

**FILE ON EDOC'S**  **YES**  **NO**  
**SITE NAME** \_\_\_\_\_  
**SITE #** \_\_\_\_\_  
**COUNTY** \_\_\_\_\_ **TOWN** \_\_\_\_\_  
**FOILABLE**  **YES**  **NO**  
**SC/PSA** \_\_\_\_\_ **RI/FS** \_\_\_\_\_  
**RD** \_\_\_\_\_ **RA** \_\_\_\_\_  
**SM** \_\_\_\_\_ **OTHER** \_\_\_\_\_  
**NAME DESCRIPTION:**

Report. HW130004. 1994-10-01. OXJ - Latex -  
Tank Removal - Project.

**LEGGETTE, BRASHEARS & GRAHAM, INC.**  
Professional Ground-Water  
and Environmental Services



**50**  
Years of Excellence

**LATEX TANK REMOVAL PROJECT  
OCCIDENTAL CHEMICAL CORPORATION  
HOOKER CHEMICAL/RUCO POLYMER  
CORPORATION SITE  
HICKSVILLE, NEW YORK**

OCCIDENTAL CHEMICAL CORPORATION

October 1994

*Leggette, Brashears & Graham, Inc.*  
Professional Ground-Water and Environmental Services  
72 Danbury Road  
Wilton, CT 06897

TABLE OF CONTENTS

	<u>Page</u>
EXECUTIVE SUMMARY . . . . .	1
INTRODUCTION . . . . .	2
TANK REMOVAL ACTIVITIES . . . . .	2
POST-EXCAVATION SAMPLING . . . . .	3
RESTORATION . . . . .	4
CONCLUSION . . . . .	5
APPENDICES	

**TABLE**  
**(at end of report)**

**Table**

- |   |  |
|---|--|
| 1 | Analytical Data Summary, Latex Tank Removal, Hicksville, New York, July 1994 |
|---|--|

**LIST OF FIGURES**  
**(at end of report)**

**Figure**

- |    |                                  |
|----|----------------------------------|
| 1  | Tank Excavation Location Map     |
| 2  | Tank Details                     |
| 2a | Tank Details                     |
| 3  | Post-Excavation Sample Locations |
| 4  | Site Restoration Details         |
| 5  | Photograph of Site Restoration   |

**LATEX TANK REMOVAL PROJECT  
OCCIDENTAL CHEMICAL CORPORATION  
HOOKER CHEMICAL/RUCO POLYMER  
CORPORATION SITE  
HICKSVILLE, NEW YORK**

**EXECUTIVE SUMMARY**

Three buried latex storage tanks, identified during the Remedial Investigation (RI), have been excavated from the Hooker/Ruco site and disposed of offsite. Liquid and solid materials were removed from the tanks and disposed of at the DuPont wastewater treatment facility and New Milford landfill, respectively. The three tanks were removed, dismantled and transported to a metal reclamation facility for recycling purposes.

Post-excavation soil sampling results demonstrated that there have been no significant impacts on the soil in the vicinity of the buried tanks. The levels of chemicals detected in the post-excavation samples were below the soil clean-up objectives for the protection of groundwater quality.

Following receipt and review of the post-excavation sample data, the tank excavation was backfilled, graded and recontoured to create a recharge basin that will be used in the future for discharge of treated groundwater. After recontouring and regrading, the work area was enclosed with chain-link fencing and equipped with a double-swing gate and lock. The latex tank removal project was completed on July 21, 1994.

## INTRODUCTION

An electromagnetic (EM) survey completed during the 1989 RI at the Hooker/Ruco site located an anomaly between the parking lot and railroad right-of-way where latex storage tanks were reported to be buried (figure 1). Occidental Chemical Corporation (OCC) completed exploratory test pits between September 20 and 23, 1993 and confirmed the presence of three buried tanks (figure 2). The contents of each tank were similar and contained varying amounts of liquid, solidified film and backfilled sand. Samples of each matrix were collected during September 1993 and analyzed to characterize the material for disposal. The results of the preliminary work were presented in the report entitled "Latex Storage Tank Program, Test Pit Excavation and Waste Characterization Sampling", dated May 1994.

The removal of the three tanks and disposal of the tanks and their contents was completed July 21, 1994. Tank removal and disposal was completed in accordance with the Tank Removal Work Plan approved by the Environmental Protection Agency (EPA) in a letter dated July 26, 1993. This report presents a summary of the tank removal project.

## TANK REMOVAL ACTIVITIES

The tank removal program commenced June 20, 1994, with the mobilization of equipment and supplies by the tank removal contractor. The area surrounding the three tanks was excavated and the top of each tank exposed. The excavated soil was temporarily staged on plastic pending removal of the tanks. Each tank was visually inspected and the atmosphere within the tanks tested for oxygen content, explosivity and volatile vapors through the exposed 18-inch manways at the ends of the tanks. Air monitoring of the tanks did not show elevated volatile vapors and explosive limits were within acceptable ranges. The tanks were oxygen deficient with an oxygen level of 19 percent. Each tank was purged with an educator and an air compressor for approximately one-half hour. After completely purging the tanks, the atmosphere was retested and monitoring results indicated oxygen levels within acceptable ranges, between 20 and 21 percent.

Access ports were cut in the top of each tank to allow the liquid tank contents to be removed. A total of 18,030 gallons of liquid was evacuated and transported to the DuPont wastewater treatment facility in Deepwater, New Jersey for processing and disposal. Liquid evacuation, transport and treatment was completed on June 28, 1994.

After removing all free-standing liquid, the tanks were cut longitudinally, and the solid material removed from each tank. Tank impellers, and the interior metal tank supports, were removed, staged on plastic sheeting and cut to an acceptable size for disposal. Solidified material and sand removed from the tanks was temporarily staged onsite on plastic sheeting prior to offsite disposal.

After receiving authorization on July 11, 1994 from the Connecticut Department of Environmental Protection (CTDEP), the solid material was placed in roll-off containers. A total of 40 tons of solid material was transported and disposed at Waste Management, Inc.'s New Milford landfill located in New Milford, Connecticut. Excavation, transport and disposal of the solid material was completed on July 21, 1994.

The tanks were removed and staged adjacent to the excavation. The tanks were cut longitudinally in half and then manually scraped using pneumatic tools to remove residual solidified material. After final scraping, the tanks were dismantled and cut in quarters (figure 3). The three dismantled tanks were transported to Garden State Scrap Metal and Salvage Corporation located in Avenel, New Jersey for recycling on July 6, 1994.

Copies of the bills of lading/disposal certificates received from the DuPont wastewater treatment facility and the New Milford Landfill, and the confirmation of receipt for recycling received from Garden State Scrap Metal and Salvage Corporation, are attached in Appendix I.

### POST-EXCAVATION SAMPLING

Prior to recontouring, two soil samples (north and south) and one duplicate soil sample (duplicate south) were collected from the floor of the excavation at locations shown on figure 3. Soil samples were collected with dedicated stainless-steel sampling equipment. The soil samples were transported to the laboratory and analyzed for Target Compound List (TCL) parameters. The analytical results for the soil samples are presented on table 1. The analytical



results were validated and the Quality Assurance/Quality Control (QA/QC) summary is presented in Appendix II. The validation report finds the data to be acceptable.

Concentrations of detected compounds are consistent with soil sample results from the RI, and are below ten times the New York State recommended soil clean-up objectives for the protection of groundwater quality. The soil results show that the excavation was complete and no additional excavation is required. Authorization to backfill and recontour the excavation was received from the EPA.

The data show that the soils below the latex tank excavation contain low levels of volatile organics, polynuclear aromatic hydrocarbons (PAHs), pesticides and PCBs. Low levels, less than 0.013 mg/kg (milligrams per kilogram) of acetone, tetrachloroethene and xylenes, were detected in the post-excavation soil samples; acetone was detected in the duplicate sample.

PAH compounds were detected in the soils tested at estimated levels; none of the individual PAH's were detected at levels exceeding 0.5 mg/kg.

Bis (2-ethylhexyl) phthalate was detected in the south post-excavation soil sample and the duplicate soil sample at a concentration of 2.7 mg/kg. Low levels of other phthalate compounds were also detected in the post-excavation samples at estimated values of less than 0.5 mg/kg.

Pesticides, including 4,4'-DDE, 4,4'-DDT and alpha Chlordane were detected in the soil sample collected from the northern portion of the excavation, at levels less than 0.01 mg/kg. These results are suspect due to the low detection of PCB's. Aroclor 1248 and Aroclor 1254 were detected in both samples and the duplicate sample at concentrations less than 1 mg/kg.

## RESTORATION

Following receipt and review of the analytical results of the post-excavation samples, the excavation was backfilled, graded and recontoured to create a sump that will be used to recharge treated water during the implementation of Operable Unit 1. The excavation was recontoured to include a 3-foot deep, oval-shaped recharge basin that measures 72 feet in length

and 39 feet in width. The recharge basin sidewalls were graded to create a 2:1 run over rise ratio.

Posts and a 6-foot tall chain-link industrial fence were installed between the site's parking area and the recontoured excavation. The fencing extended 166 linear feet and was tied in with the existing facility fencing. A double swing gate equipped with a keyed lock was installed to provide entry into the restored area.

Photographs showing final field conditions and a restoration site map depicting fencing and recharge basin locations is presented on figures 4 and 5.

### CONCLUSION

The tanks and tank contents have been excavated and properly disposed of in accordance with the Tank Removal Work Plan dated June 1993. Restoration activities were completed and the EPA made a Final Inspection on July 14, 1994. No deficiencies were noted during the Final Inspection.

sac  
October 5, 1994  
hicks.lat/OCC

**TABLE**

TABLE 1  
ANALYTICAL DATA SUMMARY  
LATEX TANK REMOVAL  
HICKSVILLE, NEW YORK  
JULY 1994

<i>Parameter</i>	<i>Sample ID</i>	<i>South Sample</i>	<i>South Sample Duplicate</i>	<i>North Sample</i>
<i>TCL Volatiles (µg/kg)</i>				
Chloromethane		ND 10	ND 11	ND 13
Bromomethane		ND 10	ND 11	ND 13
Vinyl chloride		ND 10	ND 11	ND 13
Chloroethane		ND 10	ND 11	ND 13
Methylene chloride		ND 10	ND 11	ND 13
Acetone		11J	12J	13J
Carbon disulfide		ND 10	ND 11	ND 13
1,1-Dichloroethene		ND 10	ND 11	ND 13
1,1-Dichloroethane		ND 10	ND 11	ND 13
1,2-Dichloroethene (total)		ND 10	ND 11	ND 13
Chloroform		ND 10	ND 11	ND 13
1,2-Dichloroethane		ND 10	ND 11	ND 13
2-Butanone		ND 10	ND 11	ND 13
1,1,1-Trichloroethane		ND 10	ND 11	ND 13
Carbon tetrachloride		ND 10	ND 11	ND 13
Bromodichloromethane		ND 10	ND 11	ND 13
1,2-Dichloropropane		ND 10	ND 11	ND 13
cis-1,3-Dichloropropene		ND 10	ND 11	ND 13
Trichloroethene		ND 10	ND 11	ND 13
Dibromochloromethane		ND 10	ND 11	ND 13
1,1,2-Trichloroethene		ND 10	ND 11	ND 13
Benzene		ND 10	ND 11	ND 13
trans-1,3-Dichloropropene		ND 10	ND 11	ND 13
Bromoform		ND 10	ND 11	ND 13
4-Methyl-2-pentanone		ND 10	ND 11	ND 13
2-Hexanone		ND 10	ND 11	ND 13
Tetrachloroethene		7J	ND 11	10J
1,1,2,2-Tetrachloroethane		ND 10	ND 11	ND 13
Toluene		ND 10	ND 11	ND 13
Chlorobenzene		ND 10	ND 11	ND 13
Ethylbenzene		ND 10	ND 11	ND 13
Styrene		ND 10	ND 11	ND 13
Xylene (total)		3J	ND 11	ND 13

TABLE 1  
ANALYTICAL DATA SUMMARY  
LATEX TANK REMOVAL  
HICKSVILLE, NEW YORK  
JULY 1994

Parameter	Sample ID	South Sample		North Sample
		Sample	Duplicate	
<i>TCL Semi-Volatiles (µg/kg)</i>				
Phenol		ND 350	200J	ND 420
bis(2-Chloroethyl)ether		ND 350	ND 350	ND 420
2-Chlorophenol		ND 350	ND 350	ND 420
1,3-Dichlorobenzene		ND 350	ND 350	ND 420
1,4-Dichlorobenzene		ND 350	ND 350	ND 420
1,2-Dichlorobenzene		ND 350	ND 350	ND 420
2-Methylphenol		ND 350	ND 350	ND 420
2,2'-oxybis(1-Chloropropane)		ND 350	ND 350	ND 420
4-Methylphenol		ND 350	ND 350	ND 420
N-Nitroso-di-n-propylamine		ND 350	ND 350	ND 420
Hexachloroethane		ND 350	ND 350	ND 420
Nitrobenzene		ND 350	ND 350	ND 420
Isophorone		ND 350	ND 350	ND 420
2-Nitrophenol		ND 350	ND 350	ND 420
2,4-Dimethylphenol		ND 350	ND 350	ND 420
bis(2-Chloroethoxy)methane		ND 350	ND 350	ND 420
2,4-Dichlorophenol		ND 350	ND 350	ND 420
1,2,4-Trichlorobenzene		ND 350	ND 350	ND 420
Naphthalene		ND 350	ND 350	ND 420
4-Chloroaniline		ND 350	ND 350	ND 420
Hexachlorobutadiene		ND 350	ND 350	ND 420
4-Chloro-3-methylphenol		ND 350	ND 350	ND 420
2-Methylnaphthalene		ND 350	ND 350	ND 420
Hexachlorocyclopentadiene		ND 350	ND 350	ND 420
2,4,6-Trichlorophenol		ND 860	ND 860	ND 1000
2,4,5-Trichlorophenol		ND 860	ND 350	ND 420
2-Chloronaphthalene		ND 330	ND 350	ND 420
2-Nitroaniline		ND 860	ND 860	ND 1000
Dimethylphthalate		28J	ND 350	ND 420
Acenaphthylene		ND 350	ND 350	ND 420
2,6-Dinitrotoluene		ND 350	ND 350	ND 420
3-Nitroaniline		ND 860	ND 860	ND 1000
Acenaphthene		19J	ND 350	ND 420
2,4-Dinitrophenol		ND 860	ND 860	ND 1000
4-Nitrophenol		ND 860	ND 860	ND 1000
Dibenzofuran		11J	ND 350	ND 420
2,4-Dinitrotoluene		ND 350	ND 350	ND 420
Diethylphthalate		15J	ND 350	ND 420
4-Chlorophenyl-phenylether		ND 350	ND 350	ND 420
Fluorene		17J	ND 350	ND 420
4-Nitroaniline		ND 860	ND 860	ND 1000

TABLE 1  
ANALYTICAL DATA SUMMARY  
LATEX TANK REMOVAL  
HICKSVILLE, NEW YORK  
JULY 1994

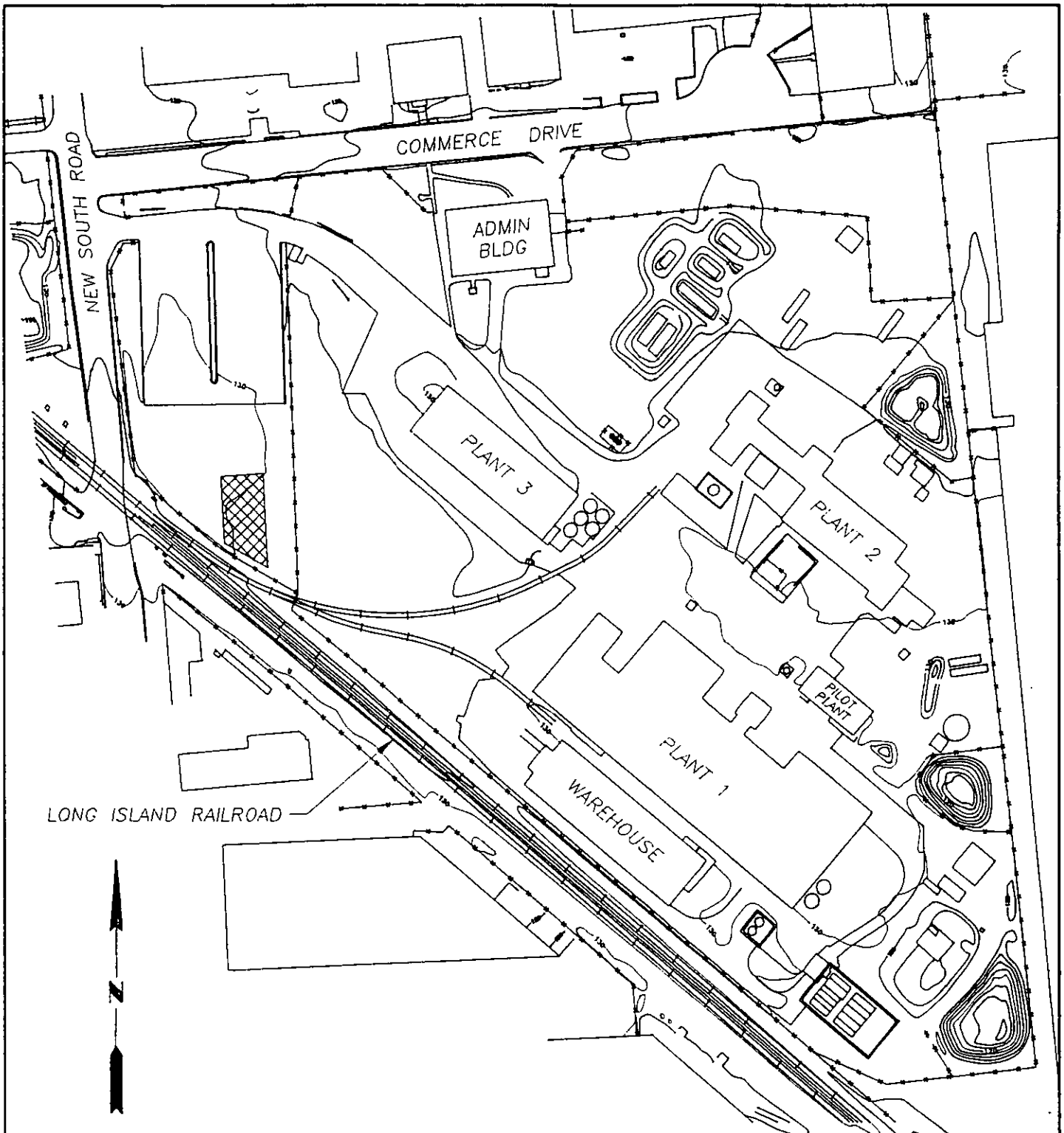
<i>Parameter</i>	<i>Sample ID</i>	<i>South Sample</i>	<i>South Sample Duplicate</i>	<i>North Sample</i>
<i>TCL Semi-Volatiles (µg/kg) (cont'd)</i>				
4,6-Dinitro-2-methylphenol		ND 860	ND 860	ND 1000
N-Nitrosodiphenylamine		ND 350	ND 350	ND 420
4-Bromophenyl-phenylether		ND 350	ND 350	ND 420
Hexachlorobenzene		ND 350	ND 350	ND 420
Pentachlorophenol		ND 860	ND 860	ND 1000
Phenanthrene		210J	21J	12J
Anthracene		41J	ND 350	ND 420
Carbazole		40J	ND 350	ND 420
Di-n-butylphthalate		ND 350	ND 350	ND 420
Fluoranthene		280J	31J	25J
Pyrene		230J	29J	23J
Butylbenzylphthalate		ND 350	ND 350	ND 420
3,3'-Dichlorobenzidine		ND 350	ND 350	ND 420
Benzo(a)anthracene		120J	14J	11J
Chrysene		140J	ND 350	ND 420
bis(2-Ethylhexyl)phthalate		2700	2700	ND 610
Di-n-octylphthalate		27J	39J	ND 420
Benzo(b)fluoranthene		91J	ND 350	14J
Benzo(k)fluoranthene		110J	ND 350	12J
Benzo(a)pyrene		110J	ND 350	ND 420
Indeno(1,2,3-cd)pyrene		51J	ND 350	ND 420
Dibenzo(a,h)anthracene		ND 350	ND 350	ND 420
Benzo(g,h,i)perylene		43J	ND 350	ND 420
<i>TCL Pesticides/PCBs (µg/kg)</i>				
alpha-BHC		ND 1.8	ND 1.8	ND 2.1
beta-BHC		ND 1.8	ND 1.8	ND 2.1
delta-BHC		ND 1.8	ND 1.8	ND 2.1
gamma-BHC		ND 1.8	ND 1.8	ND 2.1
Heptachlor		ND 1.8	ND 1.8	ND 2.1
Aldrin		ND 1.8	ND 1.8	ND 2.1
Heptachlor epoxide		ND 1.8	ND 1.8	ND 2.1
Endosulfan I		ND 1.8	ND 1.8	ND 2.1
Dieldrin		ND 3.5	ND 3.5	ND 4.1
4,4'-DDE		ND 3.5	ND 3.5	6.1
Endrin		ND 3.5	ND 3.5	ND 4.1
Endosulfan II		ND 3.5	ND 3.5	ND 4.1
4,4'-DDD		ND 3.5	ND 3.5	ND 4.1
Endosulfan sulfate		ND 3.5	ND 3.5	ND 4.1
4,4'-DDT		ND 3.5	ND 3.5	5.9
Methoxychlor		ND 18	ND 18	ND 21

TABLE 1  
 ANALYTICAL DATA SUMMARY  
 LATEX TANK REMOVAL  
 HICKSVILLE, NEW YORK  
 JULY 1994

<i>Parameter</i>	<i>Sample ID</i>	<i>South Sample</i>	<i>South Sample Duplicate</i>	<i>North Sample</i>
<i>TCL Pesticides/PCBs (µg/kg) (con't)</i>				
Endrin ketone		ND 3.5	ND 3.5	ND 2.1
Endrin aldehyde		ND 3.5	ND 3.5	ND 4.1
alpha-Chlordane		ND 1.8	ND 1.8	7.1
gamma-Chlordane		ND 1.8	ND 1.8	ND 2.1
Toxaphene		ND 180	ND 180	ND 210
PCB-1016		ND 35	ND 35	ND 41
PCB-1221		ND 72	ND 72	ND 84
PCB-1232		ND 35	ND 35	ND 41
PCB-1242		ND 35	ND 35	ND 41
PCB-1248		370D	490D	30J
PCB-1254		430DJ	750DJ	86
PCB-1260		ND 35	ND 35	ND 41

**FIGURES**





LEGEND



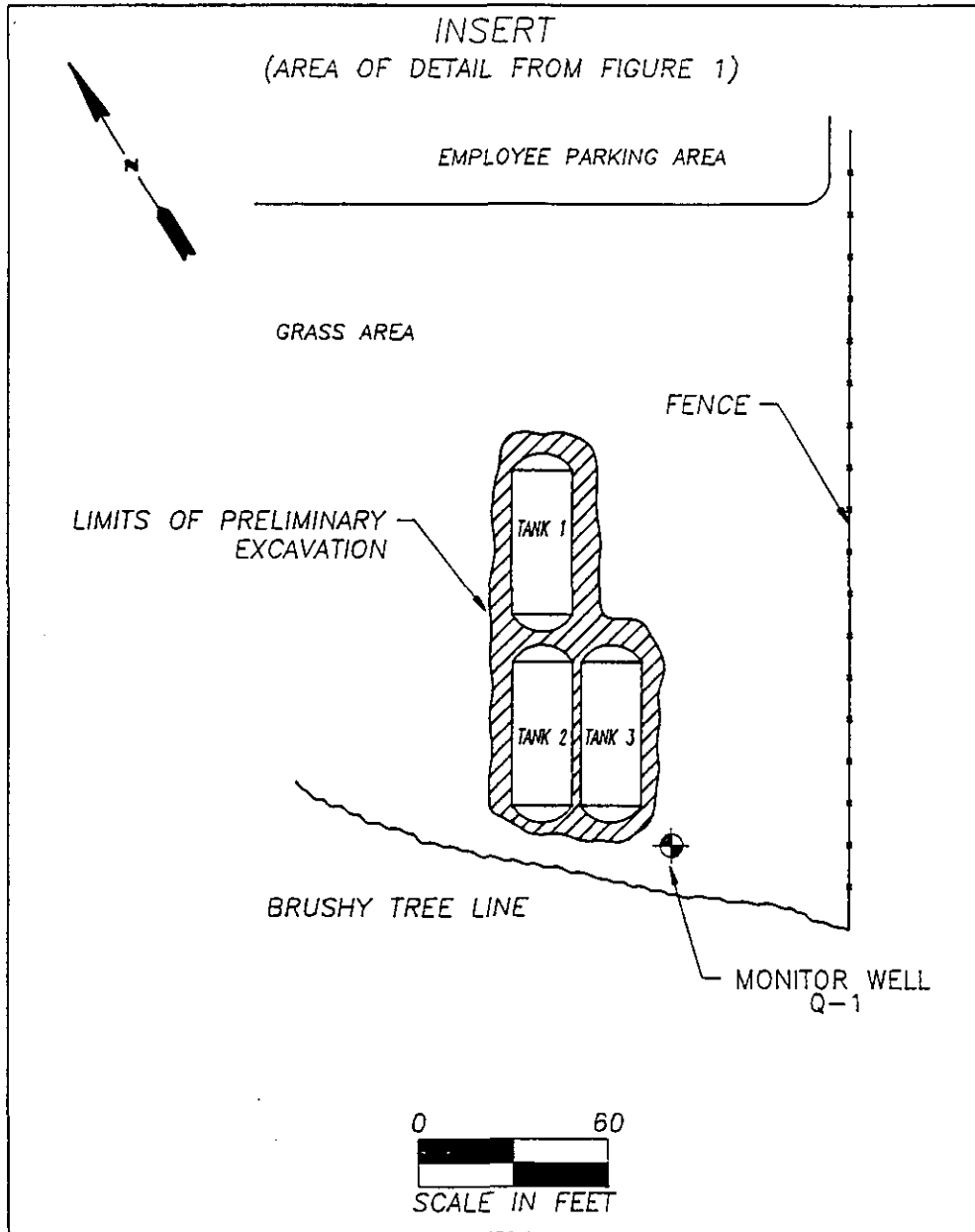
TANK EXCAVATION WORK AREA



OCCIDENTAL CHEMICAL CORPORATION  
HOOKER/RUCO SITE  
HICKSVILLE, NEW YORK

TANK EXCAVATION LOCATION MAP

DATE	REVISED	PREPARED BY:
		LEGGETTE, BRASHEARS & GRAHAM, INC.
		Professional Ground-Water Consultants
		72 Danbury Road
		Wilton, CT 06897
		(203) 762-1207
		DATE: 8/16/94
		FIGURE: 1

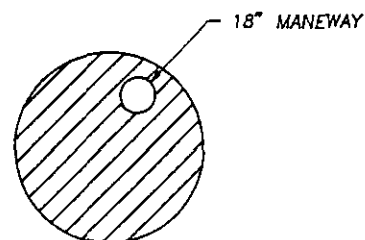
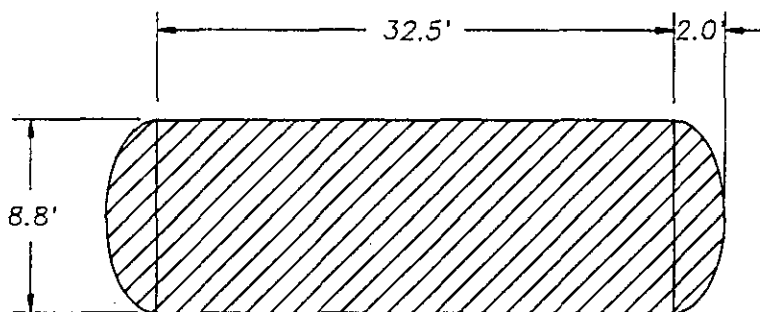
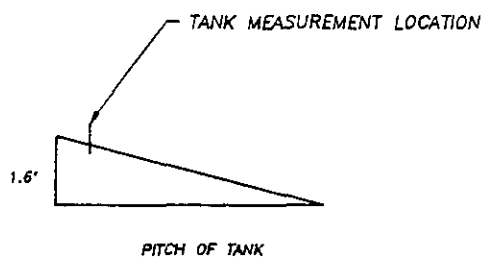
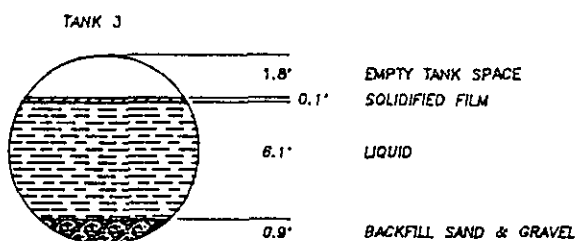
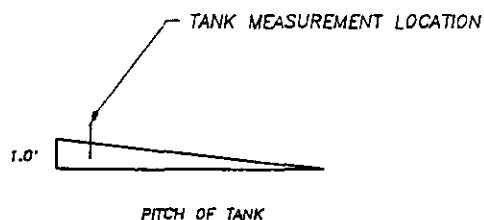
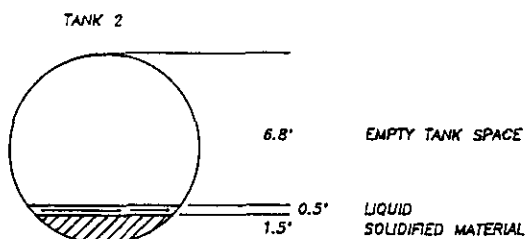
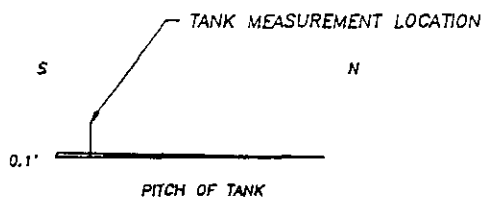
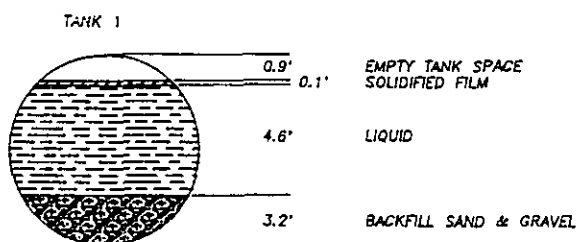


**OCCIDENTAL CHEMICAL CORPORATION  
HOOKER/RUCO SITE  
HICKSVILE, NEW YORK**

**TANK DETAILS**

DATE	REVISED	PREPARED BY:
		<b>LEGGETTE, BRASHEARS &amp; GRAHAM, INC.</b>
		<i>Professional Ground-Water and Environmental Services</i>
		72 Danbury Road
		Wilton, CT 06897
		(203) 782-1207
		DATE: 8/16/94
		FIGURE: 2

SUMMARY OF TANK MEASUREMENTS

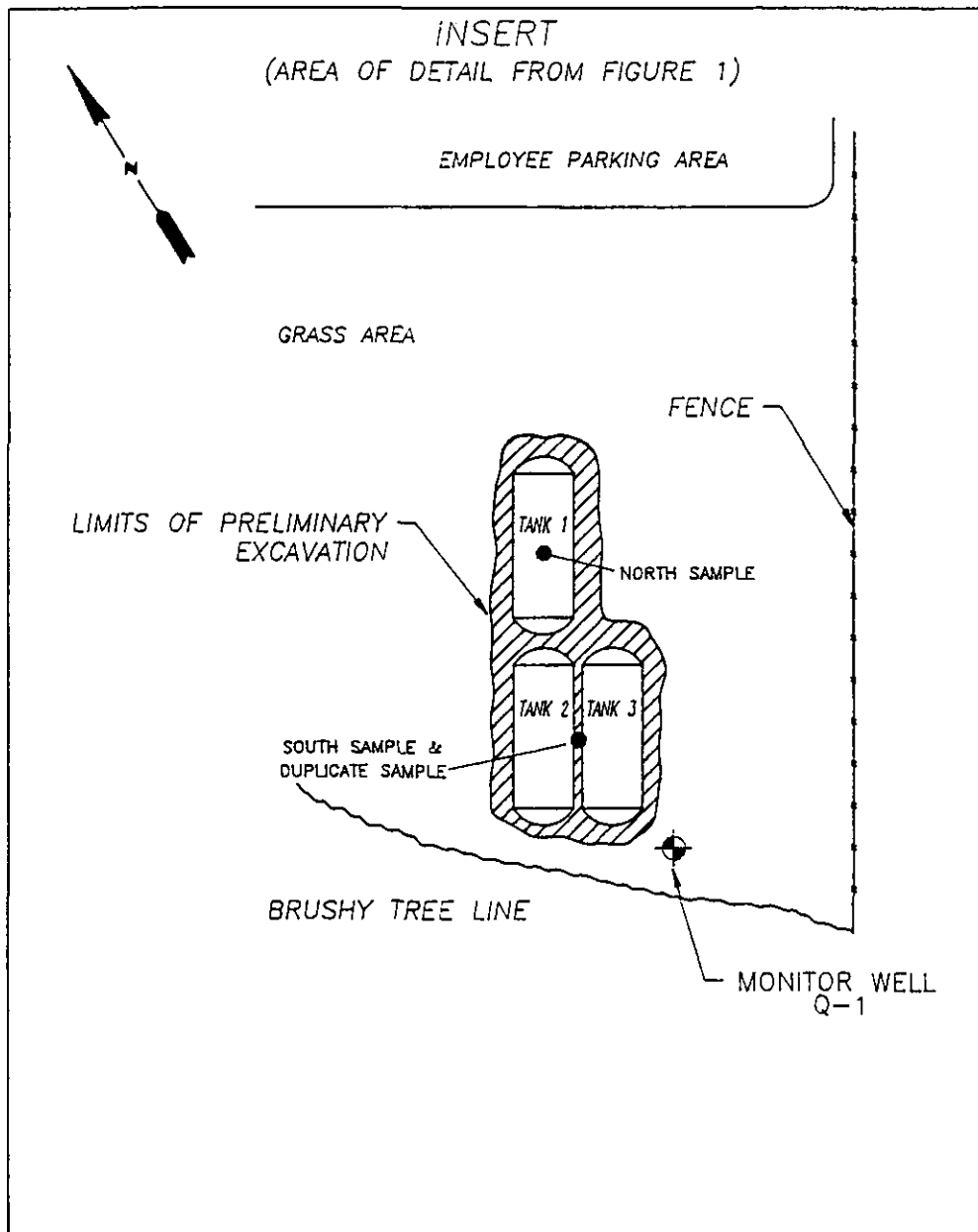


NOT TO SCALE

OCCIDENTAL CHEMICAL CORPORATION  
HOOKER/RUCO SITE  
HICKSVILE, NEW YORK

TANK DETAILS

DATE	REVISED	PREPARED BY:
		LEGGETTE, BRASHEARS & GRAHAM, INC.
		Professional Ground-Water and Environmental Services
		72 Danbury Road
		Wilton, CT 06897
		(203) 762-1207
		DATE: 8/16/94
		FIGURE: 2A



LEGEND

- POST EXCAVATION SAMPLE LOCATION

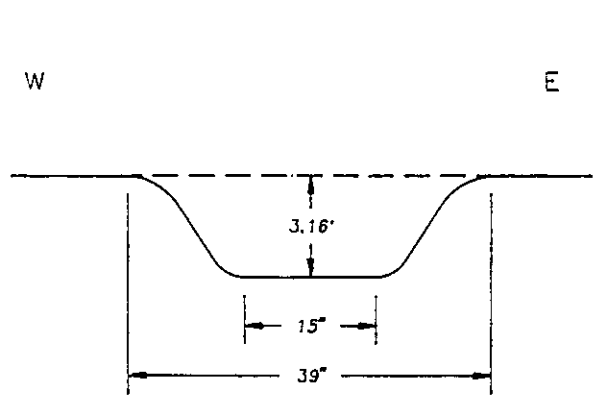
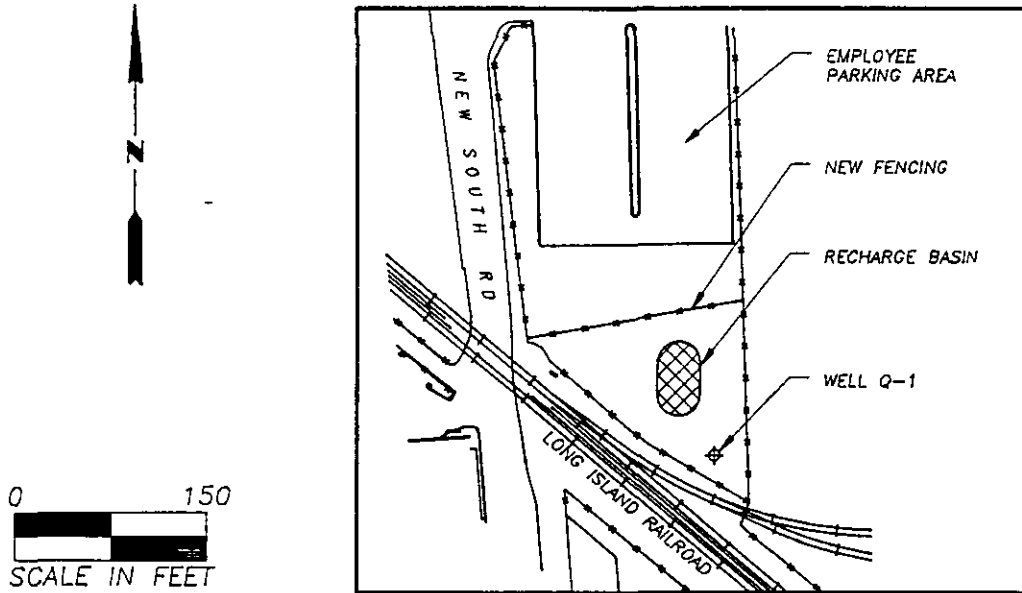


**OCCIDENTAL CHEMICAL CORPORATION  
HOOKER/RUCO SITE  
HICKSVILLE, NEW YORK**

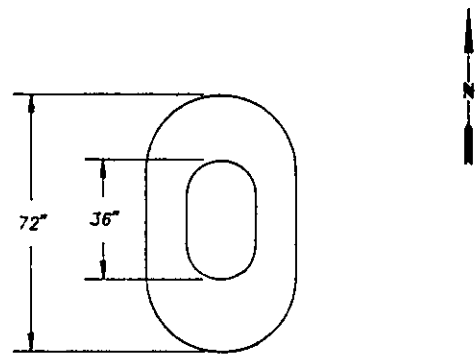
POST EXCAVATION SAMPLE LOCATIONS

DATE	REVISED	PREPARED BY:
		LEGGETTE, BRASHEARS & GRAHAM, INC.
		Professional Ground-Water Consultants
		72 Danbury Road
		Wilton, CT 06897
		(203) 762-1207
		DATE: 8/16/94
		FIGURE: 3

INSERT  
(AREA OF DETAIL FROM FIGURE 1)



EAST-WEST CROSS-SECTIONAL VIEW OF  
RECONTOURED RECHARGE BASIN  
NOT TO SCALE



TOP VIEW OF RECONTOURED  
RECHARGE BASIN  
NOT TO SCALE

OCCIDENTAL CHEMICAL CORPORATION  
HOOKER/RUCO SITE  
HICKSVILE, NEW YORK

SITE RESTORATION DETAILS

DATE	REVISED	PREPARED BY:
		LEGGETTE, BRASHEARS & GRAHAM, INC.
		Professional Ground-Water and Environmental Services
		72 Danbury Road
		Wilton, CT 06897
		(203) 762-1207
		DATE: 8/16/94
		FIGURE: 4



1. COMPLETED SITE RESTORATION SHOWING RESTORED WORK AREA, RECONTOURED RECHARGE BASIN AND PERIMETER FENCING IN THE BACKGROUND, VIEW LOOKING NORTH.

OCCIDENTAL CHEMICAL CORPORATION  
 HOOKER/RUCO SITE  
 HICKSVILE, NEW YORK

PHOTOGRAPH SHOWING SITE RESTORATION DETAILS

DATE	REVISED	PREPARED BY:
		LEGGETTE, BRASHEARS & GRAHAM, INC.
		Professional Ground-Water and Environmental Services
		72 Danbury Road
		Wilton, CT 06897
		(203) 762-1207
		DATE: 8/16/94
		FIGURE: 5

**APPENDIX I**

E. I. DU PONT DE NEMOURS & CO. (INC.)

WILMINGTON, DELAWARE 19898 U.S.A.

INVOICE NO.

L33 0713483

1 MM

CUSTOMER ORDER NO.

OW04481 REL 1

DUPONT ORDER NO.

BXP M 51281 A01

PAGE NO.

1

INVOICE DATE

06/28/94

PAYMENT TERMS

N 30

ACCOUNT NO.

4554882

DATE SHIPPED

06/28/94

SHIPPING WEIGHT

1

MAILING ADDRESS:



INLAND POLLUTION SERVICES INC  
935-939 FAIRMONT AVE  
ELIZABETH, NJ 07201

SID NO.  
BXPMS1281A00

FREIGHT TERMS  
COLLECT

VIA: BUYERS TRUCK

SHIP TO:

HOOKER/RUCO  
NEW SOUTH ROAD  
HICKSVILLE, NY 11802

SHIPPING TERMS

SHIP POINT  
DEEPWATER NJ  
SHIP FROM: DEEPWATER NJ

QUANTITY	UNIT	PRODUCT AND DESCRIPTION	UNIT PRICE	AMOUNT
1.00	EACH	1 TKT 2926 TREATMENT CHARGE TANK TRUCK IDENTIFIED ABOVE BY CONTRACT NUMBER, AND DATE HAS BEEN TREATED AND DISPOSED OF AT DUPONT'S DEEPWATER, NEW JERSEY WASTEWATER TREATMENT FACILITY.		
<p>*****</p> <p>IMPORTANT CUSTOMER NOTE: EFFECTIVE 1/1/93, FOR SCHEDULING OR ANY QUESTIONS REGARDING THIS DOCUMENT, PLEASE CALL YOUR DU PONT CUSTOMER SERVICE REP, JOANN RAMMEL TOLL-FREE AT 1-800-626-1717</p> <p>RECEIVED <u>7/12/94</u></p> <p>PRICE/COMPUTATION _____</p> <p>BILLED _____ TO BE BILLED _____</p> <p>COPY TO FILE <u>SANOX+MAC</u></p> <p>ACCOUNT <u>55900</u></p> <p>ENTERED _____</p>				
			<b>TOTAL ▶</b>	

Buyer's acceptance of the goods covered by this invoice shall constitute acceptance by the buyer of all terms and conditions of sale stated above and on the reverse side thereof.  
\* DUPONT TRADEMARK

PLEASE SEND REMITTANCE IN U.S. DOLLARS WITH INVOICE NO.(S) AND ACCOUNT NO. TO:  
DU PONT COMPANY  
P.O.BOX 65112, CHARLOTTE, NC 28265

D-U-N-S 00-495-9458

00469432 A00 525 00 0706 1 0 C2R R GB 0A



E. I. DU PONT DE NEMOURS & CO. (INC.)

WILMINGTON, DELAWARE 19898 U.S.A.

INVOICE NO.

L33 0713558

1 MM

CUSTOMER ORDER NO.

OWO4481 REL 2

DUPONT ORDER NO.

BXP M 51281 A02

PAGE NO.

1

INVOICE DATE

06/28/94

PAYMENT TERMS

N 30

ACCOUNT NO.

4554882

DATE SHIPPED

06/28/94

SHIPPING WEIGHT

1

MAILING ADDRESS:

INLAND POLLUTION SERVICES INC  
935-939 FAIRMONT AVE  
ELIZABETH, NJ 07201

SID NO.

BXPM51281A00

FREIGHT TERMS

COLLECT

VIA: BUYERS TRUCK

SHIP TO:

HOOKER/RUCO  
NEW SOUTH ROAD  
HICKSVILLE, NY 11802

SHIPPING TERMS

SHIP POINT

DEEPWATER NJ

SHIP FROM: DEEPWATER NJ

QUANTITY	UNIT	PRODUCT AND DESCRIPTION	UNIT PRICE	AMOUNT
1.00	EACH	1 TKT 2926 TREATMENT CHARGE TANK TRUCK IDENTIFIED ABOVE BY CONTRACT NUMBER, AND DATE HAS BEEN TREATED AND DISPOSED OF AT DUPONT'S DEEPWATER, NEW JERSEY WASTEWATER TREATMENT FACILITY.		
		***** IMPORTANT CUSTOMER NOTE: EFFECTIVE 1/1/93, FOR SCHEDULING OR ANY QUESTIONS REGARDING THIS DOCUMENT, PLEASE CALL YOUR DU PONT CUSTOMER SERVICE REP, JOANN RAMMEL TOLL-FREE AT 1-800-626-1717 *****		
			RECEIVED	7/13/94
			PRICE/COMPUTATION	
			BILLED	TO BE BILLED
			COPY TO FILE	MAC & SANDY
			ACCOUNT	55900
			ENTERED	
			APPROVED	
			<b>TOTAL</b>	

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D-U-N-S 00-495-9458

00469432 A00 525 00 0706 1 0 C2R R GB OA

E. I. DU PONT DE NEMOURS & CO. (INC.)

WILMINGTON, DELAWARE 19898 U.S.A.

INVOICE NO.

L33 0713556

1 MM

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OW04481 REL 3

DUPONT ORDER NO.

BXP M 51281 A03

PAGE NO.

1

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4554882

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MAILING ADDRESS:

INLAND POLLUTION SERVICES INC  
935-939 FAIRMONT AVE  
ELIZABETH, NJ 07201

SID NO.

BXPM51281A00

FREIGHT TERMS

COLLECT

VIA: BUYERS TRUCK

SHIP TO:

HOOKER/RUCO  
NEW SOUTH ROAD  
HICKSVILLE, NY 11802

SHIPPING TERMS

SHIP POINT

DEEPWATER NJ

SHIP FROM: DEEPWATER NJ

QUANTITY	UNIT	PRODUCT AND DESCRIPTION	UNIT PRICE	AMOUNT
1.00	EACH	1 TKT 2926 TREATMENT CHARGE TANK TRUCK THE WASTEWATER IDENTIFIED ABOVE BY CONTRACT NUMBER, RELEASE NUMBER AND DATE HAS BEEN TREATED AND DISPOSED OF AT DUPONT'S DEEPWATER, NEW JERSEY WASTEWATER TREATMENT FACILITY.		
		***** IMPORTANT CUSTOMER NOTE: EFFECTIVE 1/1/93, FOR SCHEDULING OR ANY QUESTIONS REGARDING THIS DOCUMENT, PLEASE CALL YOUR DU PONT CUSTOMER SERVICE REP, JOANN RAMMEL TOLL-FREE AT 1-800-626-1717 *****		
		RECEIVED <u>7/12/94</u>		
		PRICE/COMPUTATION _____		
		BILLED _____ TO BE BILLED _____		
		COPY TO FILE _____		
		ACCOUNT _____		
		ENTERED _____		
		APPROVED _____		
			<b>TOTAL ▶</b>	

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E. I. DU PONT DE NEMOURS & CO. (INC.)

WILMINGTON, DELAWARE 19898 U.S.A.

INVOICE NO.

L33 0713554

1 MM

CUSTOMER ORDER NO.

OW04481 REL 4

DUPONT ORDER NO.

BXP M 51281 A04

PAGE NO.

1

INVOICE DATE

06/28/94

PAYMENT TERMS

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ACCOUNT NO.

4554882

DATE SHIPPED

06/28/94

SHIPPING WEIGHT

1

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INLAND POLLUTION SERVICES INC  
935-939 FAIRMONT AVE  
ELIZABETH, NJ 07201

SID NO.  
BXP M 51281 A04

FREIGHT TERMS  
COLLECT

VIA: BUYERS TRUCK

SHIP TO:

HOOKER/RUCO  
NEW SOUTH ROAD  
HICKSVILLE, NY 11802

SHIPPING TERMS

SHIP POINT  
DEEPWATER NJ  
SHIP FROM: DEEPWATER NJ

QUANTITY	UNIT	PRODUCT AND DESCRIPTION	UNIT PRICE	AMOUNT
1.00	EACH	1 TKT 2926 TREATMENT CHARGE TANK TRUCK IDENTIFIED ABOVE BY CONTRACT NUMBER, AND DATE HAS BEEN TREATED AND DISPOSED OF AT DUPONT'S DEEPWATER, NEW JERSEY WASTEWATER TREATMENT FACILITY.		
		<p>*****</p> <p>IMPORTANT CUSTOMER NOTE: EFFECTIVE 1/1/93, FOR SCHEDULING OR ANY QUESTIONS REGARDING THIS DOCUMENT, PLEASE CALL YOUR DU PONT CUSTOMER SERVICE REP, JOANN RAMMEL TOLL-FREE AT 1-800-626-1717</p> <p>*****</p>	<p><i>ACCIDENTAL NO.P.P.E</i></p> <p>RECEIVED <u>7/13/94</u></p> <p>PRICE/COMPUTATION _____</p> <p>BILLED _____ TO BE BILLED _____</p> <p>COPY TO FILE <u>MAC &amp; SANJOY</u></p> <p>ACCOUNT <u>55900</u></p> <p>ENTERED _____</p> <p>APPROVED _____</p>	
			<b>TOTAL ▶</b>	

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\* DUPONT TRADEMARK

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DU PONT COMPANY  
P.O.BOX 65112, CHARLOTTE, NC 28265

D-U-N-S 00-495-9458

00469432 A00 525 00 0706 1 0 C2R R GB 0A



STATE OF CONNECTICUT  
DEPARTMENT OF ENVIRONMENTAL PROTECTION  
LEGGETTE, BRASHEARS & GRAHAM



July 7, 1994

RECEIVED  
JUL 11 1994

Mr. William T. West, CPG  
Leggette, Brashears & Graham, Inc.  
72 Danbury Road  
Wilton, CT 06897

Ms. Debbie Russo  
Waste Management, Inc.  
182-2 Danbury Road  
New Milford, CT 06776

Re: Special Waste Disposal Authorization (one-time)  
Contaminated sand and solidified latex/43 cubic yards

Dear Mr. West:

The Waste Management Bureau has determined that the above referenced material, Application #9406020, is authorized, pursuant to Section 22a-209-8 of the Regulations of Connecticut State Agencies (RCSA), for disposal at the New Milford Landfill, subject to the following conditions:

1. Material shall not contain any free draining liquids; and
2. As suitable, the material shall be added to the working face (upon receipt) at the landfill.

This authorization is based upon the DEP's review of the sample(s) and chemical analyses submitted for soil located at Occidental Chemical Corp. (OCC), Hooker/Ruco site, Hicksville, New York generated by OCC, 360 Rainbow Blvd., S. Niagara Falls, N.Y.

Permission to dispose of this material must also be obtained from Waste Management, Inc. Please contact the disposal facility identified above for information concerning the proper disposal procedures.

It is the responsibility of the property owner/waste generator to make a hazardous waste determination for all wastes generated prior to disposal. This is a one time authorization for disposal of this material. Any future disposal requests must be submitted to this office for review.

Please contact Patricia Gray at (203) 566-4869 or Rick Renaud at (203) 566-8256 if you have any questions.

Sincerely yours,

Robert E. Moore  
Deputy Commissioner

REM:plg

NEW MILFORD LANDFILL  
 182 2 DANBURY ROAD, NEW MILFORD CT  
 203-350-2222 203-350-2302

# 109602  
 DATE: 07/21/94  
 TIME: 11:06-11:32

SHIPPER: 669  
 OCCIDENTAL CHEMICAL

HAULER:  
 TRUCK: 799 WASTE: SP1 GENERAL SPECIAL WAS

OPER: DEB  
 MANIFEST: Y

ORIGIN  
 NEW YORK

PCT WEIGHT  
 100 17.25

GROSS: 38.91 TNS  
 TARE: 21.66 TNS  
 NET: 17.25 TNS

02669 REMARKS  
 OLD WASTE TRANSPORTER DECLARATION. To the best of my knowledge this truck  
 contains no hazardous or unacceptable waste.

SIGN

*Joseph E. Meyer*


PLACARDS TENDERED: YES  NO

REMIT  
 C.O.D. TO:  
 ADDRESS

COD Amt: \$

COU REC.  
 PREPAID   
 COLLECT

Where the rate is dependent on value, shipper agrees to state specifically in writing the agreed or declared value of the property.

I hereby declare that the contents of this consignment are fully and accurately described above by proper shipping name and are classified, marked, packed and labeled and are in proper condition for shipment by  Air  Highway  Water (DELETE NON APPLICABLE MODE OF TRANSPORT) according to applicable international and domestic governmental regulations.

Subject to Section 1 of the conditions of the contract, if the shipment is not delivered to the consignee without recourse on the consignor, the consignor shall sign the following statement:

TOTAL CHARGES \$

The carrier shall not make delivery of this shipment without payment of freight and all other lawful charges.

FREIGHT CHARGES  
 THE CARRIER'S LIABILITY FOR LOSS OR DAMAGE TO THE GOODS IS LIMITED TO THE AMOUNT OF THE FREIGHT CHARGES PAID FOR THE GOODS.

SHIPPER'S DECLARATION: I hereby declare that the contents of this consignment are fully and accurately described above by proper shipping name and are classified, marked, packed and labeled and are in proper condition for shipment by  Air  Highway  Water (DELETE NON APPLICABLE MODE OF TRANSPORT) according to applicable international and domestic governmental regulations.

SHIPPER'S DECLARATION: I hereby declare that the contents of this consignment are fully and accurately described above by proper shipping name and are classified, marked, packed and labeled and are in proper condition for shipment by  Air  Highway  Water (DELETE NON APPLICABLE MODE OF TRANSPORT) according to applicable international and domestic governmental regulations.

SHIPPER OCCIDENTAL CHEMICAL (HOOKER/RUCO)  
 PER *W. J. [Signature]*  
 Full street post-office address of shipper:

CARRIER BUFFALO FUEL CORP.  
 PER *Joseph E. Meyer*  
 DATE July 21, 1994

NEW MILFORD LANDFILL  
182 2 DANBURY ROAD, NEW MILFORD CT  
203-350-2222 203-350-2802

# 109601  
DATE: 07/21/94  
TIME: 11:05-11:18

IS: 669  
OCcidental CHEMICAL

H: 790  
RUCK: 790 WASTE: SP: GENERAL SPECIAL WAS

DEPT: DEB  
MANIFEST: Y

ORIGIN  
NEW YORK

PCT: WGT/VOL  
100 15.52

GRUSS: 38.85 TNS

TARE: 23.34 TNS

NET: 15.52 TNS =

*W. Green (SAC)*

REMARKS

WASTE TRANSPORTER DECLARATION: To the best of my knowledge this truck contains no hazardous or unacceptable waste.

5189

ROLL OFF BOX	SPILLED PICKED UP <i>WRB-137-25</i>	FREIGHT BILL NO. <small>(OFFICE USE ONLY)</small>	OTHER CHGS <i>Pro</i>	
COMMENTS			SALES TAX	
			TRANSPORT TAX	
			TOTAL AMOUNT	

PICK UP DELIVERY

ARRIVAL TIME: *7:00 AM* RELEASE TIME: *8:00 AM*

TRAILER EMPTY UPON ARRIVAL (If not, explain below)  YES  NO

DIP MEASUREMENT (Tanker Only) \_\_\_\_\_

COMMENTS (IF APPLICABLE, INDICATE ALL DELAYS AND/OR LOADING TIME)  
*Pick up only*

DRIVER: \_\_\_\_\_ DATE: \_\_\_\_\_

ARRIVAL TIME: \_\_\_\_\_ AM \_\_\_\_\_ PM RELEASE TIME: \_\_\_\_\_ AM \_\_\_\_\_ PM

TRAILER EMPTY UPON DEPARTURE (If not, explain below)  YES  NO

COMMENTS (IF APPLICABLE, INDICATE ALL DELAYS AND/OR LOADING TIME)

I, THE UNDERSIGNED, CERTIFY THAT THE ABOVE INFORMATION IS TRUE AND COMPLETE

I, THE UNDERSIGNED, CERTIFY THAT THE ABOVE INFORMATION IS TRUE AND COMPLETE

Signature: *W. Green*

Post-It™ brand fax transmittal memo 7671 # of pages 3

To: John McQueen From: Debbie Reas  
 Co. Co.  
 Dept: 34.36 TONS Phone #: 351-2222  
 Fax #: 918-355-5750 Fax #

NEW MILFORD LANDFILL  
 182 2 DANBURY ROAD, NEW MILFORD CT  
 203-350-2222 203-350-2502

# 109687  
 DATE: 07/22/94  
 TIME: 06:57-07:22

ORDER: 669  
 OCCIDENTAL CHEMICAL

ORDER: DEB  
 MANIFEST: Y  
 TRUCK: 799 WASTE: SP1 GENERAL SPECIAL WAS

ORIGIN  
 NEW YORK

PCT WGT/HR  
 100 6.59

GROSS: 27.87 TNS

TARE: 21.20 TNS

NET: 6.59 TNS =

SIGN *[Signature]*

REMARKS  
 WASTE TRANSPORTER DECLARATION: To the best of my knowledge this truck contains no hazardous or unacceptable waste.


PLACARDS TENDERED: YES  NO

REMIT  
 C.O.D. TO  
 ADDRESSES

COD

AMT. \$

COD + CC  
 PREPAID  
 COLLECT \$

Note: Where the rate is dependent on value, shippers are required to state specifically in writing the agreed or declared value of the property.

The agreed or declared value of the property is hereby specifically stated by the shipper to be \$100,000.00.

I hereby declare that the contents of this consignment are fully and accurately described above by their shipping marks and are classified, packed, marked and labeled, and are in all respects in proper condition for transport by Surface Highway, B. Water (EXCEPT NON-APPLICABLE MODE OF TRANSPORT according to applicable international and national governmental regulations).

Subject to section 7 of the conditions of the agreement to be delivered to the consignee without recourse to the consignor, the consignor shall sign the following statement:

The carrier shall not be liable for the shipment without payment of freight and any other charges due.

TOTAL CHARGES \$

FREIGHT CHARGES

PREPAID  COLLECT

RECEIVED: Shipper's, the consignor's and the carrier's liability shall terminate on the date of the issue of the bill of lading, the property described above is required to be received in accordance with the condition of contents of packages, markings, labels, and treatment as indicated above which said carrier, the carrier's liability is hereby understood through this contract as being the property of the consignee at the time of delivery of the property under the contract, and the carrier shall not be liable for any loss or damage to the property at any time after the date of delivery of the property to the consignee.

SHIPPER'S LIABILITY: The carrier shall not be liable for the shipment without payment of freight and any other charges due. The carrier shall not be liable for the shipment without payment of freight and any other charges due.

SHIPPER OCCIDENTAL CHEMICAL (Hazardous)

CARRIER (Hazardous) (Hazardous)

PER *[Signature]*

DATE *[Signature]* 2



**Garden State**  
**SCRAP METAL &**  
**SALVAGE CORP.**

33 Rodgers Street, Avenel, NJ 07001  
(908) 499-9575 / Fax: (908) 499-9774

Inland Pollution Services  
Attn: John P. McCune  
936-939 Fairmount Avenue  
Elizabeth, N.J. 07201

July 19, 1994

Dear Mr. McCune:

Please be advised that the three (3) 20,000 gallon scrap steel storage tanks picked-up from Ruco Polymer Corporation in Hicksville, New York were processed for recycling purposes only at our Avenel facility on July 6, 1994. If you have any questions, please feel free to call me at the office.

Thank you,

Vincent T. Gatto  
Office Manager



**APPENDIX II**

QUALITY ASSURANCE/QUALITY CONTROL DATA REVIEW  
LATEX TANK REMOVAL  
OCCIDENTAL CHEMICAL CORPORATION  
HICKSVILLE, NEW YORK  
JUNE 1994

PRINTED ON

OCT 7 1994

## TABLE OF CONTENTS

	<u>Page</u>
1.0 EXECUTIVE SUMMARY.....	1
2.0 INTRODUCTION.....	3
3.0 QUALITY ASSURANCE/QUALITY CONTROL REVIEW.....	4
3.1 HOLDING TIME.....	4
3.2 GC/MS CALIBRATION - VOLATILES AND SEMI-VOLATILES.....	4
3.3 GC CALIBRATION - PESTICIDES/PCBS.....	6
3.4 SURROGATE ANALYSES.....	7
3.5 INTERNAL STANDARDS ANALYSIS VOLATILES AND SEMI-VOLATILES.....	7
3.6 MATRIX SPIKE/MATRIX SPIKE DUPLICATE ANALYSES.....	8
3.7 METHOD BLANK ANALYSES.....	8
3.8 FIELD DUPLICATE ANALYSES.....	9
4.0 CONCLUSION.....	10

LIST OF TABLES  
(Following Report)

TABLE 1	ANALYTICAL DATA SUMMARY
TABLE 2	HOLDING TIME SUMMARY
TABLE 3	SUMMARY OF SURROGATE RECOVERIES
TABLE 4	SUMMARY MATRIX SPIKE/MATRIX SPIKE DUPLICATE ANALYSES RESULTS
TABLE 5	METHOD BLANK ANALYSES RESULTS
TABLE 6	FIELD DUPLICATE RESULTS COMPARISON

## 1.0 EXECUTIVE SUMMARY

In support of the Latex Tank Removal Program at the Hooker/Ruco Facility in Hicksville, New York, three soil samples were collected in June 1994. The samples included one field duplicate sample, and all were analyzed for target compound list (TCL) volatile, semi-volatile, and pesticide/PCB compounds.

### Volatiles

All results were acceptable. TCL volatiles were not detected in the samples, with the exception of low concentrations (13 µg/kg and less) of acetone, tetrachloroethene and xylene.

### Semi-volatiles

All results were acceptable. Some phthalate concentrations were qualified as non-detect based on their detection in the method blank or variability in continuing calibration standard analyses. Some phenolic compound recoveries were qualified as estimated based on high spike recoveries.

Some semi-volatile compounds were detected in the samples. Compound concentrations were 280 µg/kg and lower, with the exception of bis(2-Ethylhexyl)phthalate, which was present in two samples at 2700 µg/kg.

### Pesticides/PCBs

All sample results were acceptable. Some PCB data were qualified as estimated based on variability in field duplicate results. Generally, pesticide data were non-detect; positive results ranged from 5.9 to 7.1 µg/kg. PCB results were non-detect with the exception of PCB-1248

concentrations ranging from 30 to 40  $\mu\text{g}/\text{kg}$ , and PCB-1254 concentrations ranging from 86 to 750  $\mu\text{g}/\text{kg}$ .

## 2.0 INTRODUCTION

Three soil samples (including one field duplicate) were collected at the Hooker/Ruco Facility in Hicksville, New York, in support of the Latex Tank Removal Program. Samples were collected by Leggette, Brashears and Graham, Inc. (LB&G) on June 30, 1994. Samples were analyzed for TCL volatiles, semi-volatiles and pesticides/PCBs. Sample analyses were performed by IEA Laboratories using methodology referenced from USEPA - Contract Laboratory Protocol (CLP) Statement of Work (SOW) for "Organic Analyses, Multi-Media, Multi-Concentration", March 1990, (OLM0.10), including all revisions.

A summary of the analytical data is provided in Table 1. The quality assurance/quality control (QA/QC) criteria by which these data have been assessed are outlined in the above methods and the following documents:

- i) "National Functional Guidelines for Organic Data Review", Multi-Media, Multi-Concentration (OLM0.10), 12/90 (Rev. 6/91) ; and
- ii) Quality Assurance Project Plan (QAPP), Section 4 of Occidental Chemical Corporation Hooker/Ruco Site, Hicksville, New York, "Tank Removal Work Plan", April 1993.

The sample IDs used on the Chain of Custody documents and analytical reports equate to the following IDs used herein:

S511SE1002	South Sample
S512SE2001	Duplicate of South Sample
S513NE1001	North Sample

### 3.0 QUALITY ASSURANCE/QUALITY CONTROL REVIEW

#### 3.1 HOLDING TIME

In accordance with CLP 1990 SOW, holding time criteria were as follows for soil samples:

<i>Parameter</i>	<i>Holding Time Criteria</i>	
	<i>to Extraction (Days)</i>	<i>to Analysis (Days)</i>
Volatiles	-	10 (1)
Semi-Volatiles and Pesticides/PCBs	10 (1)	40

Notes:

- (1) Holding time from verified time of sample receipt (VTSR).

A summary of sample holding time data is presented in Table 2. All samples were extracted and/or analyzed within the above holding times.

#### 3.2 GC/MS CALIBRATION - VOLATILES AND SEMI-VOLATILES

##### Tuning Requirements

The proper tuning compounds were analyzed at the required frequency. All ion abundance criteria were met.

##### Initial Calibration

Initial calibration of the GC/MS for volatiles and semi-volatiles analysis were performed as specified in CLP 1990 SOW. All average relative response (RRFs) indicated acceptable instrument sensitivity.



For the volatiles calibration, all percent relative standard deviation (%RSD) values were less than 30 percent, with the exception of acetone (36 percent). All positive sample results for acetone were qualified as estimated based on possible non-linearity of the calibration curve.

For the semi-volatiles calibration, all %RSD values were acceptable, with the exception of 3-nitroaniline (30 percent). Positive sample results for this compound were qualified as estimated.

### Continuing Calibration

Continuing calibration standards were analyzed as required and all RRF values were acceptable.

For the volatiles continuing calibration standards, all percent difference (%D) values were acceptable, with the exceptions of chloromethane and tetrachloroethene. Positive sample results for these compounds were qualified as estimated. Non-detect results were not quantified using the continuing calibration, and since acceptable RRF values were reported for these compounds, qualification was not necessary.

For the semi-volatile continuing calibration standards, all %D values showed acceptable linearity, with the following exceptions: 4-chloroaniline, hexachlorocyclopentadiene, 3-nitroaniline, 2,4-dinitrophenol, 4-nitroaniline, n-nitrosodiphenylamine, carbazole, pyrene, butylphthalate, 3,3-dichlorobenzidene, and di-n-octylphthalate. Most of these compounds were not detected in the samples and the outlying calibration data had no impact. Positive sample results reported for pyrene and di-n-octylphthalate were qualified as estimated.

### 3.3 GC CALIBRATION - PESTICIDES/PCBS

#### Resolution Check Standard Analysis

Resolution check standards were analyzed as required and showed acceptable peak resolution.

#### Performance Evaluation Mixture (PEM) Analysis

PEM standards were analyzed at the proper frequency. All PEM analyses met the peak resolution, retention time, analyte recovery and pesticide breakdown requirements.

#### Initial Calibration

Initial calibration standards were analyzed at the required concentrations and frequencies. All peak resolution and linearity specified in CLP 1990 SOW were satisfied. Initial calibration blanks were analyzed and all compounds of interest were reported non-detect.

#### Continuing Calibration

Continuing calibration standards were analyzed at the proper frequency. All peak resolution and linearity criteria specified in CLP 1990 SOW were satisfied. Continuing calibration blanks were analyzed at the proper frequency and all blank results were non-detect.

PCBs were detected in the samples. In accordance with CLP 1990 SOW, a standard for each PCB identified must be analyzed within 72 hours of the sample analysis to confirm the identification. PCB standard analysis for one of the GC columns (DB-1701) exceeded this time period. The analysis of these samples on the second column met the method

requirements, and sample identification was judged to be acceptable on this basis.

#### 3.4 SURROGATE ANALYSES

The proper surrogate compounds were added to all samples prior to extraction and/or analysis. Surrogate recoveries are summarized in Table 3.

All volatile surrogate recoveries were acceptable. All semi-volatile surrogate recoveries were acceptable, with the exception of one slightly high surrogate recovery for the South Sample duplicate. Sample data were not qualified, as one outlying surrogate per analysis fraction (base-neutral, or acid) is acceptable.

Low decachlorobiphenyl (DCB) recoveries were reported on GC column RTX-35 for all sample and method blank analyses. Although acceptable, DCB recoveries reported for column DB-1701 were also on the low side. DCB results for instrument blanks and PEM standards were outlying (low) on both columns. It was determined by IEA that the concentration of the DCB standard added to all of the above was low in comparison to the DCB concentration in the Individual A and B mixes, and since Individual mix A is used to quantitate surrogate recoveries, the recoveries seemed erroneously low. Based on acceptable recoveries reported for the other surrogate compound (tetrachloro-meta-xylene), sample results were not qualified.

#### 3.5 INTERNAL STANDARDS ANALYSIS VOLATILES AND SEMI-VOLATILES

The proper internal standard (IS) compounds were added to all samples and blanks prior to analysis. All IS recoveries were acceptable.

### 3.6 MATRIX SPIKE/MATRIX SPIKE DUPLICATE ANALYSES

Matrix spike/matrix spike duplicate (MS/MSD) analyses were performed on the South Sample for all parameters. A summary of the results is presented in Table 4.

The volatiles MS/MSD results showed acceptable accuracy and precision.

All semi-volatiles spiking compounds yielded acceptable recoveries, with the exception of high recoveries reported for phenol and 4-nitrophenol. As these results could indicate a high bias, all positive sample results for these compounds were qualified as estimated. RPD values reported for the semi-volatile MS/MSD analysis showed good analytical precision.

MS/MSD samples for pesticide/PCB analysis were spiked with PCB-1260. Although the CLP 1990 SOW specifies pesticide spiking compounds, the PCB MS/MSD analysis was used to assess analytical accuracy and precision.

The South Sample contained 430 µg/kg PCB-1254; which has some peaks that coelute with peaks from the spiking compound PCB-1260. To accurately measure the PCB-1260 concentration in the sample, quantification was performed based on late-eluting peaks from PCB-1260 which are not present in PCB-1254. The resulting spike recoveries were acceptable. The RPD value showed variability in the analytical results, but all sample PCB-1260 results were non-detect and did not require qualification.

### 3.7 METHOD BLANK ANALYSES

Method blanks were extracted and/or analyzed as required for all parameters. A summary of the results is presented in Table 5.

No compounds of interest were detected in the method blanks, with the exception of *c.*-*n*-butylphthalate and bis(2-ethylhexyl)phthalate. Both phthalates are common laboratory artifacts and all sample results up to ten times the levels detected in the blanks were qualified as non-detect.

### 3.8 FIELD DUPLICATE ANALYSES

A duplicate of the South Sample was collected and submitted "blind" to the laboratory. A comparison of the analytical results is presented in Table 6.

Generally, analytical and sampling precision were acceptable based on RPD values. Some polynuclear aromatic hydrocarbons (PNAs) yielded high RPD values, but since the values were below the method detection limits and reported as estimated, further qualification was not necessary.

A high RPD value was reported for the analysis of PCB 1254, which may be an indication of analytical or sampling variability. Sample results for PCB 1254 were qualified as estimated.

4.0 CONCLUSION

Based on the preceding QA/QC review, these data were judged acceptable with the qualifications noted herein.

TABLE 1  
 ANALYTICAL DATA SUMMARY  
 LATEX TANK REMOVAL  
 HICKSVILLE, NEW YORK  
 JULY 1994

<i>Parameter</i>	<i>Sample ID</i>	<i>South Sample</i>	<i>South Sample Duplicate</i>	<i>North Sample</i>
<i>TCL Volatiles (µg/kg)</i>				
Chloromethane		ND 10	ND 11	ND 13
Bromomethane		ND 10	ND 11	ND 13
Vinyl chloride		ND 10	ND 11	ND 13
Chloroethane		ND 10	ND 11	ND 13
Methylene chloride		ND 10	ND 11	ND 13
Acetone		11J	12J	13J
Carbon disulfide		ND 10	ND 11	ND 13
1,1-Dichloroethene		ND 10	ND 11	ND 13
1,1-Dichloroethane		ND 10	ND 11	ND 13
1,2-Dichloroethene (total)		ND 10	ND 11	ND 13
Chloroform		ND 10	ND 11	ND 13
1,2-Dichloroethane		ND 10	ND 11	ND 13
2-Butanone		ND 10	ND 11	ND 13
1,1,1-Trichloroethane		ND 10	ND 11	ND 13
Carbon tetrachloride		ND 10	ND 11	ND 13
Bromodichloromethane		ND 10	ND 11	ND 13
1,2-Dichloropropene		ND 10	ND 11	ND 13
cis-1,3-Dichloropropene		ND 10	ND 11	ND 13
Trichloroethene		ND 10	ND 11	ND 13
Dibromochloromethane		ND 10	ND 11	ND 13
1,1,2-Trichloroethene		ND 10	ND 11	ND 13
Benzene		ND 10	ND 11	ND 13
trans-1,3-Dichloropropene		ND 10	ND 11	ND 13
Bromoform		ND 10	ND 11	ND 13
4-Methyl-2-pentanone		ND 10	ND 11	ND 13
2-Hexanone		ND 10	ND 11	ND 13
Tetrachloroethene		7J	ND 11	10J
1,1,2,2-Tetrachloroethane		ND 10	ND 11	ND 13
Toluene		ND 10	ND 11	ND 13
Chlorobenzene		ND 10	ND 11	ND 13
Ethylbenzene		ND 10	ND 11	ND 13
Styrene		ND 10	ND 11	ND 13
Xylene (total)		3J	ND 11	ND 13

TABLE 1  
ANALYTICAL DATA SUMMARY  
LATEX TANK REMOVAL  
HICKSVILLE, NEW YORK  
JULY 1994

Parameter	Sample ID	South Sample	South Sample Duplicate	North Sample
<i>TCL Semi-Volatiles (µg/kg)</i>				
Phenol	ND 350	ND 350	200J	ND 420
bis(2-Chloroethyl)ether	ND 350	ND 350	ND 350	ND 420
2-Chlorophenol	ND 350	ND 350	ND 350	ND 420
1,3-Dichlorobenzene	ND 350	ND 350	ND 350	ND 420
1,4-Dichlorobenzene	ND 350	ND 350	ND 350	ND 420
1,2-Dichlorobenzene	ND 350	ND 350	ND 350	ND 420
2-Methylphenol	ND 350	ND 350	ND 350	ND 420
2,2'-oxybis(1-Chloropropane)	ND 350	ND 350	ND 350	ND 420
4-Methylphenol	ND 350	ND 350	ND 350	ND 420
N-Nitroso-di-n-propylamine	ND 350	ND 350	ND 350	ND 420
Hexachloroethane	ND 350	ND 350	ND 350	ND 420
Nitrobenzene	ND 350	ND 350	ND 350	ND 420
Isophorone	ND 350	ND 350	ND 350	ND 420
2-Nitrophenol	ND 350	ND 350	ND 350	ND 420
2,4-Dimethylphenol	ND 350	ND 350	ND 350	ND 420
bis(2-Chloroethoxy)methane	ND 350	ND 350	ND 350	ND 420
2,4-Dichlorophenol	ND 350	ND 350	ND 350	ND 420
1,2,4-Trichlorobenzene	ND 350	ND 350	ND 350	ND 420
Naphthalene	ND 350	ND 350	ND 350	ND 420
4-Chloroaniline	ND 350	ND 350	ND 350	ND 420
Hexachlorobutadiene	ND 350	ND 350	ND 350	ND 420
4-Chloro-3-methylphenol	ND 350	ND 350	ND 350	ND 420
2-Methylnaphthalene	ND 350	ND 350	ND 350	ND 420
Hexachlorocyclopentadiene	ND 350	ND 350	ND 350	ND 420
2,4,6-Trichlorophenol	ND 350	ND 350	ND 350	ND 420
2,4,5-Trichlorophenol	ND 860	ND 860	ND 860	ND 1000
2-Chloronaphthalene	ND 330	ND 330	ND 350	ND 420
2-Nitroaniline	ND 860	ND 860	ND 860	ND 1000
Dimethylphthalate	28J	28J	ND 350	ND 420
Acenaphthylene	ND 350	ND 350	ND 350	ND 420
2,6-Dinitrotoluene	ND 350	ND 350	ND 350	ND 420
3-Nitroaniline	ND 860	ND 860	ND 860	ND 1000
Acenaphthene	19J	19J	ND 350	ND 420
2,4-Dinitrophenol	ND 860	ND 860	ND 860	ND 1000
4-Nitrophenol	ND 860	ND 860	ND 860	ND 1000
Dibenzofuran	11J	11J	ND 350	ND 420
2,4-Dinitrotoluene	ND 350	ND 350	ND 350	ND 420
Diethylphthalate	15J	15J	ND 350	ND 420
4-Chlorophenyl-phenylether	ND 350	ND 350	ND 350	ND 420
Fluorene	17J	17J	ND 350	ND 420
4-Nitroaniline	ND 860	ND 860	ND 860	ND 1000



TABLE 1  
ANALYTICAL DATA SUMMARY  
LATEX TANK REMOVAL  
HICKSVILLE, NEW YORK  
JULY 1994

Parameter	Sample ID	South Sample	South Sample Duplicate	North Sample
<i>TCL Semi-Volatiles (µg/kg) (cont'd)</i>				
4,6-Dinitro-2-methylphenol		ND 860	ND 860	ND 1000
N-Nitrosodiphenylamine		ND 350	ND 350	ND 420
4-Bromophenyl-phenylether		ND 350	ND 350	ND 420
Hexachlorobenzene		ND 350	ND 350	ND 420
Pentachlorophenol		ND 860	ND 860	ND 1000
Phenanthrene		210J	21J	12J
Anthracene		41J	ND 350	ND 420
Carbazole		40J	ND 350	ND 420
Di-n-butylphthalate		ND 350	ND 350	ND 420
Fluoranthene		280J	31J	25J
Pyrene		230J	29J	23J
Butylbenzylphthalate		ND 350	ND 350	ND 420
3,3'-Dichlorobenzidine		ND 350	ND 350	ND 420
Benzo(a)anthracene		120J	14J	11J
Chrysene		140J	ND 350	ND 420
bis(2-Ethylhexyl)phthalate		2700	2700	ND 610
Di-n-octylphthalate		27J	39J	ND 420
Benzo(b)fluoranthene		91J	ND 350	14J
Benzo(k)fluoranthene		110J	ND 350	12J
Benzo(a)pyrene		110J	ND 350	ND 420
Indeno(1,2,3-cd)pyrene		51J	ND 350	ND 420
Dibenzo(a,h)anthracene		ND 350	ND 350	ND 420
Benzo(g,h,i)perylene		43J	ND 350	ND 420
<i>TCL Pesticides/PCBs (µg/kg)</i>				
alpha-BHC		ND 1.8	ND 1.8	ND 2.1
beta-BHC		ND 1.8	ND 1.8	ND 2.1
delta-BHC		ND 1.8	ND 1.8	ND 2.1
gamma-BHC		ND 1.8	ND 1.8	ND 2.1
Heptachlor		ND 1.8	ND 1.8	ND 2.1
Aldrin		ND 1.8	ND 1.8	ND 2.1
Heptachlor epoxide		ND 1.8	ND 1.8	ND 2.1
Endosulfan I		ND 1.8	ND 1.8	ND 2.1
Dieldrin		ND 3.5	ND 3.5	ND 4.1
4,4'-DDE		ND 3.5	ND 3.5	6.1
Endrin		ND 3.5	ND 3.5	ND 4.1
Endosulfan II		ND 3.5	ND 3.5	ND 4.1
4,4'-DDD		ND 3.5	ND 3.5	ND 4.1
Endosulfan sulfate		ND 3.5	ND 3.5	ND 4.1
4,4'-DDT		ND 3.5	ND 3.5	5.9
Methoxychlor		ND 18	ND 18	ND 21

TABLE 1  
ANALYTICAL DATA SUMMARY  
LATEX TANK REMOVAL  
HICKSVILLE, NEW YORK  
JULY 1994

<i>Parameter</i>	<i>Sample ID</i>	<i>South Sample</i>	<i>South Sample Duplicate</i>	<i>North Sample</i>
<i>TCL Pesticides/PCBs (µg/kg) (con't)</i>				
Endrin ketone		ND 3.5	ND 3.5	ND 2.1
Endrin aldehyde		ND 3.5	ND 3.5	ND 4.1
alpha-Chlordane		ND 1.8	ND 1.8	7.1
gamma-Chlordane		ND 1.8	ND 1.8	ND 2.1
Toxaphene		ND 180	ND 180	ND 210
PCB-1016		ND 35	ND 35	ND 41
PCB-1221		ND 72	ND 72	ND 84
PCB-1232		ND 35	ND 35	ND 41
PCB-1242		ND 35	ND 35	ND 41
PCB-1248		370D	490D	30J
PCB-1254		430DJ	750DJ	86
PCB-1260		ND 35	ND 35	ND 41

**TABLE 2**  
**HOLDING TIME SUMMARY**  
**LATEX TANK REMOVAL**  
**OCCIDENTAL CHEMICAL CORPORATION**  
**HICKSVILLE, NEW YORK**  
**JUNE 1994**

<i>Sample ID</i>	<i>Date Received (VTSR)</i>	<i>Date Extracted</i>	<i>Date Analyzed</i>	<i>Holding Time Exceedance</i>	
				<i>to Extraction (days)</i>	<i>to Analysis (days)</i>
<b><i>Volatiles</i></b>					
South Sample	6/30/94	NA	7/4/94	NA	0
South Sample Duplicate	6/30/94	NA	7/4/94	NA	0
North Sample	6/30/94	NA	7/4/94	NA	0
<b><i>Semi-volatiles</i></b>					
South Sample	6/30/94	7/1/94	7/5/94	0	0
South Sample Duplicate	6/30/94	7/1/94	7/5/94	0	0
North Sample	6/30/94	7/1/94	7/5/94	0	0
<b><i>Pesticides/PCBs</i></b>					
South Sample	6/30/94	6/30/94	7/1/94	0	0
South Sample Duplicate	6/30/94	6/30/94	7/1/94	0	0
North Sample	6/30/94	6/30/94	7/1/94	0	0

TABLE 3  
 SUMMARY OF SURROGATE RECOVERIES  
 LATEX TANK REMOVAL  
 OCCIDENTAL CHEMICAL CORPORATION  
 HICKSVILLE, NEW YORK  
 JUNE 1994

<i>Volatiles</i>								
	TOL	BFB	DCE					
South Sample	116	102	103					
South Sample Duplicate	112	104	97					
North Sample	106	105	97					
<i>Semi-volatiles</i>								
	NBZ	FBP	TPH	PHL	2FP	TBP	2CP	DCB-d4
South Sample	88	102	113	104	92	113	96	84
South Sample Duplicate	94	108	119	109	100	124*	102	90
North Sample	84	93	102	104	94	101	96	85
<i>Pesticides/PCBs</i>								
	TCX (1)	TCX (2)	DCB (1)	DCB (2)				
South Sample	108	65	57*	45*				
South Sample Duplicate	91	66	81	47*				
North Sample	106	85	79	59*				
South Sample DL	96	68	47*	46*				
South Sample Duplicate DL	98	82	87	56*				

*Surrogate Compound Key*                      *Control Limits*  
 (percent)

<i>Volatiles</i>		
TOL	Toluene-d8	84-138
BFB	Bromofluorobenzene	59-113
DCE	1,2-Dichloroethane-d4	70-121
<i>Semi-volatiles</i>		
NBZ	Nitrobenzene-d5	23-120
FBP	2-Fluorobiphenyl	30-115
TPH	Terphenyl-d14	18-137
PHL	Phenol-d5	24-113
2FP	2-Fluorophenol	25-121
TBP	2,4,6-Tribromophenol	19-122
2CP	2-Chlorophenol-d4	20-130
DCB	Dichlorobenzene-d4	20-130
<i>Pesticides/PCBs</i>		
TCX	Tetrachloro-m-xylene	60-150
DCB	Decachlorobiphenyl	60-150

Notes

- (1) Denotes GC column DB-1701
- (2) Denotes GC column RTX-35
- \* Denotes acceptance criteria failure

TABLE 4  
SUMMARY MATRIX SPIKE/MATRIX SPIKE DUPLICATE ANALYSES RESULTS  
LATEX TANK REMOVAL  
OCCIDENTAL CHEMICAL CORPORATION  
HICKSVILLE, NEW YORK  
JUNE 1994

	<i>MS (1) Recovery (percent)</i>	<i>MSD (1) Recovery (percent)</i>	<i>RPD</i>	<i>Recovery Control Limits (percent)</i>	<i>RPD Control Limit</i>
<i>Volatiles</i>					
1,1-Dichloroethene	100	102	2	59-172	22
Trichloroethene	100	104	4	62-137	24
Benzene	112	113	1	66-142	21
Toluene	110	121	10	59-139	21
Chlorobenzene	102	110	8	60-133	21
<i>Semi-volatiles</i>					
Phenol	104*	100*	4	26-90	35
2-Chlorophenol	92	85	8	25-12	50
1,4-Dichlorobenzene	78	72	8	28-104	27
N-Nitroso-di-n-propylamine	83	78	6	41-126	38
1,2,4-Trichlorobenzene	83	83	0	38-107	23
4-Chloro-3-methylphenol	96	92	4	26-103	33
Acenaphthene	93	88	6	31-137	19
4-Nitrophenol	111	115*	4	11-114	50
2,4-Dinitrotoluene	89	89	0	28-89	47
Pentachlorophenol	107	104	3	17-109	47
Pyrene	93	76	20	35-142	36
<i>Pesticides/PCBs</i>					
PCB 1260	114	79	36	50-150	25

(1) MS/MSD analysis performed on South Sample.  
\* Denotes acceptance criteria failure.

TABLE 5  
 METHOD BLANK ANALYSES RESULTS  
 LATEX TANK REMOVAL  
 OCCIDENTAL CHEMICAL CORPORATION  
 HICKSVILLE, NEW YORK  
 JUNE 1994

<i>Parameter</i>	<i>Blank ID</i> <i>Analysis Date</i>	<i>SBLKIY</i> <i>7/1/94</i>
<i>TCL Volatiles (µg/kg)</i>		
Chloromethane		ND 10
Bromomethane		ND 10
Vinyl chloride		ND 10
Chloroethane		ND 10
Methylene chloride		ND 10
Acetone		ND 10
Carbon disulfide		ND 10
1,1-Dichloroethene		ND 10
1,1-Dichloroethane		ND 10
1,2-Dichloroethene (total)		ND 10
Chloroform		ND 10
1,2-Dichloroethane		ND 10
2-Butanone		ND 10
1,1,1-Trichloroethane		ND 10
Carbon tetrachloride		ND 10
Bromodichloromethane		ND 10
1,2-Dichloropropane		ND 10
cis-1,3-Dichloropropene		ND 10
Trichloroethene		ND 10
Dibromochloromethane		ND 10
1,1,2-Trichloroethene		ND 10
Benzene		ND 10
trans-1,3-Dichloropropene		ND 10
Bromoform		ND 10
4-Methyl-2-pentanone		ND 10
2-Hexanone		ND 10
Tetrachloroethene		ND 10
1,1,2,2-Tetrachloroethane		ND 10
Toluene		ND 10
Chlorobenzene		ND 10
Ethylbenzene		ND 10
Styrene		ND 10
Xylene (total)		ND 10

TABLE 5  
 METHOD BLANK ANALYSES RESULTS  
 LATEX TANK REMOVAL  
 OCCIDENTAL CHEMICAL CORPORATION  
 HICKSVILLE, NEW YORK  
 JUNE 1994

<i>Parameter</i>	<i>Blank ID Analysis Date</i>	<i>SBLKIY 7/1/94</i>
<i>TCL Semi-Volatiles (µg/kg)</i>		
Phenol		ND 330
bis(2-Chloroethyl)ether		ND 330
2-Chlorophenol		ND 330
1,3-Dichlorobenzene		ND 330
1,4-Dichlorobenzene		ND 330
1,2-Dichlorobenzene		ND 330
2-Methylphenol		ND 330
2,2'-oxybis(1-Chloropropane)		ND 330
4-Methylphenol		ND 330
N-Nitroso-di-n-propylamine		ND 330
Hexachloroethane		ND 330
Nitrobenzene		ND 330
Isophorone		ND 330
2-Nitrophenol		ND 330
2,4-Dimethylphenol		ND 330
bis(2-Chloroethoxy)methane		ND 330
2,4-Dichlorophenol		ND 330
1,2,4-Trichlorobenzene		ND 330
Naphthalene		ND 330
4-Chloroaniline		ND 330
Hexachlorobutadiene		ND 330
4-Chloro-3-methylphenol		ND 330
2-Methylnaphthalene		ND 330
Hexachlorocyclopentadiene		ND 330
2,4,6-Trichlorophenol		ND 330
2,4,5-Trichlorophenol		ND 800
2-Chloronaphthalene		ND 330
2-Nitroaniline		ND 800
Dimethylphthalate		ND 330
Acenaphthylene		ND 330
2,6-Dinitrotoluene		ND 330
3-Nitroaniline		ND 800
Acenaphthene		ND 330

TABLE 5  
 METHOD BLANK ANALYSES RESULTS  
 LATEX TANK REMOVAL  
 OCCIDENTAL CHEMICAL CORPORATION  
 HICKSVILLE, NEW YORK  
 JUNE 1994

<i>Parameter</i>	<i>Blank ID Analysis Date</i>	<i>SBLKIY 7/1/94</i>
<i>TCL Semi-Volatiles (cont'd)</i>		
2,4-Dinitrophenol		ND 800
4-Nitrophenol		ND 800
Dibenzofuran		ND 330
2,4-Dinitrotoluene		ND 330
Diethylphthalate		ND 330
4-Chlorophenyl-phenylether		ND 330
Fluorene		ND 330
4-Nitroaniline		ND 800
4,6-Dinitro-2-methylphenol		ND 800
N-Nitrosodiphenylamine		ND 330
4-Bromophenyl-phenylether		ND 330
Hexachlorobenzene		ND 330
Pentachlorophenol		ND 800
Phenanthrene		ND 330
Anthracene		ND 330
Carbazole		ND 330
Di-n-butylphthalate		77J
Fluoranthene		ND 330
Pyrene		ND 330
Butylbenzylphthalate		ND 330
3,3'-Dichlorobenzidine		ND 330
Benzo(a)anthracene		ND 330
Chrysene		ND 330
bis(2-Ethylhexyl)phthalate		90J
Di-n-octylphthalate		ND 330
Benzo(b)fluoranthene		ND 330
Benzo(k)fluoranthene		ND 330
Benzo(a)pyrene		ND 330
Indeno(1,2,3-cd)pyrene		ND 330
Dibenzo(a,h)anthracene		ND 330
Benzo(g,h,i)perylene		ND 330



TABLE 5  
 METHOD BLANK ANALYSES RESULTS  
 LATEX TANK REMOVAL  
 OCCIDENTAL CHEMICAL CORPORATION  
 HICKSVILLE, NEW YORK  
 JUNE 1994

<i>Parameter</i>	<i>Blank ID Analysis Date</i>	<i>PBLK53 6/30/94</i>
<i>TCL Pesticides/PCB's (µg/kg)</i>		
alpha-BHC		ND 1.7
beta-BHC		ND 1.7
delta-BHC		ND 1.7
gamma-BHC		ND 1.7
Heptachlor		ND 1.7
Aldrin		ND 1.7
Heptachlor epoxide		ND 1.7
Endosulfan I		ND 1.7
Dieldrin		ND 3.3
4,4'-DDE		ND 3.3
Endrin		ND 3.3
Endosulfan II		ND 3.3
4,4'-DDD		ND 3.3
Endosulfan sulfate		ND 3.3
4,4'-DDT		ND 3.3
Methoxychlor		ND 17
Endrin ketone		ND 3.3
Endrin aldehyde		ND 3.3
alpha-Chlordane		ND 1.7
gamma-Chlordane		ND 1.7
Toxaphene		ND 170
PCB-1016		ND 33
PCB-1221		ND 67
PCB-1232		ND 33
PCB-1242		ND 33
PCB-1248		ND 33
PCB-1254		ND 33
PCB-1260		ND 33

TABLE 6  
 FIELD DUPLICATE RESULTS COMPARISON  
 LATEX TANK REMOVAL  
 HICKSVILLE, NEW YORK  
 JULY 1994

<i>Parameter</i>	<i>Sample ID</i>	<i>South Sample</i>	<i>South Sample Duplicate</i>	<i>RPD</i>
<i>TCL Volatiles (µg/kg)</i>				
Chloromethane		ND 10	ND 11	*
Bromomethane		ND 10	ND 11	*
Vinyl chloride		ND 10	ND 11	*
Chloroethane		ND 10	ND 11	*
Methylene chloride		ND 10	ND 11	*
Acetone		11	12	9
Carbon disulfide		ND 10	ND 11	*
1,1-Dichloroethene		ND 10	ND 11	*
1,1-Dichloroethane		ND 10	ND 11	*
1,2-Dichloroethene (total)		ND 10	ND 11	*
Chloroform		ND 10	ND 11	*
1,2-Dichloroethane		ND 10	ND 11	*
2-Butanone		ND 10	ND 11	*
1,1,1-Trichloroethane		ND 10	ND 11	*
Carbon tetrachloride		ND 10	ND 11	*
Bromodichloromethane		ND 10	ND 11	*
1,2-Dichloropropane		ND 10	ND 11	*
cis-1,3-Dichloropropene		ND 10	ND 11	*
Trichloroethene		ND 10	ND 11	*
Dibromochloromethane		ND 10	ND 11	*
1,1,2-Trichloroethene		ND 10	ND 11	*
Benzene		ND 10	ND 11	*
trans-1,3-Dichloropropene		ND 10	ND 11	*
Bromoform		ND 10	ND 11	*
4-Methyl-2-pentanone		ND 10	ND 11	*
2-Hexanone		ND 10	ND 11	*
Tetrachloroethene		7J	ND 11	*
1,1,2,2-Tetrachloroethane		ND 10	ND 11	*
Toluene		ND 10	ND 11	*
Chlorobenzene		ND 10	ND 11	*
Ethylbenzene		ND 10	ND 11	*
Styrene		ND 10	ND 11	*
Xylene (total)		3J	ND 11	*

TABLE 6  
FIELD DUPLICATE RESULTS COMPARISON  
LATEX TANK REMOVAL  
HICKSVILLE, NEW YORK  
JULY 1994

<i>Parameter</i>	<i>Sample ID</i>	<i>South Sample</i>	<i>South Sample Duplicate</i>	<i>RPD</i>
<i>TCL Semi-Volatiles (µg/kg)</i>				
Phenol		ND 350	200J	*
bis(2-Chloroethyl)ether		ND 350	ND 350	*
2-Chlorophenol		ND 350	ND 350	*
1,3-Dichlorobenzene		ND 350	ND 350	*
1,4-Dichlorobenzene		ND 350	ND 350	*
1,2-Dichlorobenzene		ND 350	ND 350	*
2-Methylphenol		ND 350	ND 350	*
2,2'-oxybis(1-Chloropropane)		ND 350	ND 350	*
4-Methylphenol		ND 350	ND 350	*
N-Nitroso-di-n-propylamine		ND 350	ND 350	*
Hexachloroethane		ND 350	ND 350	*
Nitrobenzene		ND 350	ND 350	*
Isophorone		ND 350	ND 350	*
2-Nitrophenol		ND 350	ND 350	*
2,4-Dimethylphenol		ND 350	ND 350	*
bis(2-Chloroethoxy)methane		ND 350	ND 350	*
2,4-Dichlorophenol		ND 350	ND 350	*
1,2,4-Trichlorobenzene		ND 350	ND 350	*
Naphthalene		ND 350	ND 350	*
4-Chloroaniline		ND 350	ND 350	*
Hexachlorobutadiene		ND 350	ND 350	*
4-Chloro-3-methylphenol		ND 350	ND 350	*
2-Methylnaphthalene		ND 350	ND 350	*
Hexachlorocyclopentadiene		ND 350	ND 350	*
2,4,6-Trichlorophenol		ND 350	ND 350	*
2,4,5-Trichlorophenol		ND 860	ND 860	*
2-Chloronaphthalene		ND 330	ND 350	*
2-Nitroaniline		ND 860	ND 860	*
Dimethylphthalate		28J	ND 350	*
Acenaphthylene		ND 350	ND 350	*
2,6-Dinitrotoluene		ND 350	ND 350	*
3-Nitroaniline		ND 860	ND 860	*
Acenaphthene		19J	ND 350	*
2,4-Dinitrophenol		ND 860	ND 860	*
4-Nitrophenol		ND 860	ND 860	*
Dibenzofuran		11J	ND 350	*
2,4-Dinitrotoluene		ND 350	ND 350	*
Diethylphthalate		15J	ND 350	*
4-Chlorophenyl-phenylether		ND 350	ND 350	*
Fluorene		17J	ND 350	*

**TABLE 6**  
**FIELD DUPLICATE RESULTS COMPARISON**  
**LATEX TANK REMOVAL**  
**HICKSVILLE, NEW YORK**  
**JULY 1994**

<i>Parameter</i>	<i>Sample ID</i>	<i>South Sample</i>	<i>South Sample Duplicate</i>	<i>RPD</i>
<i>TCL Semi-Volatiles (µg/kg) (con't)</i>				
4-Nitroaniline		ND 860	ND 860	*
4,6-Dinitro-2-methylphenol		ND 860	ND 860	*
N-Nitrosodiphenylamine		ND 350	ND 350	*
4-Bromophenyl-phenylether		ND 350	ND 350	*
Hexachlorobenzene		ND 350	ND 350	*
Pentachlorophenol		ND 860	ND 860	*
Phenanthrene		210J	21J	164
Anthracene		41J	ND 350	*
Carbazole		40J	ND 350	*
Di-n-butylphthalate		ND 350	ND 350	*
Fluoranthene		280J	31J	160
Pyrene		230J	29J	155
Butylbenzylphthalate		ND 350	ND 350	*
3,3'-Dichlorobenzidine		ND 350	ND 350	*
Benzo(a)anthracene		120J	14J	16
Chrysene		140J	ND 350	*
bis(2-Ethylhexyl)phthalate		2700	2700	0
Di-n-octylphthalate		27J	39J	36
Benzo(b)fluoranthene		91J	ND 350	*
Benzo(k)fluoranthene		110J	ND 350	*
Benzo(a)pyrene		110J	ND 350	*
Indeno(1,2,3-cd)pyrene		51J	ND 350	*
Dibenzo(a,h)anthracene		ND 350	ND 350	*
Benzo(g,h,i)perylene		43J	ND 350	*
<i>TCL Pesticides/PCBs (µg/kg)</i>				
alpha-BHC		ND 1.8	ND 1.8	*
beta-BHC		ND 1.8	ND 1.8	*
delta-BHC		ND 1.8	ND 1.8	*
gamma-BHC		ND 1.8	ND 1.8	*
Heptachlor		ND 1.8	ND 1.8	*
Aldrin		ND 1.8	ND 1.8	*
Heptachlor epoxide		ND 1.8	ND 1.8	*
Endosulfan I		ND 1.8	ND 1.8	*
Dieldrin		ND 3.5	ND 3.5	*
4,4'-DDE		ND 3.5	ND 3.5	*
Endrin		ND 3.5	ND 3.5	*
Endosulfan II		ND 3.5	ND 3.5	*
4,4'-DDD		ND 3.5	ND 3.5	*
Endosulfan sulfate		ND 3.5	ND 3.5	*

TABLE 6  
 FIELD DUPLICATE RESULTS COMPARISON  
 LATEX TANK REMOVAL  
 HICKSVILLE, NEW YORK  
 JULY 1994

<i>Parameter</i>	<i>Sample ID</i>	<i>South Sample</i>	<i>South Sample Duplicate</i>	<i>RPD</i>
<i>TCL Pesticides/PCBs (µg/kg) (con't)</i>				
4,4'-DDT		ND 3.5	ND 3.5	*
Methoxychlor		ND 18	ND 18	*
Endrin ketone		ND 3.5	ND 3.5	*
Endrin aldehyde		ND 3.5	ND 3.5	*
alpha-Chlordane		ND 1.8	ND 1.8	*
gamma-Chlordane		ND 1.8	ND 1.8	*
Toxaphene		ND 180	ND 180	*
PCB-1016		ND 35	ND 35	*
PCB-1221		ND 72	ND 72	*
PCB-1232		ND 35	ND 35	*
PCB-1242		ND 35	ND 35	*
PCB-1248		370D	490D	28
PCB-1254		430DJ	750DJ	54
PCB-1260		ND 35	ND 35	*

## Notes:

\* RPD could not be calculated due to one or more non-detect results.

APPENDIX A

CHAIN OF CUSTODY DOCUMENTS

OB #: 3094-0619

VT: TREA-TEK/CRA COMPANY

ECT ID: HICKSVILLE, NY

PROJECT MGR: MARY MCCANN

SH:  YES  NO DUE DATE 7/5/94

NO-TAL+ PEST-TAL		VOL-TAL+		VOL-TAL		NO-TAL+ PEST-TAL		VOL-TAL+		VOL-TAL		NO-TAL+ PEST-TAL		VOL-TAL+		VOL-TAL		NO-TAL+ PEST-TAL		VOL-TAL+		VOL-TAL	
GL250		SEPT60		SEPT60		GL1000		VOL100															
Y/N		Y/N		Y/N		Y/N		Y/N		Y/N		Y/N		Y/N		Y/N		Y/N		Y/N		Y/N	
5511SE1002	6/30 1204	B	001	Y	2	2	4																MS, MSD
5512SE2001	6/30 1204	B	002	N	2	2																	
5513NE1001	6/30 1210	B	003	N	2	2																	
		B		N	2	2																	
		B		N	2	2																	
		B		N	2	2																	
		B		N	2	2																	
BLANK		AQ		N				3	3														004
BLANK		TB		N					3														

- S - SOIL
- SL - SLUDGE
- W - WIPE
- O - OTHER
- FB - FIELD BLANK
- TB - TRIP BLANK

BOTTLES PREP BY: EN JOHNSON  
 SIGNATURE: *[Signature]*  
 DATE / TIME: 6/28/94 1400

BOTTLES RECD BY: Robert Laganica  
 SIGNATURE: *[Signature]*  
 DATE / TIME: 6/30/94 1724

SAMPLES COLLECTED BY: *[Signature]*  
 SIGNATURE: *[Signature]*  
 DATE / TIME: 6/30 1724

RECEIVED IN LAB BY: EN JOHNSON  
 SIGNATURE: *[Signature]*  
 DATE / TIME: 6/30/94 1750

REMARKS ON SAMPLE RECEIPT

BOTTLES INTACT  CUSTODY SEALS

PRESERVED  SEALS INTACT

CHILLED  SEE REMARKS

ST. PAUL  
MINNESOTA

WILTON  
CONNECTICUT

TAMPA  
FLORIDA

MADISON  
WISCONSIN

NASHUA  
NEW HAMPSHIRE

AUSTIN  
TEXAS

RAMSEY  
NEW JERSEY

HOUSTON  
TEXAS

EXTON  
PENNSYLVANIA

FISHKILL  
NEW YORK

SIOUX FALLS  
SOUTH DAKOTA