as well as in the sample.

E - This flag identifies compounds whose concentrations exceed the calibration range of the GC/MS instrument for that specific analysis.

D - This flag identifies all compounds identified in an analysis at a secondary dilution factor.

G - The TCLP Matrix Spike recovery was greater than the upper limit of the analytical method.

L - The TCLP Matrix Spike recovery was lower than the lower limit of the analytical method.

T - This flag is used when the analyte is found in the associated TCLP extraction as well as in the sample.



RECRA
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INC.

INORGANIC DATA COMMENT PAGE

Laboratory Name RECRA ENVIRONMENTAL, INC.

USEPA Defined Inorganic Data Qualifiers:

- B - Indicates a value greater than or equal to the instrument detection limit but less than the contract required detection limit.
- U - Indicates element was analyzed for but not detected. Report with the detection limit value (e.g., 100).
- E - Indicates a value estimated or not reported due to the presence of interference.
- S - Indicates value determined by Method of Standard Addition.
- N - Indicates spike sample recovery is not within control limits.
- * - Indicates duplicate analysis is not within control limits.
- + - Indicates the correlation coefficient for method of standard addition is less than 0.995.
- M - Indicates duplicate injection results exceeded control limits.
- W - Post digestion spike for Furnace AA analysis is out of control limits (85-115%), while sample absorbance is less than 50% of spike absorbance.
- G - The TCLP Matrix Spike recovery was greater than the upper limit of the analytical method.
- L - The TCLP Matrix Spike recovery was lower than the lower limit of the analytical method.



RECRA
ENVIRONMENTAL
INC.

OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
METHOD 8240 - VOLATILES

LAB NAME RECRA ENVIRONMENTAL INC.
 JOB NO. 92-0786
 DESC AS008351
 SAMPLE NO. 2C06102

SAMPLE DATE 03/02/92

COMPOUND (MG/L)	ANALYSIS DATE	EPA MAX. CONC.	RESULT	MATRIX CORR. VALUE	Q
Benzene	03/12/92	0.5	0.05	0.0	U
Carbon tetrachloride	03/12/92	0.5	0.05	0.0	U
Chlorobenzene	03/12/92	100	0.05	0.0	U
Chloroform	03/12/92	6.0	0.05	0.0	U
1,2-Dichloroethane	03/12/92	0.5	0.05	0.0	U
1,1-Dichloroethylene	03/12/92	0.7	0.05	0.0	U
Methyl ethyl ketone	03/12/92	200	0.1	0.0	U
Tetrachloroethene	03/12/92	0.7	0.05	0.0	U
Trichloroethene	03/12/92	0.5	0.05	0.0	U
Vinyl chloride	03/12/92	0.2	0.1	0.0	U

SAMPLE NO: C-2 EXCAVATION 2C06102
 DILUTION FACTOR = 10

OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
METHOD 8240 - VOLATILES

LAB NAME RECRA ENVIRONMENTAL INC.
 JOB NO. 92-0786
 DESC AS008351
 SAMPLE NO. 2C06102

SAMPLE DATE 03/02/92

ANALYSIS DATE 03/12/92

COMPOUND	RESULT	Q
Internal Standards		
(%Recovery)		
Bromochloromethane	94	
1,4-Difluorobenzene	91	
Chlorobenzene-D5	94	
Surrogates		
(%Recovery)		
p-Bromofluorobenzene	104	
1,2-Dichloroethane-D4	99	
Toluene-D8	103	

SAMPLE NO: C-2 EXCAVATION 2C06102
 DILUTION FACTOR = 10

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OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
METHOD 8240 - VOLATILES

LAB NAME RECRA ENVIRONMENTAL INC.
JOB NO. 92-0786
DESC AR001686
SAMPLE NO. EBLK

ANALYSIS DATE 03/12/92

COMPOUND	RESULT	Q

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OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
METHOD 8240 - VOLATILES

LAB NAME RECRA ENVIRONMENTAL INC.
JOB NO. 92-0786
DESC AR001686
SAMPLE NO. EBLK

COMPOUND (MG/L)	ANALYSIS DATE	EPA MAX. CONC.	RESULT	MATRIX CORR. VALUE	Q
Benzene	03/12/92	0.5	0.05	0.0	U
Carbon tetrachloride	03/12/92	0.5	0.05	0.0	U
Chlorobenzene	03/12/92	100	0.05	0.0	U
Chloroform	03/12/92	6.0	0.05	0.0	U
1,2-Dichloroethane	03/12/92	0.5	0.05	0.0	U
1,1-Dichloroethylene	03/12/92	0.7	0.05	0.0	U
Methyl ethyl ketone	03/12/92	200	0.1	0.0	U
Tetrachloroethene	03/12/92	0.7	0.05	0.0	U
Trichloroethene	03/12/92	0.5	0.05	0.0	U
Vinyl chloride	03/12/92	0.2	0.1	0.0	U

SAMPLE NO: EXTRACTOR BLANK
DILUTION FACTOR = 10

OLIN CORPORATION
 TOXICITY CHARACTERISTIC
 LEACHING PROCEDURE EXTRACT
 METHOD 8240 - VOLATILES

LAB NAME RECRA ENVIRONMENTAL INC.
 JOB NO. 92-0786
 DESC AR001686
 SAMPLE NO. EBLK

ANALYSIS DATE 03/12/92

COMPOUND	RESULT	Q
Internal Standards		
(%Recovery)		
Bromochloromethane	93	
1,4-Difluorobenzene	93	
Chlorobenzene-D5	91	
Surrogates		
(%Recovery)		
p-Bromofluorobenzene	107	
1,2-Dichloroethane-D4	101	
Toluene-D8	103	

SAMPLE NO: EXTRACTOR BLANK
 DILUTION FACTOR = 10

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OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
METHOD 8240 - VOLATILES

LAB NAME RECRA ENVIRONMENTAL INC.
 JOB NO. 92-0786
 DESC AR001687
 SAMPLE NO. VBLK66

COMPOUND (MG/L)	ANALYSIS DATE	EPA MAX. CONC.	RESULT	MATRIX CORR. VALUE	Q
Benzene	03/12/92	0.5	0.005	0.0	U
Carbon tetrachloride	03/12/92	0.5	0.005	0.0	U
Chlorobenzene	03/12/92	100	0.005	0.0	U
Chloroform	03/12/92	6.0	0.005	0.0	U
1,2-Dichloroethane	03/12/92	0.5	0.005	0.0	U
1,1-Dichloroethylene	03/12/92	0.7	0.005	0.0	U
Methyl ethyl ketone	03/12/92	200	0.01	0.0	U
Tetrachloroethene	03/12/92	0.7	0.005	0.0	U
Trichloroethene	03/12/92	0.5	0.005	0.0	U
Vinyl chloride	03/12/92	0.2	0.01	0.0	U

SAMPLE NO: VOLATILE METHOD BLANK
 DILUTION FACTOR = 1.0

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OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
METHOD 8240 - VOLATILES

LAB NAME RECRA ENVIRONMENTAL INC.
JOB NO. 92-0786
DESC AR001687
SAMPLE NO. VBLK66

ANALYSIS DATE 03/12/92

COMPOUND	RESULT	Q
<u>Internal Standards</u>		
(%Recovery)		
Bromo-chloromethane	92	
1,4-Difluorobenzene	93	
Chlorobenzene-D5	94	
<u>Surrogates</u>		
(%Recovery)		
p-Bromofluorobenzene	104	
1,2-Dichloroethane-D4	102	
Toluene-D8	101	

SAMPLE NO: VOLATILE METHOD BLANK
DILUTION FACTOR = 1.0

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OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT METHOD 8270
BASE/NEUTRAL/ACID EXTRACTABLES

LAB NAME RECRA ENVIRONMENTAL INC.
 JOB NO. 92-0786
 DESC AS008351
 SAMPLE NO. 2C06102

SAMPLE DATE 03/02/92
 EXTRACTION DATE 03/13/92

COMPOUND (MG/L)	ANALYSIS DATE	EPA MAX. CONC.	RESULT	MATRIX CORR. VALUE	Q
o-Cresol	03/16/92	200	0.04	0.0	U
m-Cresol	03/16/92	200	0.04	0.0	U
p-Cresol	03/16/92	200	0.04	0.0	U
1,4-Dichlorobenzene	03/16/92	7.5	0.04	0.0	U
2,4-Dinitrotoluene	03/16/92	0.13	0.04	0.0	U
Hexachlorobenzene	03/16/92	0.13	0.04	0.0	U
Hexachlorobutadiene	03/16/92	0.52	0.04	0.0	U
Hexachloroethane	03/16/92	3.0	0.04	0.0	U
Nitrobenzene	03/16/92	2.0	0.04	0.0	U
Pentachlorophenol	03/16/92	100	0.2	0.0	U
Pyridine	03/16/92	5.0	0.04	0.0	U
2,4,5-Trichlorophenol	03/16/92	400	0.2	0.0	U
2,4,6-Trichlorophenol	03/16/92	2.0	0.04	0.0	U

SAMPLE NO: C-2 EXCAVATION 2C06102 .
 DILUTION FACTOR = 1.0 .
 EXTRACTION VOLUME = 250 ML

OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT METHOD 8270
BASE/NEUTRAL/ACID EXTRACTABLES

LAB NAME RECRA ENVIRONMENTAL INC.
 JOB NO. 92-0786
 DESC AS008351
 SAMPLE NO. 2C06102

SAMPLE DATE 03/02/92
 EXTRACTION DATE 03/13/92
 ANALYSIS DATE 03/16/92

COMPOUND	RESULT	Q
Internal Standards		
(%Recovery)		
1,4-Dichlorobenzene-D4	76	
Naphthalene-D8	74	
Acenaphthene-D10	81	
Phenanthrene-D10	92	
Chrysene-D12	74	
Perylene-D12	83	
Surrogates		
(%Recovery)		
2-Fluorophenol	72	
Phenol-D5	60	
2,4,6-Tribromophenol	78	
Nitrobenzene-D5	94	
2-Fluorobiphenyl	88	
Terphenyl-D14	55	

SAMPLE NO: C-2 EXCAVATION 2C06102
 DILUTION FACTOR = 1.0
 EXTRACTION VOLUME = 250 ML

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OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT METHOD 8270
BASE/NEUTRAL/ACID EXTRACTABLES

LAB NAME RECRA ENVIRONMENTAL INC.
 JOB NO. 92-0786
 DESC AR001688
 SAMPLE NO. EBLK

EXTRACTION DATE 03/13/92

COMPOUND (MG/L)	ANALYSIS DATE	EPA MAX. CONC.	RESULT	MATRIX CORR. VALUE	Q
o-Cresol	03/16/92	200	0.02	0.0	U
m-Cresol	03/16/92	200	0.02	0.0	U
p-Cresol	03/16/92	200	0.02	0.0	U
1,4-Dichlorobenzene	03/16/92	7.5	0.02	0.0	U
2,4-Dinitrotoluene	03/16/92	0.13	0.02	0.0	U
Hexachlorobenzene	03/16/92	0.13	0.02	0.0	U
Hexachlorobutadiene	03/16/92	0.52	0.02	0.0	U
Hexachloroethane	03/16/92	3.0	0.02	0.0	U
Nitrobenzene	03/16/92	2.0	0.02	0.0	U
Pentachlorophenol	03/16/92	100	0.1	0.0	U
Pyridine	03/16/92	5.0	0.02	0.0	U
2,4,5-Trichlorophenol	03/16/92	400	0.1	0.0	U
2,4,6-Trichlorophenol	03/16/92	2.0	0.02	0.0	U

SAMPLE NO: EXTRACTOR BLANK
 DILUTION FACTOR = 1.0
 EXTRACTION VOLUME = 500 ML

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OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT METHOD 8270
BASE/NEUTRAL/ACID EXTRACTABLES

LAB NAME RECRA ENVIRONMENTAL INC.
JOB NO. 92-0786
DESC AR001688
SAMPLE NO. EBLK

EXTRACTION DATE 03/13/92
ANALYSIS DATE 03/16/92

COMPOUND	RESULT	Q
<u>Internal Standards</u>		
(%Recovery)		
1,4-Dichlorobenzene-D4	88	
Naphthalene-D8	79	
Acenaphthene-D10	88	
Phenanthrene-D10	101	
Chrysene-D12	81	
Perylene-D12	93	
<u>Surrogates</u>		
(%Recovery)		
2-Fluorophenol	82	
Phenol-D5	55	
2,4,6-Tribromophenol	138	*
Nitrobenzene-D5	88	
2-Fluorobiphenyl	93	
Terphenyl-D14	88	

SAMPLE NO: EXTRACTOR BLANK
DILUTION FACTOR = 1.0
EXTRACTION VOLUME = 500 ML
*RECOVERY OUTSIDE QUALITY CONTROL LIMITS

LEACHING PROCEDURE EXTRACT METHOD 8270
BASE/NEUTRAL/ACID EXTRACTABLESLAB NAME RECRA ENVIRONMENTAL INC.
JOB NO. 92-0786
DESC AR001689
SAMPLE NO. SBLK41

EXTRACTION DATE 03/13/92

COMPOUND (MG/L)	ANALYSIS DATE	EPA MAX. CONC.	RESULT	MATRIX CORR. VALUE	Q
o-Cresol	03/16/92	200	0.01	0.0	U
m-Cresol	03/16/92	200	0.01	0.0	U
p-Cresol	03/16/92	200	0.01	0.0	U
1,4-Dichlorobenzene	03/16/92	7.5	0.01	0.0	U
2,4-Dinitrotoluene	03/16/92	0.13	0.01	0.0	U
Hexachlorobenzene	03/16/92	0.13	0.01	0.0	U
Hexachlorobutadiene	03/16/92	0.52	0.01	0.0	U
Hexachloroethane	03/16/92	3.0	0.01	0.0	U
Nitrobenzene	03/16/92	2.0	0.01	0.0	U
Pentachlorophenol	03/16/92	100	0.05	0.0	U
Pyridine	03/16/92	5.0	0.01	0.0	U
2,4,5-Trichlorophenol	03/16/92	400	0.05	0.0	U
2,4,6-Trichlorophenol	03/16/92	2.0	0.01	0.0	U

SAMPLE NO: SEMIVOLATILE METHOD BLANK
DILUTION FACTOR = 1.0
EXTRACTION VOLUME = 1000 ML

OLIN CORPORATION
 TOXICITY CHARACTERISTIC
 LEACHING PROCEDURE EXTRACT METHOD 8270
 BASE/NEUTRAL/ACID EXTRACTABLES

LAB NAME RECRA ENVIRONMENTAL INC.
 JOB NO. 92-0786
 DESC AR001689
 SAMPLE NO. SBLK41

EXTRACTION DATE 03/13/92
 ANALYSIS DATE 03/16/92

COMPOUND	RESULT	Q
Internal Standards		
(%Recovery)		
1,4-Dichlorobenzene-D4	81	
Naphthalene-D8	69	
Acenaphthene-D10	78	
Phenanthere-D10	91	
Chrysene-D12	75	
Perylene-D12	90	
Surrogates		
(%Recovery)		
2-Fluorophenol	55	
Phenol-D5	32	
2,4,6-Tribromophenol	103	
Nitrobenzene-D5	82	
2-Fluorobiphenyl	87	
Terphenyl-D14	92	

SAMPLE NO: SEMIVOLATILE METHOD BLANK
 DILUTION FACTOR = 1.0
 EXTRACTION VOLUME = 1000 ML

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OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
PESTICIDES/HERBICIDES

LAB NAME RECRA ENVIRONMENTAL INC.
 JOB NO. 92-0786
 DESC AS008351
 SAMPLE NO. 2C06102

SAMPLE DATE 03/02/92

COMPOUND (MG/L)	EXTRACT. DATE	ANALYSIS DATE	EPA MAX. CONC.	RESULT	MATRIX CORR. VALUE	Q
Chlordane	03/13/92	03/17/92	0.03	0.002	0.0	U
Endrin	03/13/92	03/17/92	0.02	0.0004	0.0	U
Heptachlor	03/13/92	03/17/92	0.006	0.0002	0.0	U
Heptachlor epoxide	03/13/92	03/17/92	0.006	0.0002	0.0	U
Lindane	03/13/92	03/17/92	0.4	0.0004	0.0	U
Methoxychlor	03/13/92	03/17/92	10.0	0.0008	0.0	U
Toxaphene	03/13/92	03/17/92	0.5	0.008	0.0	U
2,4-D	03/16/92	03/20/92	10.0	0.0005	0.0	U
2,4,5-TP	03/16/92	03/20/92	1.0	0.0005	0.0	U

SAMPLE NO: C-2 EXCAVATION 2C6102

PESTICIDE DILUTION FACTOR = 1.0

HERBICIDE DILUTION FACTOR = 3.0

PESTICIDE EXTRACTION VOLUME = 250 ML

HERBICIDE EXTRACTION VOLUME = 330 ML

MEASURED VALUES HAVE NOT BEEN CORRECTED FOR
ANALYTICAL BIAS.

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OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
PESTICIDES/HERBICIDES

LAB NAME RECRA ENVIRONMENTAL INC.
JOB NO. 92-0786
DESC AS008351
SAMPLE NO. 2C06102

SAMPLE DATE 03/02/92
EXTRACTION DATE 03/13/92
ANALYSIS DATE 03/17/92

COMPOUND	RESULT	Q
Surrogates		
(%Recovery) Dibutylchlorendate	105	

SAMPLE NO: C-2 EXCAVATION 2C06102

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OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
PESTICIDES/HERBICIDES

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LAB NAME RECRA ENVIRONMENTAL INC.
JOB NO. 92-0786
DESC AS008351
SAMPLE NO. 2C06102

SAMPLE DATE 03/02/92
EXTRACTION DATE 03/16/92
ANALYSIS DATE 03/20/92

COMPOUND	RESULT	Q
Surrogates		
(%Recovery) 2,4 Dichlorophenoxybutyric acid	15	

SAMPLE NO: C-2 EXCAVATION 2C06102

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OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
PESTICIDES/HERBICIDES

LAB NAME RECRA ENVIRONMENTAL INC.
 JOB NO. 92-0786
 DESC AR001690
 SAMPLE NO. EBLK

COMPOUND (MG/L)	EXTRACT. DATE	ANALYSIS DATE	EPA MAX. CONC.	RESULT	MATRIX CORR. VALUE	Q
Chlordane	03/13/92	03/17/92	0.03	0.001	0.0	U
Endrin	03/13/92	03/17/92	0.02	0.0002	0.0	U
Heptachlor	03/13/92	03/17/92	0.006	0.0001	0.0	U
Heptachlor epoxide	03/13/92	03/17/92	0.006	0.0001	0.0	U
Lindane	03/13/92	03/17/92	0.4	0.0001	0.0	U
Methoxychlor	03/13/92	03/17/92	10.0	0.0004	0.0	U
Toxaphene	03/13/92	03/17/92	0.5	0.004	0.0	U
2,4-D	03/16/92	03/19/92	10.0	0.0001	0.0	U
2,4,5-TP	03/16/92	03/19/92	1.0	0.0001	0.0	U

SAMPLE NO: EXTRACTOR BLANK
 PESTICIDE DILUTION FACTOR = 1.0
 HERBICIDE DILUTION FACTOR = 1.0
 PESTICIDE EXTRACTION VOLUME = 500 ML
 HERBICIDE EXTRACTION VOLUME = 400 ML

OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
PESTICIDES/HERBICIDES

LAB NAME RECRA ENVIRONMENTAL INC.
JOB NO. 92-0786
DESC AR001690
SAMPLE NO. EBLK

EXTRACTION DATE 03/13/92
ANALYSIS DATE 03/17/92

COMPOUND	RESULT	Q
Surrogates		
(%Recovery) Dibutylchlorendate	102	

SAMPLE NO: EXTRACTOR BLANK

OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
PESTICIDES/HERBICIDES

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LAB NAME RECRA ENVIRONMENTAL INC.
JOB NO. 92-0786
DESC AR001690
SAMPLE NO. EBLK

EXTRACTION DATE 03/16/92
ANALYSIS DATE 03/19/92

COMPOUND	RESULT	Q
Surrogates		
(%Recovery) 2,4 Dichlorophenoxybutyric acid	19	

SAMPLE NO: EXTRACTOR BLANK

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OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
PESTICIDES/HERBICIDES

LAB NAME RECPA ENVIRONMENTAL INC.
 JOB NO. 92-0786
 DESC AR001691
 SAMPLE NO. METHOD BLANK

COMPOUND (MG/L)	EXTRACT. DATE	ANALYSIS DATE	EPA MAX. CONC.	RESULT	MATRIX CORR. VALUE	Q
Chlordane	03/13/92	03/17/92	0.03	0.0005	0.0	U
Endrin	03/13/92	03/17/92	0.02	0.0001	0.0	U
Heptachlor	03/13/92	03/17/92	0.006	0.0001	0.0	U
Heptachlor epoxide	03/13/92	03/17/92	0.006	0.0001	0.0	U
Lindane	03/13/92	03/17/92	0.4	0.0001	0.0	U
Methoxychlor	03/13/92	03/17/92	10.0	0.0002	0.0	U
Toxaphene	03/13/92	03/17/92	0.5	0.002	0.0	U
2,4-D	03/16/92	03/20/92	10.0	0.0002	0.0	U
2,4,5-TP	03/16/92	03/20/92	1.0	0.0001	0.0	U

PESTICIDE DILUTION FACTOR = 1.0
 HERBICIDE DILUTION FACTOR = 1.0
 PESTICIDE EXTRACTION VOLUME = 1000 ML
 HERBICIDE EXTRACTION VOLUME = 500 ML

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OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
PESTICIDES/HERBICIDES

LAB NAME RECRA ENVIRONMENTAL INC.
JOB NO. 92-0786
DESC AR001691
SAMPLE NO. METHOD BLANK

EXTRACTION DATE 03/13/92
ANALYSIS DATE 03/17/92

COMPOUND	RESULT	Q
Surrogates		
(%Recovery) Dibutylchlorendate	103	

OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
PESTICIDES/HERBICIDES

24

LAB NAME RECRA ENVIRONMENTAL INC.
JOB NO. 92-0786
DESC AR001691
SAMPLE NO. METHOD BLANK

EXTRACTION DATE 03/16/92
ANALYSIS DATE 03/20/92

COMPOUND	RESULT	Q
Surrogates		
(%Recovery) 2,4 Dichlorophenoxybutyric acid	113	

176

OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
TOTAL METALS

LAB NAME RECRA ENVIRONMENTAL INC.
JOB NO. 92-0786
DESC AS008350
SAMPLE NO. 2C06101

SAMPLE DATE 01/27/92

COMPOUND (MG/L)	METHOD NUMBER	ANALYSIS DATE	EPA MAX. CONC.	RESULT	MATRIX CORR. VALUE	Q
Total Arsenic	7060	03/16/92	5.0	0.007	0.0	
Total Barium	7080	03/17/92	100.0	0.23	0.0	
Total Cadmium	7130	03/16/92	1.0	0.01	0.0	U
Total Chromium	7190	03/16/92	5.0	0.019	0.0	
Total Lead	7420	03/17/92	5.0	0.09	0.0	U
Total Mercury	7470	03/18/92	0.2	0.0022	0.0	
Total Selenium	7740	03/16/92	1.0	0.005	0.0	U
Total Silver	7760	03/17/92	5.0	0.022	0.0	

SAMPLE NO: NIACHLOR TANK SLUDGE 2C06101
MEASURED VALUES HAVE NOT BEEN CORRECTED FOR
ANALYTICAL BIAS.

249

OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
TOTAL METALS

LAB NAME RECRA ENVIRONMENTAL INC.
JOB NO. 92-0786
DESC AR001685
SAMPLE NO. EB

COMPOUND (MG/L)	METHOD NUMBER	ANALYSIS DATE	EPA MAX. CONC.	RESULT	MATRIX CORR. VALUE	Q
Total Arsenic	7060	03/16/92	5.0	0.005	0.0	U
Total Barium	7080	03/17/92	100.0	0.2	0.0	U
Total Cadmium	7130	03/16/92	1.0	0.01	0.0	U
Total Chromium	7190	03/16/92	5.0	0.01	0.0	U
Total Lead	7420	03/17/92	5.0	0.09	0.0	U
Total Mercury	7470	03/18/92	0.2	0.0004	0.0	U
Total Selenium	7740	03/16/92	1.0	0.005	0.0	U
Total Silver	7760	03/17/92	5.0	0.01	0.0	U

SAMPLE NO: EXTRACTOR BLANK

OLIN CORPORATION
TOXICITY CHARACTERISTIC
LEACHING PROCEDURE EXTRACT
TOTAL METALS

LAB NAME RECRA ENVIRONMENTAL INC.
JOB NO. 92-0786
DESC AR001684
SAMPLE NO. METHOD BLANK

COMPOUND (MG/L)	METHOD NUMBER	ANALYSIS DATE	EPA MAX. CONC.	RESULT	MATRIX CORR. VALUE	Q
Total Arsenic	7060	03/16/92	5.0	0.005	0.0	U
Total Barium	7080	03/17/92	100.0	0.2	0.0	U
Total Cadmium	7130	03/16/92	1.0	0.01	0.0	U
Total Chromium	7190	03/16/92	5.0	0.01	0.0	U
Total Lead	7420	03/17/92	5.0	0.09	0.0	U
Total Mercury	7470	03/18/92	0.2	0.0002	0.0	U
Total Selenium	7740	03/16/92	1.0	0.005	0.0	U
Total Silver	7760	03/17/92	5.0	0.01	0.0	U

RECREATIONAL ENVIRONMENTAL, INC.