

WEGMANS FOOD MARKETDS, Inc.

601 Amherst Street

SOIL & GROUNDWATER SAMPLING REPORT

9-8-95

Report

Wegmans Food Markets, Inc.

601 Amherst Street
Soil and Groundwater Sampling Report

September 8, 1995

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ENVIRONMENTAL CONSERVATION
REGION 9

April 28, 1995

PRIVILEGED & CONFIDENTIAL

Ms. Mary M. McCabe
Environmental Compliance Manager
and Staff Attorney
Wegmans Food Markets, Inc.
1500 Brooks Avenue
P.O. Box 844
Rochester, NY 14692-0844

Re: Wegmans Food Markets, Inc.
601 Amherst Street
Additional Site Characterization

File: 245.02

Dear Ms. McCabe:

Seeler Associates is pleased to submit this report for the additional site characterization activities completed at 601 Amherst Street in Buffalo, New York. The objective of this investigation was to further delineate the extent of soil and groundwater contamination found on site during the Phase I Site Investigation and presented in the report entitled "Report for Wegmans Food Markets, Inc., Phase I Environmental Site Investigation, 601 Amherst Street," dated March 6, 1995. The additional characterization investigation focused on two areas of the property; the south side, or rear of the property, and the interior of the main manufacturing building, north of the building's basement.

INTRODUCTION

The "Report for Wegmans Food Markets, Inc., Phase I Environmental Site Investigation, 601 Amherst Street," dated March 6, 1995, prepared by Seeler Associates included analytical results for soil and groundwater samples. The analytical results indicated that petroleum related compounds and acetone were present in both the soil and groundwater. The contaminants were found at sampling locations immediately adjacent to the main manufacturing building (main building), inside the main building, and adjacent to the south side of the Meyers Auto and Truck building, a small abandoned building west of the main building.

Groundwater elevation data also suggested that the direction of groundwater flow is generally to the southeast, and to some extent controlled by the building's basement which has an active foundation drain and sump pump system. The limited groundwater data suggests that pumping from the foundation drain system may have restricted contaminant migration in groundwater. An equally plausible conclusion from the groundwater data is that the groundwater is not continuous

across the site, but exists only as small pools within the overburden. The data suggested that contaminants have been distributed as a result of releases resulting from the transfer, storage, and use of production chemicals. This additional site characterization was designed to identify contaminant source areas and to further define the limits of contamination.

METHODS

The field sampling effort was divided into two parts; sampling outside and inside the main building. Figure 1 shows the sampling locations. An analysis of aerial photography and the Phase 1 sample results indicated that the following areas warranted further investigation:

Sample Locations Outside the Main Building

- Locations on the south and west sides of the building where acetone and petroleum residuals were been found in soil and/or groundwater; and
- Areas used for outside storage, as determined from historical aerial photographs, in particular those areas located along the south property line.

Sample Locations Inside the Main Building

- Areas north of the main building's basement to possibly define the origin of acetone.

Sampling Methods Outside the Main Building

Outside the main building, groundwater and soil samples were collected using a geoprobe sampling tool on a 100 foot grid system. The sampling grid and sampling locations are shown in Figure 1. At the beginning of the investigation the top of the groundwater zone was defined by the measuring of water levels in two of the existing monitoring wells; MW-1 and MW-2, see Figure 2. In general, groundwater was not encountered, with the exception of one sample location, WS -1 located east of the main building's southeast corner. In accordance with our proposal, soil samples were analyzed instead of groundwater samples. Soil samples were collected from the first resistive layer encountered; typically the sampling depth was approximately 7 feet below ground surface and the soil samples consisted of silt and clay. Sampling was conducted in a step wise approach. First, sampling was completed following a 100 foot grid which follows closely to the south wall of the main building and the north side of the property's south fenceline. An analysis of historic aerial photographs show these areas as having been used for outdoor storage. Grid sample locations which coincide with Phase I sample locations were skipped to avoid duplication. Twenty three (23) locations were identified and sampled, first. Sample points were added where necessary to provide additional definition of the extent of contamination and to help define contaminant source areas. An additional 10 samples were collected as a second step.

Samples were analyzed on site using a gas chromatograph with electron capture and flame ionization detectors following modified versions of USEPA Methods 8015 and 8020. The following compounds were analyzed on site:

- acetone,
- trichloroethylene (TCE),
- perchloroethylene (PCE), and
- 1,1,1-trichloroethane (1,1,1-TCA).

The flame ionization detector, which is used for the identification of benzene, toluene, ethylbenzene, and xylene (BTEX), was determined to be malfunctioning, and as a result these compounds were not identified in the field. Samples for BTEX analysis were logged in by the on site chemist, placed on ice, and shipped at the end of each sampling day, for next day delivery to the Tracer Research laboratory in Princeton, New Jersey for analysis within the sample holding time specified by the analytical method.

Sampling Methods Inside the Main Building

Inside the main building 4 soil borings were completed; 2 soil borings, B-6 and B-7, were completed at locations west of the basement to a depth of 20 feet, and 2 soil borings, B-8 and B-9, were completed at locations north of the basement to a depth of 30 feet. Sampling locations are shown on Figure 1. Borings were drilled and sampled using hollow stem auger drilling and split barrel (standard penetration test) sampling techniques. At each soil boring location continuous soil samples were collected to the planned soil boring depth. Each soil sample was screened using an Hnu Systems PI-101 (Hnu) organic vapor analyzer for the presence of volatile organic compounds. The sample with the highest concentration of volatile organic vapors, as measured by the Hnu, was submitted to Tracer Research for analysis. One soil boring B-7 did encounter groundwater at a depth of approximately 13 feet below the concrete floor, and a sample was collected for analysis by Tracer Research. When a groundwater sample was not collected at boreholes B-6, B-8, and B-9, an additional soil sample was submitted for analysis.

SAMPLE RESULTS

Sample results will be discussed in two sections following the project's approach, geoprobe soil samples collected outside the main building and the split barrel soil samples collected from inside the building. Table 1 presents the sample results and Attachment 1 provides a copy of the logs from the soil borings. Figure 2 shows sample locations and results for both the Phase I Site Investigation and this investigation.

Outside the Main Building

A total of 33 geoprobe samples including, 32 soil samples and 1 groundwater sample were collected for analysis. Compounds measured, if present, included:

- 1,1,1-TCA,
- TCE,
- PCE,
- acetone,
- BTEX compounds, and
- total volatile hydrocarbons (TVHC), which include the volatile components of petroleum hydrocarbon compounds with the exception of BTEX compounds.

The locations of the samples are shown in Figure 1.

The most significant finding from the results is the presence of acetone in every sample with the exception of soil sample 26, located approximately 150 feet south of the main building's southeast corner. Acetone concentrations ranged from 290 micrograms per kilogram ($\mu\text{g}/\text{kg}$), at sample location SS-7, to 45,000 $\mu\text{g}/\text{kg}$ at sample location SS-11. In every instance, when acetone was detected the concentration was found above the New York State's Department of Environmental Conservation (NYSDEC) clean up objective for the protection of groundwater quality for acetone, 110 $\mu\text{g}/\text{kg}$. The cleanup objectives for the protection of groundwater quality are listed in the NYSDEC document entitled "Division of Technical and Administrative Guidance Memorandum: Determination of Soil Cleanup Objectives and Cleanup Levels, dated November 1992" (TAGM).

At sample locations SS-10, SS-11, SS-13, SS-14, SS-29, and SS-32, measurable concentrations of 1,1,1-TCA, TCE, and PCE were found, but at levels below NYSDEC TAGM concerning soil cleanup objectives for the protection of groundwater.

Benzene was the only BTEX compound found above analytical detection levels. At sample location SS-31, benzene was detected at a concentration of 100 $\mu\text{g}/\text{kg}$ and at sample location SS-3, benzene was detected at a concentration of 46 $\mu\text{g}/\text{kg}$.

The concentration of TVHC's although not fixed to a regulatory limit may also be useful for site evaluation purposes because it indicates that other volatile hydrocarbon compounds are present. In general, all of the soil samples detected TVHC's. The samples which TVHC may be the most significant because of the concentrations that were found at the following locations: SS-11 at a concentration of 20,000 $\mu\text{g}/\text{kg}$; SS-17 at a concentration of 5,500 $\mu\text{g}/\text{kg}$; and SS-30 at a concentration of 2,800 $\mu\text{g}/\text{kg}$.

The analysis of the single groundwater sample, collected from sample location WS-1, detected acetone and TVHC's at concentration above the analytical detection limits. Acetone was detected at a concentration of 1,500 $\mu\text{g}/\text{l}$ and TVHC was detected at 18 $\mu\text{g}/\text{l}$. The acetone concentration, 1,500 $\mu\text{g}/\text{l}$, is the only sample result over the NYSDEC GA groundwater quality criteria. The concentration of TVHC is not specifically regulated by NYSDEC.

Groundwater sample WS-1 also detected 1,1,1-TCA, TCE and PCE, but at concentrations below 0.04 $\mu\text{g}/\text{l}$ and below NYSDEC GA groundwater quality criteria. BTEX compounds were also detected, but at concentrations below the analytical detection limits. The BTEX compound concentrations were as follows; benzene less than 3 micrograms per liter ($\mu\text{g}/\text{l}$), toluene less than

7 µg/l, ethylbenzene less than 13 µg/l, and xylene less than 17 µg/l.

Inside the Main Building

To complete the sampling inside the main building 4 soil borings were completed. Boreholes B-6 and B-7 were advanced to a depth of 20 feet below the concrete floor, and boreholes B-8 and B-9 were advanced to a depth of 30 feet below the concrete floor. Our findings are as follows.

Soil Characterization

Split barrel soil samples collected during the advancement of the 4 soil borings indicated that soil conditions beneath the building consist of a layer of fill, which extends to a depth of approximately 7 to 11 feet below the concrete floor of the main building, and a layer of silty clay. Groundwater in sufficient quantities to collect a water sample, were found in only borehole B-7, at a depth of 13 feet below the concrete floor.

In general, the fill is composed of a black, very fine grained material which appeared to be ash or coal dust. On occasion, the ash was found mixed with small quantities of sand, brick, coal pieces, and a red brown silty clay soil. This silty clay is similar to the natural soil on site. The inclusion of the silty clay suggests that the soil was mixed with the ash during placement of the fill. The fill was dry at most locations with the exception of one sample from borehole number B-8, at a depth of 7 to 9 feet below the concrete floor. This zone of wetness may have occurred because of the natural silty clay soil directly below it. Such soil typically has a low permeability and as a result, it is not unexpected to find some water perched. In general, the fill layer was thickest in the center of the main building where the fill was estimated to be approximately 11 feet deep.

The natural soil was very consistent between each soil boring and consisted of a silty clay with varves and occasional lenses of fine gravel. The presence of varves indicates that the soil was deposited in a lake environment, but unlike most lake environments there was a noticeable absence of sand lenses. In one boring, B-7, a saturated sand lens was found at a depth of approximately 13 feet. In general, the silty clay was dry to moist. Samples found with some moisture had a slightly plastic consistency. The fill and the silty clay layers appear at a consistent levels across the site when compared to the soil boring and monitoring well data collected during the Phase 1 Site Investigation.

At each borehole location, elevated Hnu readings were observed at some point in the boring. Boreholes B-6 and B-9, Hnu readings above 50 parts per million were noted the entire length of the boring. Hnu readings, greater than 450 parts per million, were found below a depth of 15 feet at boreholes B-7 and B-8. At location B-7 and B-8 these significant readings were observed within layers having sand or gravel which possibly indicate that volatile organic compounds are present as a result of contaminated liquids passing through the sand or gravel.

Sample Results

Seven soil samples and 1 groundwater sample were collected for analysis from soil borings completed inside the main building. In general, the analytical results are similar to those reported for soil samples taken outside the building. Acetone concentrations ranged from 1,200 µg/kg at borehole number B-9, at a sample depth of 5 to 7 feet below the concrete floor, to 6,000 µg/kg at borehole number B-7 at a depth of 19 to 21 feet below the concrete floor.

The soil sample results for 1,1,1-TCA, TCE, and PCE show only trace amounts. Sample results for 1,1,1-TCA and PCE are all 1 µg/kg or less. TCE concentrations range from 0.4 µg/kg, at borehole number B-9 at a sample depth 5 to 7 feet below the concrete floor, to 9 µg/kg at borehole number B-6 at a sample depth of 3 to 5 feet below the concrete floor.

Results for BTEX compounds were all below the analytical detection limits. At borehole B-6, however, the 3 to 5 foot sample analysis required the use of elevated detection limits due chemical interferences in the sample and as a result detection limits for BTEX were reported above the clean up criteria in the document entitled Spill Technology and Remediation Series Memo #1 the NYSDEC Petroleum Contaminated Soil Guidance Policy. Unfortunately, the results are ambiguous in this sample because BTEX may or may not be present at levels that require remediation.

Sample results for the single groundwater sample collected from borehole number B-7, at a depth of 19 feet, reveal that only acetone, TCE, and TVHC were found above detection limits. The acetone concentration, 1,100 µg/l, is the only sample result over the NYSDEC GA groundwater quality criteria. The concentration of TVHC is 24,000 µg/l and there is not specific regulatory limit on TVHC's or the compounds which are measured to obtain this result.

1,1,1-TCA, PCE, and BTEX all were found below detection limits. The detection limits for the BTEX compounds did, however exceed NYSDEC GA groundwater quality criteria for benzene at 0.7 µg/l, and 5 µg/l for toluene, ethylbenzene, and xylene. The detection levels for this analysis are as follows; benzene less than 3 µg/l, toluene less than 7 µg/l, ethylbenzene less than 13 µg/l, and xylene less than 17 µg/l.

DISCUSSION

The sample results indicate that acetone is ubiquitous across the site at levels which exceed the NYSDEC TAGM concerning soil clean up objectives for the protection of groundwater. Within the background of acetone contamination, there are eight areas which appear to be acetone hotspots, an acetone concentration greater than 6,400 µg/kg. These areas include the following soil sample locations: sample location SS-2 and SS-3 on the east side of the main building where acetone was detected at a concentration of 42,800 and 10,600 µg/kg respectively; sample location SS-6 at a concentration of 17,000 µg/kg and located on the south side of the main building adjacent to space rented by Gemcor Corporation; and sample locations SS-9, SS-10, SS-11, SS-13, and SS-31 at

concentrations of 38,000, 35,000, 45,000, 21,000 and 22,000 $\mu\text{g}/\text{kg}$ respectively and located at the southwest corner of the main building and the site's south fenceline. All of these hotspot locations, with the exception of sample locations SS-2 and SS-3, can be associated with areas historically used for outside storage. Sample locations SS-2 and SS-3 are immediately outside an area which was once used as a paint vault.

In the Phase I Site Investigation Report, it was thought that the acetone had possibly migrated in the groundwater from a source within the building to the monitoring wells installed for the Phase I Site Investigation and that the past outdoor storage activities resulted in contamination of the soil and groundwater. In both cases our ideas were verified by our results with the exception that it appears that groundwater had less involvement in the migration of acetone.

The presence of 1,1,1-TCA, TCE and PCE also appears to fit the scenario of releases occurring from the storage production chemicals outdoors. The most significant concentrations of these compounds were as follows; sample location 11, TCE at a concentration of 810 $\mu\text{g}/\text{kg}$; sample location SS-29, TCE at a concentration of 500 $\mu\text{g}/\text{kg}$, and sample location SS-32, 1,1,1-TCA at a concentration of 280 $\mu\text{g}/\text{kg}$. Only TCE at a concentration of 810 $\mu\text{g}/\text{kg}$ (sample location SS-32) exceeds NYSDEC's TAGM concerning soil clean up objectives for the protection of groundwater.

In general, BTEX compounds were found not to be a significant issue during this investigation because only two sample locations detected benzene above analytical detection limits. At sample location SS-31, benzene was detected at a concentration of 100 $\mu\text{g}/\text{kg}$ and at sample location SS-3, benzene was detected at a concentration of 46 $\mu\text{g}/\text{kg}$. This data suggests that BTEX compounds, other than benzene, originate from the UST's and may be limited to the immediate vicinity of the UST pits by the presence of the silty clay. The data does raise a concern, however that the benzene may have originated from the storage of production chemicals for the former lithographic printing operations and/or the storage of paint and painting chemicals in the former paint vault. Sample location SS-3 is located south of the former paint vault and sample location SS-31 is located west of the main building and once heavily used for outdoor storage. The presence of benzene appears to fit a scenario of releases resulting from the storage handling and use of production chemicals, paint, and painting chemicals.

The data from the geoprobe sampling and the soil borings has also helped refine our earlier conceptual models concerning groundwater at the site. Based on this investigation groundwater appears to exist in small isolated pools located at the interface between the fill and natural soil. It is also believed that the volume of flow moving across the fill/soil interface is minimal because groundwater was not found in the majority of sampling locations. Although not completely verified by these investigations the basement would serve as an ideal groundwater collection sump because of its depth and the presence of a permeable fill.

CONCLUSIONS

From our findings we offer the following conclusions:

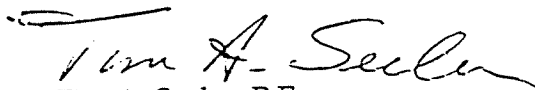
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- the presence of acetone is widespread across the site at levels which exceed the soil cleanup objectives for the protection of groundwater listed in the NYSDEC document entitled "Division of Technical and Administrative Guidance Memorandum: Determination of Soil Cleanup Objectives and Cleanup Levels, dated November 1992."
- the presence of benzene appears to be unrelated to petroleum contamination and may be present because of its use as a solvent.
- the presence of acetone, benzene, and the chlorinated solvents appears to be the result of their storage and use on site either as a component in a formulation (i.e. paint) or by themselves as a solvent.
- the level of total volatile hydrocarbons appears significant, because it is an indication of the presence of other compounds.
- soil borings completed inside the main building show that a fill layer and silty clay exists beneath the main building at an elevation comparable to the rest of the site.
- groundwater on site does not appear to be continuous layer, but isolated into pools across the site.

If you have any questions regarding our report please call me.

Very truly yours,

SEELER ASSOCIATES



Tim A. Seeler, P.E.
Principal

PVS/jle
2595PVS
Attachments

Seeler Associates

TABLE 1

WEGMANS FOOD MARKETS, INC.
601 AMHERST STREET
ADDITIONAL SITE CHARACTERIZATION
SAMPLE RESULTS
(Units in Parts per Billion)

Sample Number	Depth	Acetone	1,1,1-TCA	TCE	PCE	Benzene	Toluene	Ethyl Benzene	Xylenes	TVHC
AIR	—	<.65	<.00004	<.00008	.00005	<.03	<.07	<.1	<.2	<.17
B6	3' - 5'	2900	<.02	9	0.4	<.78	<.150	<.310	<.390	5000
B6	15' - 17'	2100	<.02	3	1	<.14	<.32	<.60	<.78	160
B7-WS	19'	1100	<.004	2	0.006	<.3	<.7	<.13	<.17	24,000
B77-SS	19'	6000	<.02	5	0.03	<.14	<.32	<.60	<.78	3300
B8	28' - 30'	2900	<.02	2	0.1	<.14	<.32	<.60	<.78	130
B8	9' - 11'	1600	<.02	2	0.2	<.14	<.32	<.60	<.78	60
B9-S3	5' - 7'	1200	0.1	0.4	0.4	<.14	<.32	<.60	<.78	97
B9-S14	29' - 30'	2000	0.05	0.5	1	<.14	<.32	<.60	<.78	120
WS-1	6.5'	1500	0.01	0.02	0.04	<.3	<.7	<.13	<.17	18
SS-2	9'	42800	<.02	1	0.05	<.14	<.32	<.60	<.78	170
SS-3	7'	10600	<.02	2	0.3	46	<.32	<.60	<.78	330
SS-4	7'	3700	<.02	2	0.04	<.14	<.32	<.60	<.78	270
SS-5	7'	6000	<.02	5	0.03	<.14	<.32	<.60	<.78	150
SS-6	7'	17000	<.004	1	0.03	<.14	<.32	<.60	<.78	55
SS-7	6.5'	290	9	0.5	0.3	<.14	<.32	<.60	<.78	220
SS-8	7'	6400	<.02	0.9	0.05	<.14	<.32	<.60	<.78	640
SS-9	7'	38000	9	5	0.09	<.14	<.32	<.60	<.78	180
SS-10	7'	35000	0.4	87	64	<.14	<.32	<.60	<.78	150
SS-11	7'	45000	55	810	14	<.14	<.32	<.60	<.78	20,200
SS-12	7'	430	0.5	9	1	<.14	<.32	<.60	<.78	280
SS-13	7'	2100	0.3	41	0.9	<.14	<.32	<.60	<.78	410
SS-14	7'	600	41	46	23	<.14	<.32	<.60	<.78	78
SS-15	9'	780	0.1	0.5	2	<.14	<.32	<.60	<.78	220
SS-16	9'	440	3	1	0.5	<.14	<.32	<.60	<.78	69
SS-17	7'	870	0.09	0.9	0.1	<.14	<.32	<.60	<.78	5500
SS-18	7'	800	0.1	0.2	0.3	<.14	<.32	<.60	<.78	100
SS-19	7'	2100	0.9	0.4	0.3	<.14	<.32	<.60	<.78	160
SS-20	7'	3400	0.5	0.9	0.2	<.14	<.32	<.60	<.78	83

TABLE 1

WEGMANS FOOD MARKETS, INC.
 601 AMHERST STREET
 ADDITIONAL SITE CHARACTERIZATION
 SAMPLE RESULTS
 (Units in Parts per Billion)

Sample Number	Depth	Acetone	1,1,1-TCA	TCE	PCE	Benzene	Toluene	Ethyl Benzene	Xylenes	TVHC
SS-21	5'	4000	0.4	0.9	0.3	<14	<32	<60	<78	640
SS-22	7'	3300	0.09	0.5	0.2	<14	<32	<60	<78	150
SS-23	7'	2600	<0.02	1	0.04	<14	<32	<60	<78	220
SS-24	7'	1300	<0.02	2	0.2	<14	<32	<60	<78	400
SS-25	7'	490	<0.02	1	0.1	<14	<32	<60	<78	870
SS-26	7'	<120	<0.02	2	0.2	<14	<32	<60	<78	200
SS-27	7'	1900	<0.02	2	0.2	<14	<32	<60	<78	190
SS-28	7'	2400	<0.02	2	0.1	<14	<32	<60	<78	92
SS-29	7'	3000	2	500	0.1	<14	<32	<60	<78	390
SS-30	7'	3400	<0.02	3	0.09	<14	<32	<60	<78	2800
SS-31	7'	22,000	9	4	0.9	100	<32	<60	<78	74
SS-32	7'	3100	280	97	0.3	<14	<32	<60	<78	550
SS-33	7'	2700	2	3	0.05	<14	<32	18	<78	370

ATTACHMENTS

SEELER ASSOCIATES Environmental Consultants					Subsurface Boring Log		Well Name/Location: BL	
Client: <i>WEGMANS FOOD MARKETS</i> Project: <i>601 AMHERST ST.</i>					Start Date: <i>3-16-95</i> Finish Date: <i>3-16-95</i>			
DRILLING DATA					SAMPLING METHODS			
Consultant: <i>P. VON SCHUNDORF</i> Contractor: <i>BUFFALO DRILLING</i> Equipment: <i>CME</i> Method: <i>HOLLOW STEM AUGERS</i>					Type:	Sampler <i>SPT</i>	Tube <i>NA</i>	Core <i>NA</i>
					Diameter:	<i>2"</i>		
					Other:	<i>—</i>		
WELL CONSTRUCTION					WELL DEVELOPMENT		SURVEY DATA	
		Riser	Screen				DATUM	
Material:		<i>NA</i>	<i>NA</i>		Method: <i>NA</i>		Grade: <i>FF</i>	
Diameter (ID):					Duration:		TWC:	
Coupling:					Gals. Purged:		TCB:	
WELL CONSTRUCTION		soil	SAMPLE DATA			Slug Test (cm/sec):		North:
		rock				East:		
		Samp. No.	Blows 6/in.	% Rec.	USCS	<i>HNH</i> <i>QVA</i>	Geophysical Log: yes no	
		Run No.	Hydraul. Cond. cm/sec	% Rec.	% ROD	(ppm)	VISUAL CLASSIFICATION	REMARKS
		<i>1</i>		<i>60%</i>		<i>200</i>	<i>0-.5' CONCRETE</i> <i>GRAY, SILT AND GRUL FILL, DENSE (1-3')</i>	
		<i>2</i>		<i>30%</i>		<i>650</i>	<i>BLK, ASH (COAL.)</i> <i>SILT SIZE, DAMP</i> <i>SOLVENT ODOR. (3-5')</i>	
		<i>3</i>		<i>50%</i>		<i>50</i>	<i>BRICK AND ASH, (5-7')</i>	
		<i>4</i>		<i>100%</i>		<i>600</i>	<i>GRAY-BROWN, SILTY CLAY, TC</i> <i>ROOTS, MOTTLED, SLIGHTLY PLASTIC</i>	
		<i>5</i>		<i>100%</i>		<i>200</i>	<i>A/A, VERTICAL CRACKING (CLAY)</i>	

SEELER ASSOCIATES Environmental Consultants					Subsurface Boring Log	Well Name/Location: B6	
Client: WEGMANS FOOD MARKETS					Start Date: 3-16-95		
Project: 601 AMHERST ST.					Finish Date: 3-16-95		
WELL CONSTRUCTION		soil	SAMPLE DATA				
		rock					
	Samp. No.	Blows 6/in.	% Rec.	USCS	HMM GVA	Geophysical Log: yes <u>no</u> Comments:	
	Run No.	Hydraul. Cond. cm/sec	% Rec.	% ROD	(ppm)	VISUAL CLASSIFICATION	REMARKS
	6		40%		200	RED/BROWN SILT AND CLAY, DRY DENSE, OCC. FN GRVL, VERT. FRACTURE. (11-13')	
	7		10 3/4%		50	A/A, 30% GRVL WITH SILTY CLAY. (13-15')	
	8		40%		50	A/A. (15-17')	
	9		40%		50	RED/BROWN SILTY CLAY 30% GRVL, MOIST. (18-20')	
						TD 20'	

SEELER ASSOCIATES Environmental Consultants					Subsurface Boring Log		Well Name/Location: B7	
Client: WEGMANS FOOD MARKETS					Start Date: 3-14-95			
Project: 601 AMHERST ST.					Finish Date: 3-14-95			
DRILLING DATA					SAMPLING METHODS			
Consultant: P. von Schondorf					Type:	Sampler SPT	Tube NA	Core NA
Contractor: BUFFALO DRILLING CO.					Diameter:	2"		
Equipment: CME					Other:	—		
Method: HOLLOW STEM AUGERS								
WELL CONSTRUCTION					WELL DEVELOPMENT		SURVEY DATA	
		Riser	Screen				DATUM	
Material:		NA	NA		Method: NA		Grade: F.F.	
Diameter (ID):					Duration:		TWC:	
Coupling:					Gals. Purged:		TCB:	
WELL CONSTRUCTION		soil				Slug Test (cm/sec):		North:
		rock	SAMPLE DATA					East:
		Samp. No.	Blows 6/in.	% Rec.	USCS	OVA	Geophysical Log: yes (no)	
		Run No.	Hydraul. Cond. cm/sec	% Rec.	% ROD	(ppm)	Comments:	
							VISUAL CLASSIFICATION	
							REMARKS	
		1		25%		2	0-1' CONCRETE	
		2		30%		0	1-3', DK BROWN BLK, SILT SIZE ASH AND CINDERS DRY	
		3		30%		1	BLK ASH MIXED W/ BRN SILTY CLAY LITTLE FN GRVL, DRY-DAMP, (3-5')	
		4		NR		0	BRN SILTY CLAY MIXED W/ FILL (GLASS, BRICK, ASH), DRY, (5-7')	
							GRY-BLK, ASH CINDER FILL, SOME MIXED SILTY CLAY, (7-9')	

SEELER ASSOCIATES

Environmental Consultants

Subsurface
Boring Log

Well Name/Location:

B7

Client: WEGMANS FOOD MARKETS

Start Date: 3-14-95

Project: 601 AMHERST ST.

Finish Date: 3-14-95

WELL CONSTRUCTION	soil	SAMPLE DATA				Geophysical Log: yes ☒ (no)	
	rock						
	Samp. No.	Blows 6/in.	% Rec.	USCS	HNU OVA	Comments:	
	Run No.	Hydraul. Cond. cm/sec	% Rec.	% ROD	(ppm)	VISUAL CLASSIFICATION	REMARKS
	5		NR		3	GRY-BLK ASH, MIXED W/ BRN SILTY CLAY, w/ COAL PIECES & GRVL. (9-11')	
	6		NR		3	BRN, SILTY CLAY, OCC. GRVL., DAMP (11-13')	
	7		NR		0	A/A, SATURATED (13-15')	
	8		50%		450	BLK, SAND AND GRAVEL, SAT. PETROL. ODOR (15-17')	SOIL APPEARS STAINED BUT NOT MOBIL
	9		50%		750	A/A (18-20') TD BORING 20'	COLLECTED GW SAMPLE

SEELER ASSOCIATES Environmental Consultants					Subsurface Boring Log		Well Name/Location: B8	
Client: WEGMANS FOOD MARKETS					Start Date: 3-15-95			
Project: 601 AMHERST ST.					Finish Date: 3-16-95			
DRILLING DATA					SAMPLING METHODS			
Consultant: P. VON SCHENDORF					Type:	Sampler	Tube	Core
Contractor: BUFFALO DRILLING CO.					Diameter:	SPT	NA	NA
Equipment: CME					Other:	2"		
Method: HOLLOW STEM AUGERS						—		
WELL CONSTRUCTION					WELL DEVELOPMENT		SURVEY DATA	
Material:		Riser	Screen		Method: NA		Grade: F.F.	
Diameter (ID):		NA	NA		Duration:		TWC:	
Coupling:					Gals. Purged:		TCB:	
WELL CONSTRUCTION		soil			Slug Test (cm/sec):		North:	
		rock	SAMPLE DATA				East:	
Samp. No.		Blows 6/in.	% Rec.	USCS	Geophysical Log: yes ☐ no ☒			
Run No.		Hydraul. Cond. cm/sec	% Rec.	% ROD (ppm)	Comments:			
					VISUAL CLASSIFICATION		REMARKS	
1				40% 4	0 - .6' CONCRETE			
2				0	BLK, SILT SIZE ASH (COAL?), DRY DENSE. (1-3')			
3				30% 5	NO RECOVERY - DRIVE ROCK			
4				20% 3	BLK, ASH AND BRICK, GRVL, DRY. (5-7')			
5				40% 2	A/A, WGT, (7-9')			
6				30% 0	BROWN/GRY SILT, TE WOOD, GRVL. DENSE. (9-11')			
					RED/BROWN SILT, SILTY CLAY, VAEVED TE GRVL, DRY DENSE. (11-13')			

SEELER ASSOCIATES Environmental Consultants					Subsurface Boring Log		Well Name/Location: BB	
Client: WEGMAN'S FOOD MARKETS					Start Date: 3-15-95			
Project: 601 AMHERST ST.					Finish Date: 3-16-95			
WELL CONSTRUCTION		soil	SAMPLE DATA					
		rock						
Samp. No.	Blows 6/in.	% Rec.	USCS	HNH TOVA	Geophysical Log: yes ☐ no ☒		Comments:	
Run No.	Hydraul. Cond. cm/sec	% Rec.	% ROD	(ppm)	VISUAL CLASSIFICATION		REMARKS	
7		40%		0	RED/BROWN SILT-SILTY CLAY, VARVED, DRY (13-15')			
8		40%		500	A/A, OCC. GRAY. SAND (15-17')			
9		75%		1000	A/A, TE GRVL, DRY (17-19')			
10		50%		250	A/A, (19-21')			
11		80%		500	A/A (21-23')			
12		80%		100	A/A, WITH VERTICAL CRACKING, (23-25')			
13		90%		300	RED/BROWN SILTY CLAY, LITTLE GRVL (30%), VARVED SLIGHTLY PLASTIC			
14		90%		1000	A/A, SOME MOTTLED VERTICAL CRACKING (28-30'), TD 30'			

SEELER ASSOCIATES Environmental Consultants					Subsurface Boring Log	Well Name/Location: B9	
Client: WEGMANS FOOD MARKETS					Start Date: 3-14-95		
Project: 601 AMHERST ST.					Finish Date: 3-15-95		
DRILLING DATA					SAMPLING METHODS		
Consultant: P. von Schondorf					Type:	Sampler	Tube
Contractor: BUFFALO DRILLING CO.					Diameter:	SPT	NA
Equipment: CME					Other:	2"	Core
Method: HOLLOW STEM AUGERS						—	NA
WELL CONSTRUCTION					WELL DEVELOPMENT		SURVEY DATA
Material:					Method: NA		Grade: F.F.
Diameter (ID):					Duration:		TWC:
Coupling:					Gals. Purged:		TCB:
WELL CONSTRUCTION					Slug Test (cm/sec):		North:
soil							East:
rock							
SAMPLE DATA					Geophysical Log: yes no		
Samp. No.					Blows 6/in.		% Rec.
Run No.					Hydraul. Cond. cm/sec		% Rec.
					USCS		% ROD
					HNU		(ppm)
					OVA		
					Comments:		
					VISUAL CLASSIFICATION		REMARKS
					0 - .6 CONCRETE		
1					100%		500 BLK ASH AND SAND, DRY, V. DENSE SLIGHT ODOR (1-3')
2					50%		950 BLK ASH AND GRAVEL, DRY, (3-5')
3					50%		1050 A/A, ASH-SILT SIZE, (5-7')
4					40%		750 RED/BROWN-GRY, SILTY CLAY, SLIGHTLY PLASTIC STIFF. (7-9')
5					NR		150 A/A, DAMP, VARIED (9-11')
							APPROX. LIMIT OF FILL 8'

SEELER ASSOCIATES

Environmental Consultants

Subsurface
Boring Log

Well Name/Location:

B9

Client: WEGMANS FOOD MARKETS

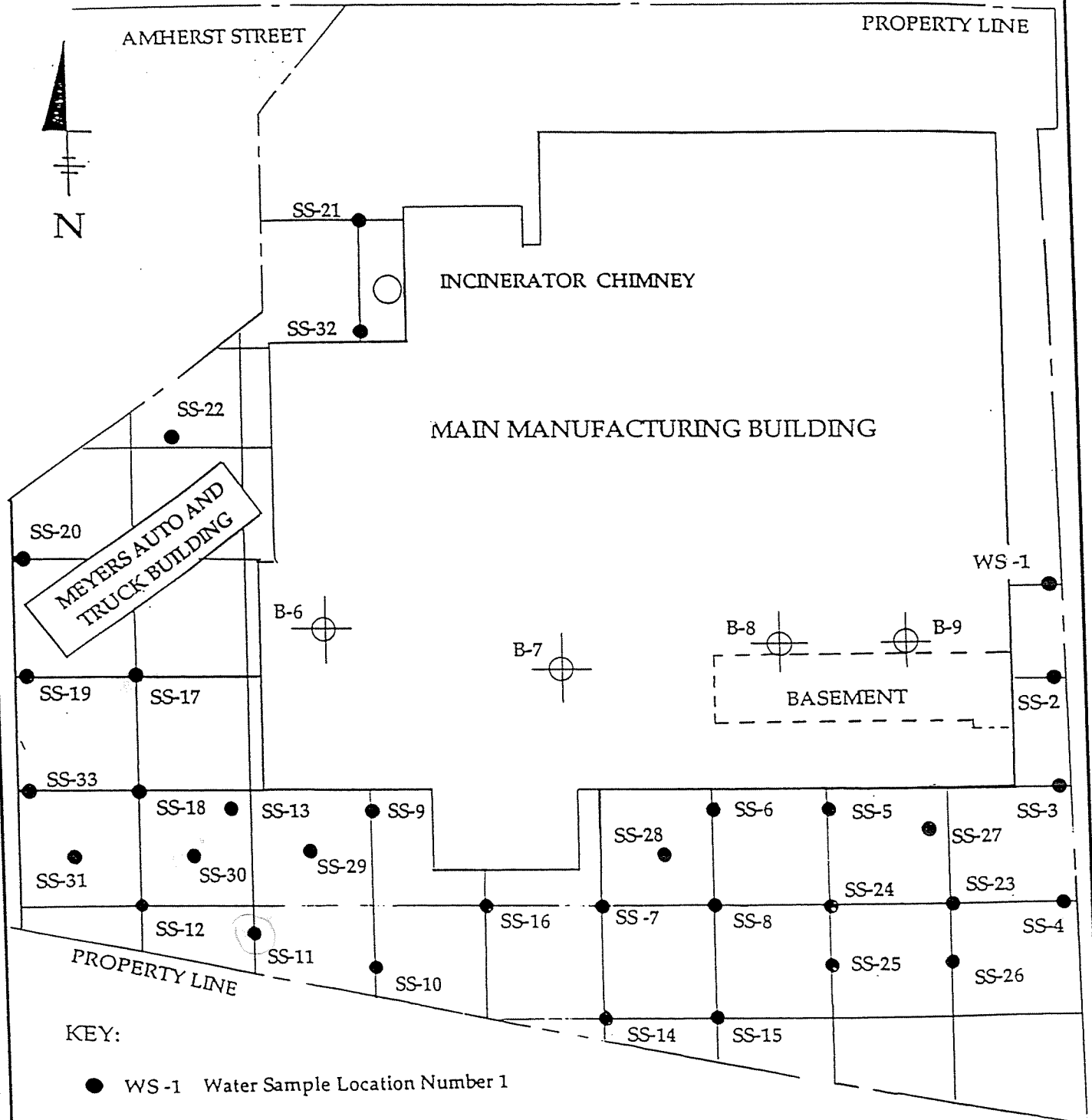
Start Date: 3-14-95

Project: 601 AMHERST ST.

Finish Date: 3-15-95

WELL CONSTRUCTION	soil	SAMPLE DATA				Geophysical Log: yes <u>no</u>	
	rock						
	Samp. No.	Blows 6/in.	% Rec.	USCS	OVA	Comments:	
	Run No.	Hydraul. Cond. cm/sec	% Rec.	% ROD	(ppm)	VISUAL CLASSIFICATION	REMARKS
	6		60		300	A/A NOT VALUED (11-13')	
	7		50		100	A/A, TRACE GRV (13-15')	
	8		75		100	A/A, SLIGHTLY PLASTIC, DENSE (15-17')	
	9		75		1000	A/A, (17-19')	
	10		75		1100	A/A, (19-21')	
	11		60		700	A/A, VALUED, MOIST (21-23')	
	12		50		400	RED/BROWN SILTY CLAY TRACE GRV, GRADING TO SILT (GRY), (23-25')	
	13		30		100	A/A, VALUED W/ VERTICAL FRACTURES GRY DISCOLORATION OC. SAND LENS (25-27')	
	14		30		75	A/A (28'-30').	TD 30'

FIGURE 1
SAMPLE LOCATION MAP
WEGMANS FOOD MARKET'S, INC.
601 AMHERST STREET



KEY:

● WS-1 Water Sample Location Number 1

● SS-1 Soil Sample Location Number 1

⊕ B-6 Borehole Location Number 6

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TABLES

Table 1 - Summary of Volatile Organic Vapor Measurements from Soil Samples
Table 2 - Soil Sample Results
Table 3 - Groundwater Sample Results
Table 4 - Cost Summary for Site Remediation

FIGURES

APPENDICES

1

Section One

Section 1.0

Introduction

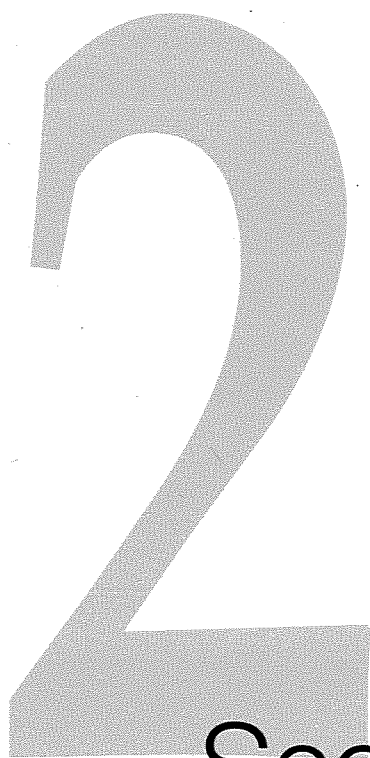
1.1 General

The soil and groundwater sampling program, the results of which are presented herein, was conducted in accordance with a plan for Wegmans Food Markets, Inc. (Wegmans) and agreed to by Campus Industries (Campus), the owner of the property located at 601 Amherst Street. The purpose of the program was to provide data which both Wegmans and Campus could agree was obtained in a consistent and acceptable manner. The presence or absence of acetone and methylene chloride identified by previous investigations could not be resolved because of project scope differences and the differences between the analytical methods used by Wegmans and Campus. On August 10 and 11, 1995 Camp, Dresser & McKee (CDM) completed the soil and groundwater sampling program in accordance with the Soil and Groundwater Sampling Plan, dated August 1995, prepared by CDM for Wegmans Food Markets, Inc. Acres International representatives monitored the soil and groundwater sampling and provided an Hnu Systems, PI-101 organic vapor analyzer with a 10.2 electron volt photoionization detector to aid in determining which soil samples were selected for analysis.

1.2 Scope and Objectives

The scope of work detailed by the Soil and Groundwater Sampling Plan included the following activities:

- The drilling of 6 boreholes to a depth of eight feet below groundsurface at locations believed to contain the highest concentrations of acetone and/or methylene chloride, based on previous investigations, and at one area where potentially low concentrations of acetone may exist and the collection of soil samples for analysis.
- The bailing and sampling of MW1 and MW2, groundwater monitoring wells installed during previous investigations.
- The collection and analysis of soil and groundwater samples by New York State Department of Environmental Conservation (NYSDEC) Analytical Services Protocol (ASP) Method 91-1 for volatile organic compounds.



Section
Two

Section 2.0 Methods

2.1 Soil Sampling

Six soil borings were drilled and sampled to a depth of approximately 8 feet below ground surface.

Figure 1 shows the location of the soil borings and the sampled monitoring wells.

2.1.1 Sampling Procedures

Soil samples were collected using a 2-foot-long 3-inch-diameter split-spoon sampler. SJB Services Incorporated operated a drilling rig equipped with 4.25 inch inside diameter hollow stem augers to advance each borehole. To initiate sampling SJB augered approximately 1 foot into the ground before attempting to collect the first split spoon sample to avoid unnecessarily sampling the asphalt road surface and asphalt gravel base. Soil samples were collected from the 1 to 2 foot interval below ground surface, then in consecutive 2-foot intervals in a manner consistent with ASTM D-1586-87, the standard penetration test. Hammer blows to advance the 3-inch split spoon were not recorded. After collection, each split spoon sample was handled using the following procedures:

- Immediately after opening the split spoon sampler, sufficient sample for analysis was collected and placed in jars appropriate for analysis, and given a unique sample identification number. If required, sufficient sample was made available to Acres International for their use.
- A portion of the remaining sample was then collected and placed in a re-sealable zip locked plastic bag. This sample was given a sample identification number used for field screening.
- The samples collected for field screening were maintained at ambient temperature until the completion of the day's sampling activities.
- At the completion of the day's sampling, the plastic bags containing the field screening samples were pierced with the tip of a Hnu Systems PI-101 organic vapor analyzer (with a photoionization type organic vapor detector) and a Foxboro Century Model 128 organic vapor analyzer (with a flame ionization detector) in order to measure the organic vapor concentration in the head space above the sample.
- The observed organic vapor concentration was recorded for future reference.

- The portion of the sample not saved for field screening or chemical analysis was examined and described in accordance with the Unified Soil Classification System. This information was entered into the field log book.

2.1.2 Soil Samples for Laboratory Analysis

Samples to be analyzed were placed in the sample containers as quickly as possible. Samples for analysis were selected based on the concentration of volatile organic vapors measured during field screening analysis. The sample exhibiting the largest concentration of volatile organic vapors was analyzed. One sample from each borehole was sent for chemical analysis.

Six borehole soil samples were collected for analysis. In addition to these 6 samples, a suite of quality assurance samples were also collected as specified by NYSDEC. These samples included:

- One duplicate soil sample was collected from the sample taken from boring B-4 at a depth of 2 to 4 feet below ground surface.
- One soil sample was collected for both matrix spike and matrix spike duplicate analysis from boring B2 at a depth of 6 to 8 feet below ground surface.
- One field blank sample was collected from a decontaminated split spoon sampler used during the sampling of borehole B2. The sample consisted of deionized water which had been poured over the split spoon sampler and collected in a sample vial.
- One trip blank sample was carried into the field.

2.2 Groundwater Sampling

CDM sampled two existing monitoring wells; MW-1 and MW-2 located on the south side of the active manufacturing building, see Figure 1.

2.2.1 Pre-Sampling Activities

Well Maintenance Check

Prior to sampling, an inspection of both monitoring wells was performed to: determine the integrity of the monitoring well's protective casing; assess the presence of water in the protective casing, and assess the condition and integrity of the monitoring well's cap and the surface seal. The condition of the monitoring well was noted in the field log. The condition of both monitoring wells was such that corrective actions were not needed.

After the initial monitoring well inspection, a depth to groundwater was determined for both monitoring wells using an electronic water level meter. After measuring the water level a bailer was submerged into the well to a point just below the water surface to detect the presence of light nonaqueous phase liquids (LNAPL). After the LNAPL check, the bailer was sent to the bottom of the well to investigate the presence of dense nonaqueous phase liquids (DNAPL). Neither LNAPL or DNAPL accumulations were observed. After the DNAPL check the monitoring well was sounded to determine if the well required development to remove silt from the monitoring well screen. Both monitoring wells were found to be silt free.

2.2.2 Well Evacuation and Groundwater Sampling

Prior to sampling, each well was bailed and sampled with a bailer. The bailer was retrieved using a polypropylene line. Bailing removed approximately four gallons of groundwater from both monitoring well MW1 and MW2. The removal of four gallons of groundwater from monitoring well MW2 dewatered the well. In both instances the removal of four gallons of groundwater exceeded the sampling plan's requirement to remove three well volumes of groundwater prior to sampling. Sampling of the monitoring well's began approximately 1-hour after bailing, but before either well could fully recharge to the static water level.

Two groundwater samples, one from each well, were collected. Analysis of the samples was conducted using NYSDEC ASP Method 91-1 for volatile organic compounds. In addition to these two samples, a suite of quality assurance samples were also collected and include the following:

- One duplicate groundwater sample collected from monitoring well MW1 for duplicate analysis.
- One groundwater sample collected from MW1 for both matrix spike and matrix spike duplicate analysis.
- One field blank sample collected from the decontaminated sampling bailer used in monitoring well MW1. The sample consisted of deionized water which had been poured over the sampling bailer and collected in a sample vial.
- One trip blank sample carried into the field.

2.3 Equipment Cleaning Methods

Equipment in contact with laboratory samples was cleaned prior to and between each use. The equipment was then temporarily placed on clean racks, above the ground surface until it was used. Equipment such as split-spoon samplers, soil knives and bailers were cleaned with the following materials:

- Trisodium phosphate dissolved in tap water;
- Tap water rinse;
- Methanol rinse;
- Distilled/deionized water rinse; and
- Air dry.

Non-dedicated drilling equipment in contact with soil or groundwater was cleaned prior to use and between each boring location. Decontamination of this equipment was accomplished using a brush to remove large solid particles, followed by steam cleaning with tap water. Per the instruction of Acres International representative, Mr. James Stachowski, and with the concurrence of Campus Industries representative Mr. Michael Fairbanks, wash water was allowed to be discharged to a catch basin, which reportedly entered the sanitary sewer. This drain was located in the floor of the loading dock used by Tzeto Brothers. Soil was removed from the augers at each borehole location and used for borehole backfill.

3

Section Three

Section 3.0 Results

3.1 Soil Sample Results

Six boreholes were advanced and split spoon samples collected continuously from a depth of 1 foot below ground surface to a depth of 8 feet below ground surface to identify the materials below the site and to collect soil samples for chemical analysis. Figure 1 shows the approximate locations of the boreholes installed for this sampling program. In general, the materials found below the site to depths sampled can be characterized as fill consisting of cinders, ashes, and silty clay soil similar to the undisturbed native soil. At borehole location B2, however, at a depth of 2 to 4 feet, a semi-consolidated white powder was discovered layered within the fill. The powder did not yield any measurable organic vapors. Fill soils had a consistent silty clay texture, but on occasion the soil did contain percentages of gravel and sand, in thin inconsistent layers. The layer of fill ranged in thickness from approximately 4 feet at borehole B6 to approximately 8 feet at borehole B1. Below the fill layer an undisturbed silty clay was encountered. The silty clay was dense and at times was slightly plastic. All of these materials, with the exception of the white powder discovered in borehole B2, were found to be consistent with the findings of previous investigations.

The appearance of groundwater as indicated by wet soil samples was noticed at only 3 of the 6 sampling locations; borehole locations B1, B2, and B3. Borehole locations B1 and B2 were located adjacent to monitoring well locations MW1 and MW2, respectively. Wet soil samples were found within the fill layer and at a depth ranging from approximately 4 feet below ground surface at borehole B1 (adjacent to monitoring well MW1) and at 6 feet below ground surface at borehole B2 (adjacent to monitoring well MW2). At borehole location B3, wet soil conditions were encountered at a depth of approximately 2 feet below ground surface.

Organic vapor screening results are shown on Table 1 and show that organic compounds were generally measured on the Foxboro Organic Vapor Analyzer equipped with the flame ionization detector (FID). Elevated FID measurements were consistently found at a depth between 6 and 8 feet below ground surface, with the exception of borehole locations B5 and B6. At boreholes B3, B4 and B5 elevated FID measurements were recorded throughout the entire length of the borehole. Elevated FID measurements were also found at depths ranging from 4 to 8 feet at borehole location B1 and, 2 to 8 feet at borehole location B6.

Elevated organic vapor concentrations measured by the Hnu Systems PI-101, using the photoionization detector (PID) were also detected. Typically the PID concentrations were less than 2.5 parts per million with the exception of

borehole location B5 at a depth of 1 to 2 feet where a concentration of 40 parts per million was detected.

A total of 6 soil samples was collected for chemical analysis based on the concentration of volatile organic vapors measured during sample screening. Samples selected for chemical analysis and their respective volatile organic vapor measurements are shown on Table 1. In addition to the samples collected for chemical analysis, 2 samples were collected for matrix spike and matrix spike duplicate analyses in accordance with NYSDEC ASP protocol. In accordance with the sampling plan, 1 trip blank sample, 1 rinsate sample and 1 duplicate sample (borehole location B4, sample 2-4 feet below ground surface) were also collected for analysis in accordance with the sampling plan.

Table 2 shows a summary of the soil sample results. In general, volatile organic compounds were found in each sample ranging in concentration from low part per billion (ppb) to part per million (ppm) levels.

Acetone, 2-butanone, cis-1,2-dichloroethene (cis), and trichloroethene (TCE) were the most common compounds detected and were detected at the following concentration ranges:

- Acetone at concentrations from below detection levels to 180 ppb at borehole B3;
- 2-butanone at concentrations from below detection levels to 94 ppb at borehole B3;
- cis at concentrations from below detection levels to 110,000 ppb at borehole B5; and
- TCE at concentrations from below detection levels to 110,000 ppb at borehole B5.

Also of importance, however, were the elevated levels of vinyl chloride, at a concentration of 46 ppb at borehole B4, and trans 1,2-dichloroethene (trans), at a concentration of 16,000 ppb at borehole location B5, because these compounds can be the result of the decomposition of TCE and tetrachloroethene (PCE).

Duplicate sample analysis showed good correlation between samples. The trip blank and rinsate sample analyses showed no contamination. The recovery of surrogate compounds used in the analysis of matrix spike and matrix spike duplicate samples were within acceptable ranges according to ASP protocols with the exception of the sample from borehole B2. The data was not flagged during validation indicating that the data from B2 was not compromised.

3.2 Groundwater Sampling Results

The groundwater sampling yielded two sets of data; data from the monitoring well integrity evaluation and LNAPL and DNAPL checks, and the groundwater analytical data.

The monitoring well integrity evaluation found that the protective casings and well seals were in good condition on both monitoring wells. Both monitoring wells contained water in the protective casing at a level below the top of the monitoring well's riser. Well caps were found on each monitoring well, but not screwed down tightly.

At monitoring well MW1 the water level was measured at 3.5 feet below ground surface. At monitoring well MW2 the water level was measured at 6.9 feet below ground surface. LNAPL and DNAPL were not found in the water column. Acres International measured the organic vapor concentrations in each monitoring well after bailing the well and found organic vapors at a concentration of 4 parts per million, using a PID, in monitoring well MW1. At monitoring well MW2 organic vapors were not found although a petroleum odor was noticed by both Acres and CDM.

Results from the groundwater samples reveal that only vinyl chloride, cis, benzene, xylene and 1,2,4 trimethylbenzene were found in the groundwater. Table 3 shows a summary of the groundwater sample results. Volatile organic compounds detected in the sample from monitoring well MW 1 at concentrations above estimated detection levels (J-values) include vinyl chloride at concentration of 20 ppb and cis at a concentration of 12 ppb. Volatile organic compounds detected in the sample from monitoring well MW 2 include benzene at a concentration of 58 ppb, xylene at a concentration of 18 ppb and 1,2,4 trimethylbenzene (1,2,4-TMB) at an estimated concentration of 81 ppb. The concentration of 1,2,4-TMB was flagged by the laboratory as having an estimated concentration and having only presumptive identification evidence because it was identified by mass spectral library search.

Duplicate sample analysis of the sample collected from monitoring well MW-1 showed good correlation. There were no discrepancies between the two sample data sets. Rinsate sample results demonstrated no cross contamination between samples as a result of sample tool decontamination. All laboratory quality assurance procedures and matrix spike and matrix spike duplicate analyses showed conformance with ASP protocols.

3.3 Discussion

Sample results from both the soil and groundwater show levels of volatile organic compounds at concentrations greater than NYSDEC clean up criteria based on human health risk (recommended soil clean up objectives) or for the

protection of groundwater quality. NYSDEC clean up criteria have been taken from the Memorandum entitled "Determination of Soil Cleanup Objectives and Cleanup Levels, January 1994." The comparison of sample results to the cleanup criteria are shown in Tables 2 and 3. As the tables show there are two areas where volatile organic compounds in the soil are a concern; at borehole location B3 and B5. Each monitoring well location is a concern as well because volatile organic compounds were found in the groundwater at concentrations which exceed the NYSDEC groundwater quality standards.

At borehole location B3 acetone was detected at a concentration of 180 ppb which exceeds the NYSDEC's cleanup criteria for the protection of groundwater quality (110 ppb), but is below the recommended cleanup objective for the protection of human health (200 ppb). At borehole B5; cis and trans isomers of 1,2-dichloroethene, and TCE were found above the NYSDEC cleanup criteria. Cis and trans were detected at concentration of 110,000 ppb and 16,000 ppb respectively. The sampled concentrations of both isomers would easily exceed the NYSDEC cleanup criteria. The NYSDEC cleanup criteria for TCE is 700 ppb for both the protection of groundwater quality and human health. At borehole location B5 the sampled concentration of TCE was 110,000 ppb.

As a result of the data collected, it appears that volatile organic compounds are prevalent in soil across the site and can be found at a wide range of concentration, some areas exceeding recommended cleanup values.

Volatile organic compounds detected in samples from monitoring wells MW1 and MW2 at concentrations which exceed NYSDEC groundwater quality standards include:

- At monitoring well MW1; vinyl chloride at a concentration of 20 ppb and a groundwater quality standard of 2 ppb, and cis at a concentration of 12 ppb and a groundwater quality standard of 5 ppb for the trans isomer of 1,2-dichloroethene.
- At monitoring well MW2; benzene at a concentration of 58 ppb and a groundwater quality standard of .7 ppb, xylene at a concentration of 18 ppb and a groundwater quality standard of 5 ppb, and 1,2,4 TMB at an estimated concentration of 81 ppb and a groundwater quality standard of 5 ppb.

Acetone was not detected in concentrations similar to those previously reported, however, the presence in measurable levels across the site, some in excess of recommended clean up objective is a concern, since the substance is highly soluble in water and will migrate rapidly. The direction of groundwater flow and groundwater quality is influenced by seasonal changes, the amount of source contaminant material available and local conditions such as the affect of sump pumping. It is important to understand that groundwater is not believed to be stagnant or homogenous at this site. It is reasonable to assume that the

groundwater conditions differ from those found in January when the last sampling took place. Given this possible difference in the direction of groundwater flow for example, it is plausible that the groundwater flow containing acetone has changed flow direction and is no longer intersected by the monitoring wells. It is also plausible that acetone will re-appear as a contaminant when the direction of groundwater flow is impacted by seasonal shifts or construction activities.

3.4 Remediation Cost

Based on the sampling results contained herein certain assumptions have been made as to what might be required for remedial activities at the site. The contaminants of concern would include the chlorinated solvents, TCE and PCE, and their breakdown products, cis and trans 1,2-dichloroethene, and vinyl chloride, along with acetone. The presence of these contaminants in the soil or groundwater along with an extended history of use of these substances on site would result in soil or groundwater to be removed from the site to be classified as a listed waste. As the data has suggested the presence of these compounds is ubiquitous across the site, but the concentrations are generally low. Hotspot areas, those areas where contaminant levels exceed human and/or groundwater quality protection criteria, also exist, and appear to be associated with areas where raw and waste materials were located. One large area in particular is the southwest corner of the property along the south fence line, but residual materials can be found in other places for example the white powder found at borehole location B2. In addition, other areas will require remediation, including the following:

- Three underground storage tanks;
- PCB contaminated equipment;
- Contaminated groundwater; and
- Asbestos.

For the purposes of developing a cost for soil remediation activities we have made the following assumptions:

- Soil with chlorinated solvents or their breakdown products at concentrations greater than NYSDEC cleanup criteria will require disposal as a listed hazardous waste. We have estimated a quantity of 2,000 tons.
- Soil having petroleum residuals at concentrations greater than NYSDEC STARS cleanup criteria will be removed as a non-hazardous waste. We have estimated a quantity of 7,500 tons.
- Groundwater will be considered a hazardous waste because of the potential for acetone and other volatile organic compounds to be present. We have estimated a volume of 100,000 gallons requiring disposal.

- Twelve PCB contaminated transformers and 1 switch gear will require disposal.
- 50 tons of PCB contaminated concrete exist at the site.

Figure 2 shows the site area delineated into waste areas. The volume of soil calculated used a depth of 8 feet which appears to be a reasonable estimate of the depth of the fill layer on site. The material in these areas is considered to be contaminated, and unusable for construction. In addition, the soil was considered to be unusable for beneficial re-use. Table 4 shows the costs for remediation. The total cost to remediate the site will be highly dependent on the volume of soil to be remediated and the remedial technique.

3.5 Conclusions

The volatile organic compounds appear to be ubiquitous across the site in both the soil and groundwater. Areas used in the past for the storage of raw and waste materials were found to have soil contamination in excess of NYSDEC soil cleanup criteria. The results show that chlorinated solvents and their breakdown products were the contaminants of concern and were found at boring location B5. The contaminants of concern include TCE, at a concentration of 110,000 ppb, cis, at a concentration of 110,000 ppb and trans at a concentration of 16,000 ppb. Acetone was found at 1 borehole location, B3 at 180 ppb. Petroleum residuals were not found to be significant contaminant.

Contaminants in the groundwater at concentrations greater than the NYSDEC groundwater quality criteria were found at both monitoring well MW1 and MW2 and include the following contaminants:

- Monitoring well MW1; vinyl chloride at a concentration of 20 ppb and cis at a concentration of 12 ppb.
- Monitoring well MW 2; benzene at a concentration of 58 ppb, xylene at a concentration of 18 ppb and 1,2,4 TMB at an estimated concentration of 81 ppb.

The apparent absence of acetone in high concentrations previously reported is not fully understood, but it is demonstrated by the data contained in this report that the presence of acetone may be related to changes in the direction of groundwater flow in the groundwater system. Remediation of the following is anticipated.

- Soil with chlorinated solvents or their breakdown products at concentrations greater than NYSDEC cleanup criteria will require disposal as a listed hazardous waste. We have estimated a quantity of 2,000 tons.

- Soil having petroleum residuals at concentrations greater than NYSDEC STARS cleanup criteria will be removed from the site as a non-hazardous waste. We have estimated a quantity of 7,500 tons.
- Groundwater will be considered a listed hazardous waste because of the potential for acetone and other volatile organic compounds to exist. We have estimated a volume of 100,000 gallons.
- Twelve PCB contaminated transformers and 1 switch gear will required disposal.
- 50 tons of PCB contaminated concrete will require disposal.
- Asbestos must be removed.

TABLE 1

SUMMARY OF VOLATILE ORGANIC VAPOR MEASUREMENTS
FROM SOIL SAMPLES
WEGMANS FOOD MARKETS INC.
601 AMHERST STREET
BUFFALO, NEW YORK

<u>B-1</u>	<u>Sample Interval</u>	<u>PID/FID</u>	<u>B-4</u>	<u>Sample Interval</u>	<u>PID/FID</u>
	1 - 2'	0.0/0.0		1 - 2'	2.0/20
	2 - 4'	0.0/0.0		2 - 4'	2.5/100
	4 - 6'	0.2/30		4 - 6'	1.0/60
	6 - 8'	0.0/20		6 - 8'	.2/90
<u>B-2</u>	<u>Sample Interval</u>	<u>PID/FID</u>	<u>B-5</u>	<u>Sample Interval</u>	<u>PID/FID</u>
	1 - 2'	0.0/0.0		1 - 2'	40/80
	2 - 4'	0.0/0.0		2 - 4'	0.6/8
	4 - 6'	0.0/0.0		4 - 6'	2.0/16
	6 - 8'	0.5/20		6 - 8'	0.0/2.0
<u>B-3</u>	<u>Sample Interval</u>	<u>PID/FID</u>	<u>B-6</u>	<u>Sample Interval</u>	<u>PID/FID</u>
	1 - 2'	0.0/12		1 - 2'	0.0/0.0
	2 - 4'	0.4/7.0		2 - 4'	0.0/100
	4 - 6'	0.0/120		4 - 6'	0.0/30
	6 - 8'	0.6/150		6 - 8'	0.0/2.0

TABLE 2

SOIL SAMPLE RESULTS
WEGMANS FOOD MARKETS, INC.
601 AMHERST STREET
BUFFALO, NEW YORK

<u>COMPOUND</u>	<u>CLEAN UP VALUES</u>	<u>BORING #:</u>	B-1	B-2	B-3	B-4	B-5	B-6
		<u>SAMPLE ID:</u>	B1 S3	B264	B368	B424	B512	
		<u>DEPTH:</u>	<u>4 - 6'</u>	<u>6 - 8'</u>	<u>6 - 8'</u>	<u>2 - 4'</u>	<u>1 - 2'</u>	
Acetone	110/200 (1) (2)		42	21	180 (5)	48	<1,800	12J
2-Butanone	2700		20	<17	94	12	2900B (4)	<15
Cis 1,2-DCE	300		21	33	<14	28	110,000	25
Chlorobenzene	1700		40	2J	<14	<12	<1,800	<15
Trichloroethene	700		11J (3)	29	2J	27	110,000	15
Vinyl Chloride	120/200		<14	<17	3J	46	<1,800	<15
Tetrachloride	1400		<14	<17	<14	24	<1,800	15
1,1 DCE	200		<14	<17	<14	<12	960J	
Trans - 1,2-DCE			<14	<17	<14	<12	16000	3J
Toluene			<14	<17	<14	<12	110J	<15

Notes:

- (1) All concentrations shown in parts per billion
 (2) Clean up value 110/200 = protection of groundwater quality recommended soil clean up objective for human health
 (3) J = Estimated concentration
 (4) B = Contaminant found in laboratory blank sample
 (5) ___ values in bold exceed recommended clean up guidance values

TABLE 3

GROUNDWATER SAMPLE RESULTS
WEGMANS FOOD MARKETS, INC.
601 AMHERST STREET
BUFFALO, NEW YORK

<u>MW-1</u>	<u>GA GW STD (1)</u>	<u>MW-1 8/11/95</u>
Vinyl Chloride	2	20
Acetone	50	4J
CIS-1,2 DCE	5 trans	12
4-Methyl 2 Pentanone	50	4J
Chlorobenzene	5	2J
No TIC's		

<u>MW-2</u>	<u>GA GW STD</u>	<u>MW-2 8/11/95</u>
1,2 DCA	5	2J
Benzene	0.7	58
Xylene	5	18
Acetone	50	<10
Ethylbenzene	5	<10
Library Search		
1,2,4-TMB		81
Ether TIC's		580

Notes:

- (1) All concentrations show in parts per billion
 (2) ____ values in bold exceed recommended clean up



FIGURE 1
SAMPLE LOCATION MAP
601 AMHERST STREET
WEGMANS FOOD MARKETS

Amherst Street

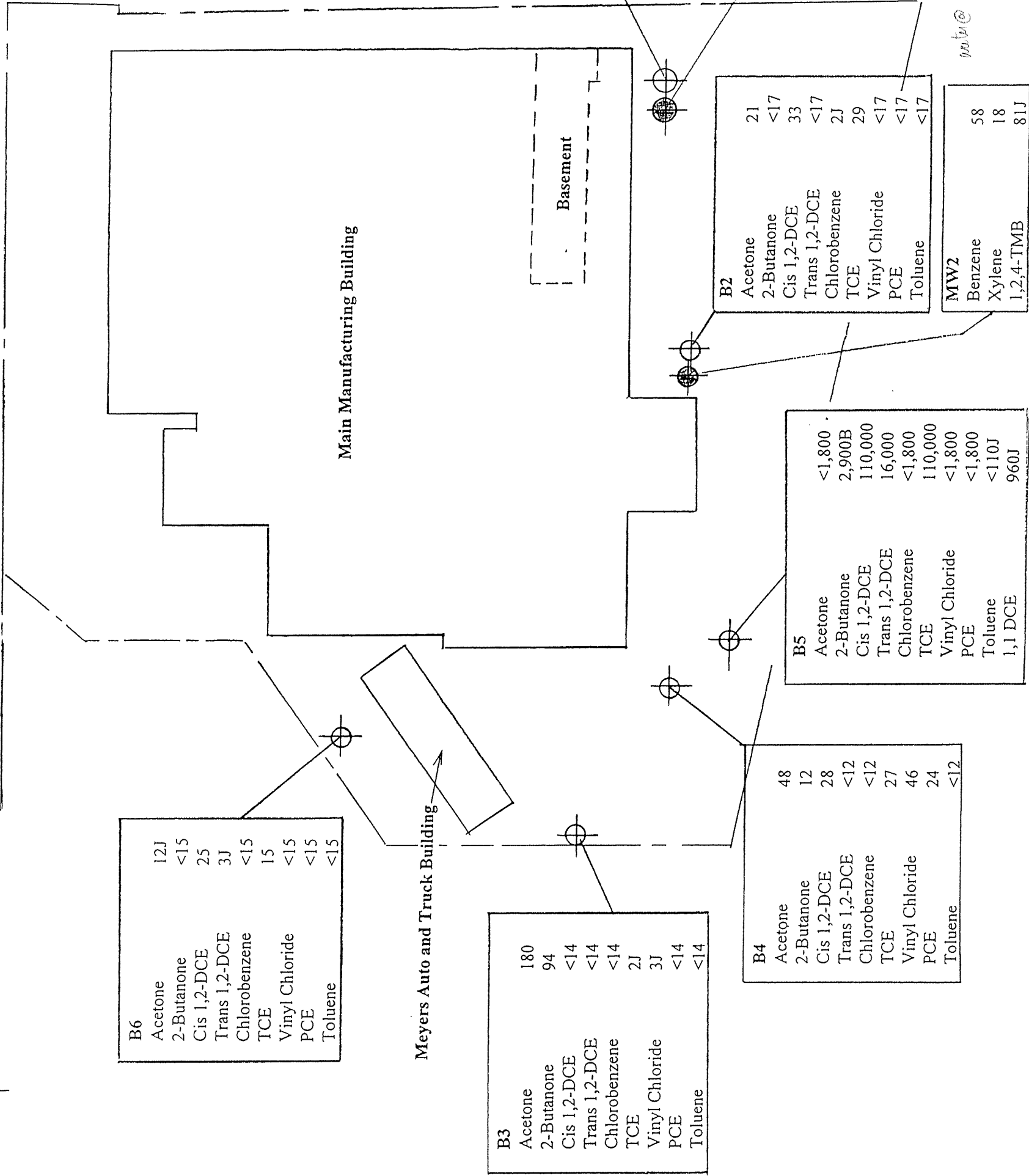
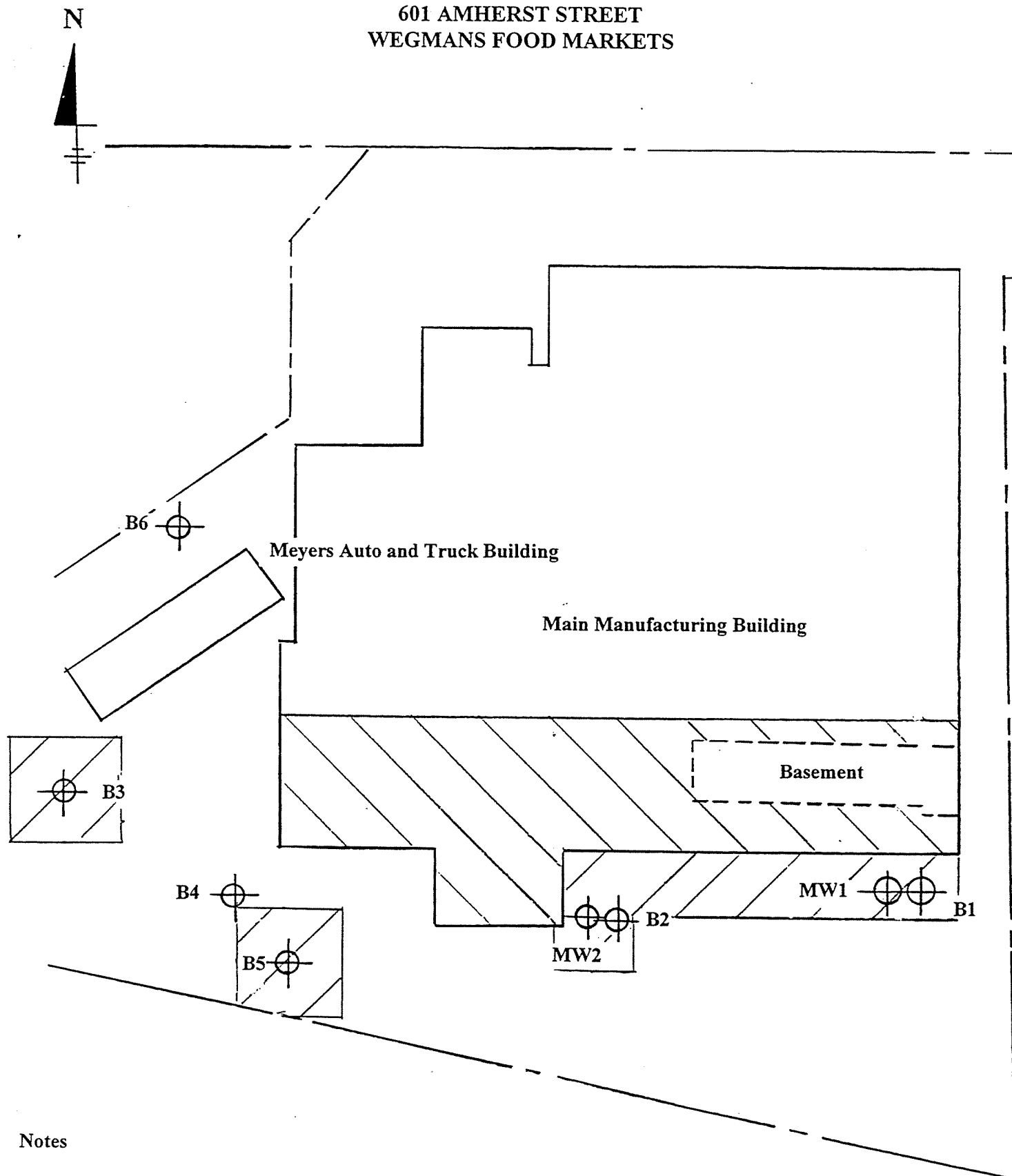


FIGURE 2
SOIL REMEDIATION AREAS
601 AMHERST STREET
WEGMANS FOOD MARKETS



Notes

- //// Possible Area Requiring Hazardous Waste Remediation
- \\\\\\\\ Possible Area Requiring Non-Hazardous Petroleum Waste Remediation

CDM

environmental engineers, scientists,
planners, & management consultants

Appendices

SAMPLE DATA

GENERAL TESTING CORPORATION / CHAIN-OF-CUSTODY RECORD

710 Exchange Street 85 Trinity Place 435 Lawrence Bell Drive GTC Job. No. 8-224
 Rochester, NY 14608 Hackensack, NJ 07601 Amherst, NY 14221-7077 Client Project No. _____

Sample Origination & Shipping Information

Collection Site 601 AMHERST ST (CAMPUS INDUSTRIES)
 Address 601 AMHERST ST, BUFFALO
 Street City State Zip
 Collector PETER VON SCHONBERG Signature Peter von Schenberg
 Print

Bottles Prepared by GTC Rec'd by CLIENT
 Bottles Shipped to Client via CLIENT Seal/Shipping # _____
 Samples Shipped via CLIENT Seal/Shipping # _____

Sample(s) Relinquished by:		Received by:	Date/Time
1. Sign	<u>Peter von Schenberg</u>	1. Sign	<u>8/11/95</u>
for		for	<u>16:55</u>
2. Sign		2. Sign	<u>1 1</u>
for		for	<u>:</u>
3. Sign		3. Sign	<u>1 1</u>
for		for	<u>:</u>

Sample(s) Received in Laboratory by W. Gardner 8/11/95 @ 16:55

	Client I.D. #	Sample Location	*	Analyte or Analyte Group(s) Required (see below for additional)	Sample Prep				Bottle Set(s) (see below)
	Lab #	Date/Time			Preserved	Filtered			
1	MN 2/002	002	W	ASP 91-1	✓				# 1
		8/10/4:35		VOC'S					
2	TRIP BLANK TRIP BLANK	8/11/95	W	ASP 91-1	✓				# 1
		1 1 : 00		VOC'S					
3	Soil Rinse	008	W	ASP 91-1	✓				# 1
	33992	8/11/95 :		VOC'S					
4	B1 S3	B1 4-6 FT	S	ASP 91-1	✓				# 4
	33993	8/11/95 :		VOC'S					
5	B2 6-8	B2 6-8 FT	S	ASP 91-1	✓				# 4
	33994	8/11/95		VOC'S					

Use Bottle No. for indicating type bottles used in each bottle set and fill in box with # of bottles used for each type.

Bottle No.	1	2	3	4	5	6	7	8	9	10	11
Bottle Type	40 ml Vial	Pint Glass	Qt. Glass	4 oz. Plastic	8 oz. Plastic	16 oz. Plastic	Qt. Pl.	Gal. Pl.	Steril. Pl.		
# of each	<u>2</u>			<u>Blank 1</u>							

Additional Analytes _____ 000005

Shaded area for Lab use only; bottom copy for client; maximum of 5 samples per page.

* Source Codes: Monitoring Well (W), Soil (S), Treatment Plant (T), Drinking Water (D), Leachate (L), Hazardous Waste (H),
 (M) (N) (O) (P) (Q) (R) (S) (T) (U) (V) (W) (X) (Y) (Z)

GENERAL TESTING CORPORATION / CHAIN-OF-CUSTODY RECORD

710 Exchange Street 85 Trinity Place 435 Lawrence Bell Drive GTC Job. No. 8-229
 Rochester, NY 14608 Hackensack, NJ 07601 Amherst, NY 14221-7077 Client Project No. _____

Sample Origination & Shipping Information

Collection Site OAKMAN INDUSTRIES
 Address 601 AMARST BLVD

Collector PBTB Von Schendel State NY Zip 14221
 Print Signature

Bottles Prepared by GT/CLIENT Rec'd by PBTB
 Bottles Shipped to Client via CLIENT Seal/Shipping # _____
 Samples Shipped via CLIENT Seal/Shipping # _____

Sample(s) Relinquished by:	Received by:	Date/Time
1. Sign <u>PBTB</u> <u>Von Schendel</u>	1. Sign <u>Tom Haderup</u>	<u>8/11/95</u>
for	for <u>GTC</u>	<u>16:55</u>
2. Sign	2. Sign	
for	for	
3. Sign	3. Sign	
for	for	

Sample(s) Received in Laboratory by DA Guether 8/11/95 @ 16:55

Client I.D. #	Sample Location	*	Analyte or Analyte Group(s) Required (see below for additional)	Sample Prep Preserved Y N	Filtered Y N	Bottle Set(s) (see below)
Lab #	Date/Time					
1	B3 6-8	B3 6-8 FT	S	ASP 91-1	✓	# 10
	33995	8/11/95:		VOC's		
2	B4 2-4	B4 2-4 FT	S	ASP 91-1	✓	# 4
	33996	8/11/95:		VOC's		
3	B5 1-2	B5 1-2 FT	S	ASP 91-1	✓	# 4
	33997	8/11/95:		VOC's		
4	B6 2-4	B6 2-4 FT	S	ASP 91-1	✓	# 10
	33998	8/11/95:		VOC's		
5	B4-2.4	B4 2-4 FT	S	ASP 91-1	✓	# 4
	33999	DUPLICATE		VOC's		

Use Bottle No. for indicating type bottles used in each bottle set and fill in box with # of bottles used for each type.

Bottle No.	1	2	3	4	5	6	7	8	9	10	11
Bottle Type	40 ml Vial	Pint Glass	Qt. Glass	4 oz. Plastic	8 oz. Plastic	16 oz. Plastic	Qt. Pl.	Gal. Pl.	Steril. Pl.	803	
# of each				1						GLASS	

Additional Analytes _____ 000006

Shaded area for Lab use only; bottom copy for client; maximum of 5 samples per page.

* Source Codes: Monitoring Well (W), Soil (S), Treatment Plant (T), Drinking Water (D), Leachate (L), Hazardous Waste (H),
 River or Stream (R), Pond (P), Industrial Discharge (I) (X) (Y)

GENERAL TESTING CORPORATION / CHAIN-OF-CUSTODY RECORD

710 Exchange Street 85 Trinity Place 435 Lawrence Bell Drive GTC Job. No. 8-224
 Rochester, NY 14608 Hackensack, NJ 07601 Amherst, NY 14221-7077 Client Project No. _____

Sample Origination & Shipping Information

Collection Site CAMPUS INDUSTRIES
 Address 601 AMHERST ST. BUFFALO
 Street City State
 Collector Pete von Schondorf Signature Pete von Schondorf
 Print
 Bottles Prepared by GT/CLIENT Rec'd by PVS
 Bottles Shipped to Client via CLIENT Seal/Shipping # _____
 Samples Shipped via CLIENT Seal/Shipping # _____

Sample(s) Relinquished by:	Received by:	Date/Time
1. Sign <u>Pete von Schondorf</u>	1. Sign <u>Tom Hastings</u>	8/11/95
for	for <u>ATC</u>	16:58
2. Sign	2. Sign	/ /
for	for	:
3. Sign	3. Sign	/ /
for	for	:

Sample(s) Received in Laboratory by PH Gardner 8/11/95 @ 16:58

	Client I.D. #	Sample Location	*	Analyte or Analyte Group(s) Required (see below for additional)	Sample Prep				Bottle Set(s) (see below)
	Lab #	Date/Time			Preserved Y N	Filtered Y N			
1	BZ 68	BZ 68 MS/	S	91-1	✓				#1
	QC	8/11/95: MSD		VOC					
2	BZ	BZ	S	To BZ Determination	✓				location on hold as per P. von Schondorf JMS 8/14
		/ / :							
3									
		/ / :							
4									
		/ / :							
5									
		/ / :							

Use Bottle No. for indicating type bottles used in each bottle set and fill in box with # of bottles used for each type.

Bottle No.	1	2	3	4	5	6	7	8	9	10	11
Bottle Type	40 ml Vial	Pint Glass	Qt. Glass	4 oz. Plastic	8 oz. Plastic	16 oz. Plastic	Qt. Pl.	Gal. Pl.	Steril. Pl.		
# of each				1							

Additional Analytes _____ 000007

Shaded area for Lab use only; bottom copy for client; maximum of 5 samples per page.

* Source Codes: Monitoring Well (W), Soil (S), Treatment Plant (T), Drinking Water (D), Leachate (L), Hazardous Waste (H),



A Full Service Environmental Laboratory

August 25, 1995

Mr. Peter von Schondorf
Camp Dresser & McKee
660 Reynolds Arcade
16 East Main Street
Rochester, NY 14614

Re: Campus Industries
Submission #9508000226
SDG #DMW1

Dear Mr. von Schondorf:

Enclosed is an analytical data report for the above referenced facility. A total of five (5) water samples were received by our laboratory on August 11, 1995.

Any problems encountered with this project are addressed in a case narrative section which is presented later in this report.

This report consists of two (2) packages: the sample data summary package and the sample data package. All data presented in these packages has been reviewed prior to report submission. If you should have any questions or concerns, please contact me at (716) 454-3760.

Thank you for your continued use of our services.

Sincerely,

A handwritten signature in cursive script that reads 'Janice M. Jaeger'.

Janice M. Jaeger
Customer Service Representative

enc.

710 Exchange Street • Rochester, NY 14608 • Tele: (716) 454-3760 • (716) 454-1245
85 Trinity Place • Hackensack, NJ 07601 • Tele: (201) 488-5242 • Fax: (201) 488-6386
435 Lawrence Bell Drive • Amherst, NY 14221 • Tele: (716) 634-0454 • Fax: (716) 634-9019
1201 E. Fayette Street, Suite 42 • Syracuse, NY 13210 • Tele: (315) 471-0936 • Fax: (315) 471-0943

SUBMISSION #: 9508000226

SAMPLE DATA SUMMARY PACKAGE

SECTION A: NYSDEC Data Package Summary Forms

SECTION B: SDG Narrative

SECTION C: Sample Data

SECTION D: Surrogate Summary

SECTION E: MS/MSD Data

SECTION F: Blank Data

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ORGANIC QUALIFIERS - 1991

- U - Indicates compound was analyzed for but not detected. The sample quantitation limit must be corrected for dilution and for percent moisture.
- J - Indicates an estimated value. The 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 indicates the presence of a compound that meets the identification criteria but the result is less than the sample quantitation limit but greater than zero.
- N - Indicates presumptive evidence of a compound. This flag is only used for a tentatively identified compound, where the identification is based on a mass spectral library search.
- P - This flag is used for a pesticide/Aroclor target analyte when there is greater than 25% difference for detected concentrations between the two GC Columns. The lower of the two values is reported on Form I and flagged with a "P".
- 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. If a sample or extract is re-analyzed at a higher dilution factor, as in the "E" flag above, the "DL" suffix is appended to the sample number on the Form I for the diluted sample and ALL concentration values reported on that Form I are flagged with the "D" flag.
- A - This flag indicates that a TIC is a suspected aldol-condensation product.
- X - As specified in Case Narrative.

SUBMISSION #: 9508000226

SECTION A

NYSDEC Data Package Summary Forms

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SAMPLE PREPARATION AND ANALYSIS SUMMARY

[illegible]

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SUBMISSION #: 9508000226

SECTION B

SDG NARRATIVE

000005

Case Narrative

Client: CDM
SDG#: DMW1
GTC Job#: 95080226

Volatile Organics

Water samples were analyzed for target compound list volatile organics by Method 91-1 from the NYSASP 1991. The following samples are associated with SDG# DMW1:

RINS1	34050
MW1	34051
MW1MS	34051MS
MW1MSD	34051MSD
DMW1	34052
MW2	34053
TB1	34054
VBLK1	METHOD BLANK 1
VBLK2	METHOD BLANK 2
VBLK1MS	BLANK SPIKE

All Matrix spiking compounds were within limits for recovery in the MS/MSD of MW1 and VBLK1MS. All %RPD were within limits in the MS/MSD of MW1.

All Tuning criteria for BFB were within limits.

All Initial Calibration criteria were compliant.

All Continuing Calibration Check (CCC) criteria were compliant.

All surrogate compounds were within QC limits for recovery.

All internal standard areas were within QC limits.

No other analytical or QC problems were encountered during the analysis of this SDG.

I certify that this data package is in compliance with the terms and conditions of the contract, both technically and for completeness, for other than the conditions detailed

000006

above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or his designee, as verified by the following signature.

Michael K. Perry

Michael K. Perry
Laboratory Director

8/25/95

Date

000007



SUBMISSION #: 950800226

SECTION C

SAMPLE DATA

000008

VOLATILE ORGANICS ANALYSIS DATA SHEET

DMW1

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: 34052

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

Lab File ID: AZ332

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec.

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO.

COMPOUND

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

Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	18.	
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
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	10.	U
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	12.	
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
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	10.	U
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	10.	U
108-90-7-----	Chlorobenzene	2.	J
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	10.	U
95-47-6-----	o-Xylene	10.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

DMW1

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: 34052

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

Lab File ID: AZ332

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec.

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

Number TICs Found: 0

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
2.				
3.				
4.				
5.				
6.				
7.				
8.				
9.				
10.				
11.				
12.				
13.				
14.				
15.				
16.				
17.				
18.				
19.				
20.				
21.				
22.				
23.				
24.				
25.				
26.				
27.				
28.				
29.				
30.				

VOLATILE ORGANICS ANALYSIS DATA SHEET

MW1

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: 34051

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

Lab File ID: AZ326

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec.

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO. COMPOUND CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	20.	
75-00-3-----	Chloroethane	10.	U
75-09-2-----	Methylene chloride	10.	U
67-64-1-----	Acetone	4.	J
75-15-0-----	Carbon Disulfide	10.	U
75-35-4-----	1,1-Dichloroethene	10.	U
75-34-3-----	1,1-Dichloroethane	10.	U
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	10.	U
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	12.	
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
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	4.	J
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	10.	U
108-90-7-----	Chlorobenzene	2.	J
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	10.	U
95-47-6-----	o-Xylene	10.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

LAB SAMPLE NO.

MW1

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: 34051

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

Lab File ID: AZ326

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec.

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

Number TICs Found: 0

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
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10.				
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VOLATILE ORGANICS ANALYSIS DATA SHEET

MW2

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: 34053

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

Lab File ID: AZ333

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec.

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO.

COMPOUND

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

Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	10.	U
75-00-3-----	Chloroethane	10.	U
75-09-2-----	Methylene chloride	10.	U
67-64-1-----	Acetone	10.	U
75-15-0-----	Carbon Disulfide	10.	U
75-35-4-----	1,1-Dichloroethene	10.	U
75-34-3-----	1,1-Dichloroethane	10.	U
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	2.	J
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	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	58.	
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	10.	U
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	10.	U
108-90-7-----	Chlorobenzene	10.	U
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	18.	
95-47-6-----	o-Xylene	10.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

MW2

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: 34053

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

Lab File ID: AZ333

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec.

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

Number TICs Found: 10

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.	Unknown	4.85	170.	J
2. 611-14-3	Benzene, 1-ethyl-2-methyl-	23.43	42.	JN
3. 95-36-3	1,2,4-Trimethylbenzene	23.90	81.	JN
4.	Unknown Aromatic Hydrocarbon	25.30	42.	J
5. 527-84-4	Benzene, 1-methyl-2-(1-methy	26.49	41.	JN
6. 527-84-4	Benzene, 1-methyl-2-(1-methy	26.73	67.	JN
7.	Unknown Aromatic Hydrocarbon	26.89	47.	J
8. 535-77-3	Benzene, 1-methyl-3-(1-methy	27.75	43.	JN
9. 99-87-6	Benzene, 1-methyl-4-(1-methy	27.85	56.	JN
10. 824-22-6	1H-Indene, 2,3-dihydro-4-met	28.81	72.	JN
11.				
12.				
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VOLATILE ORGANICS ANALYSIS DATA SHEET

LAB SAMPLE NO.

RINS1

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: 34050

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

Lab File ID: AZ330

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec.

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO.

COMPOUND

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

Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	10.	U
75-00-3-----	Chloroethane	10.	U
75-09-2-----	Methylene chloride	10.	U
67-64-1-----	Acetone	10.	U
75-15-0-----	Carbon Disulfide	10.	U
75-35-4-----	1,1-Dichloroethene	10.	U
75-34-3-----	1,1-Dichloroethane	10.	U
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	10.	U
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	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
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	10.	U
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	10.	U
108-90-7-----	Chlorobenzene	10.	U
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	10.	U
95-47-6-----	o-Xylene	10.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

RINS1

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: 34050

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

Lab File ID: AZ330

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec.

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

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

Number TICs Found: 0

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
2.				
3.				
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VOLATILE ORGANICS ANALYSIS DATA SHEET

TB1

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: 34054

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

Lab File ID: AZ329

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec.

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO.

COMPOUND

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

Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	10.	U
75-00-3-----	Chloroethane	10.	U
75-09-2-----	Methylene chloride	10.	U
67-64-1-----	Acetone	10.	U
75-15-0-----	Carbon Disulfide	10.	U
75-35-4-----	1,1-Dichloroethene	10.	U
75-34-3-----	1,1-Dichloroethane	10.	U
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	10.	U
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	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
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	10.	U
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	10.	U
108-90-7-----	Chlorobenzene	10.	U
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	10.	U
95-47-6-----	o-Xylene	10.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

TB1

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1-

Matrix: (soil/water) WATER

Lab Sample ID: 34054

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

Lab File ID: AZ329

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec.

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

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

Number TICs Found: 0

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
2.				
3.				
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SUBMISSION #: 9508000226

SECTION D

SURROGATE SUMMARY

WATER VOLATILE SYSTEM MONITORING COMPOUND RECOVERY

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

	EPA SAMPLE NO.	SMC1 (TOL) #	SMC2 (BFB) #	SMC3 (DCE) #	OTHER	TOT OUT
	=====	=====	=====	=====	=====	=====
01	DMW1	98	104	102		0
02	MW1	100	102	102		0
03	MW1MS	100	104	104		0
04	MW1MSD	102	104	106		0
05	MW2	96	110	110		0
06	RINS1	100	102	106		0
07	TB1	102	102	104		0
08	VBLK1	104	98	96		0
09	VBLK1MS	100	98	96		0
10	VBLK2	100	100	100		0
11						
12						
13						
14						
15						
16						
17						
18						
19						
20						
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22						
23						
24						
25						
26						
27						
28						
29						
30						

QC LIMITS

SMC1 (TOL) = Toluene-d8 (88-110)

SMC2 (BFB) = Bromofluorobenzene (86-115)

SMC3 (DCE) = 1,2-Dichloroethane-d4 (76-114)

Column to be used to flag recovery values

* Values outside of contract required QC limits

D System Monitoring Compound diluted out



SUBMISSION #: 9508000226

SECTION E

MS/MSD

000021

WATER VOLATILE MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145 Case No.:

SAS No.:

SDG No.: DMW1

Matrix Spike - EPA Sample No.:

MW1

COMPOUND	SPIKE ADDED (ug/L)	SAMPLE CONCENTRATION (ug/L)	MS CONCENTRATION (ug/L)	MS % REC #	QC. LIMITS REC.
1,1-Dichloroethene	50.	0.	55.	110	61-145
Trichloroethene	50.	0.	48.	96	71-120
Benzene	50.	0.	49.	98	76-127
Toluene	50.	0.	49.	98	76-125
Chlorobenzene	50.	2.	52.	100	75-130

COMPOUND	SPIKE ADDED (ug/L)	MSD CONCENTRATION (ug/L)	MSD % REC #	% RPD #	QC LIMITS RPD REC.
1,1-Dichloroethene	50.	55.	110	0	14 61-145
Trichloroethene	50.	47.	94	2	14 71-120
Benzene	50.	50.	100	2	11 76-127
Toluene	50.	51.	102	4	13 76-125
Chlorobenzene	50.	53.	102	2	13 75-130

Column to be used to flag recovery and RPD values with an asterisk

* Values outside of QC limits

RPD: 0 out of 5 outside limits

Spike Recovery: 0 out of 10 outside limits

COMMENTS:

VOLATILE ORGANICS ANALYSIS DATA SHEET

MW1MS

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: 34051MS

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

Lab File ID: AZ327

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec.

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO. COMPOUND CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	20.	
75-00-3-----	Chloroethane	10.	U
75-09-2-----	Methylene chloride	10.	U
67-64-1-----	Acetone	3.	J
75-15-0-----	Carbon Disulfide	10.	U
75-35-4-----	1,1-Dichloroethene	55.	
75-34-3-----	1,1-Dichloroethane	10.	U
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	10.	U
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	12.	
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	48.	
124-48-1-----	Dibromochloromethane	10.	U
79-00-5-----	1,1,2-Trichloroethane	10.	U
71-43-2-----	Benzene	49.	
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	10.	U
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	49.	
108-90-7-----	Chlorobenzene	52.	
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	10.	U
95-47-6-----	o-Xylene	10.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

MW1MSD

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: 34051MSD

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

Lab File ID: AZ328

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec.

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO. COMPOUND CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	19.	
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	55.	
75-34-3-----	1,1-Dichloroethane	10.	U
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	10.	U
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	12.	
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	47.	
124-48-1-----	Dibromochloromethane	10.	U
79-00-5-----	1,1,2-Trichloroethane	10.	U
71-43-2-----	Benzene	50.	
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	10.	U
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	51.	
108-90-7-----	Chlorobenzene	53.	
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	10.	U
95-47-6-----	o-Xylene	10.	U

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145 Case No.:

SAS No.:

SDG No.: DMW1

x Spike - EPA Sample No.: VBLK1

COMPOUND	SPIKE ADDED (ug/L)	SAMPLE CONCENTRATION (ug/L)	MS CONCENTRATION (ug/L)	MS % REC #	QC. LIMITS REC.
1,1-Dichloroethene	50.	0.	56.	112	61-145
Trichloroethene	50.	0.	45.	90	71-120
Benzene	50.	0.	49.	98	76-127
Toluene	50.	0.	49.	98	76-125
Chlorobenzene	50.	0.	50.	100	75-130

Column to be used to flag recovery and RPD values with an asterisk

* Values outside of QC limits

RPD: 0 out of 0 outside limits

Spike Recovery: 0 out of 5 outside limits

COMMENTS:

VOLATILE ORGANICS ANALYSIS DATA SHEET

VBLK1MS

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: VBLK1MS

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

Lab File ID: AZ296

Level: (low/med) LOW

Date Received: / /

% Moisture: not dec.

Date Analyzed: 8/14/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO.

COMPOUND

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

Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	10.	U
75-00-3-----	Chloroethane	10.	U
75-09-2-----	Methylene chloride	10.	U
67-64-1-----	Acetone	10.	U
75-15-0-----	Carbon Disulfide	10.	U
75-35-4-----	1,1-Dichloroethene	56.	
75-34-3-----	1,1-Dichloroethane	10.	U
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	10.	U
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	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	45.	
124-48-1-----	Dibromochloromethane	10.	U
79-00-5-----	1,1,2-Trichloroethane	10.	U
71-43-2-----	Benzene	49.	
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	10.	U
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	49.	
108-90-7-----	Chlorobenzene	50.	
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	10.	U
95-47-6-----	o-Xylene	10.	U



SUBMISSION #: 9508000226

SECTION F

BLANK DATA

000027

VOLATILE METHOD BLANK SUMMARY

VBLK1

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145

Case No.:

SAS No.:

SDG No.:DMW1

Lab File ID:AZ293

Lab Sample ID:VBLK1

Date Analyzed: 8/14/95

Time Analyzed:1902

GC Column:RTX-502

ID: 0.53 (mm)

Heated Purge: (Y/N) N

Instrument ID:MS#1

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS, AND MSD:

	EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	TIME ANALYZED
01	VBLK1MS	VBLK1MS	AZ296	2124
02				
03				
04				
05				
06				
07				
08				
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COMMENTS:

VOLATILE ORGANICS ANALYSIS DATA SHEET

VBLK1

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: VBLK1

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

Lab File ID: AZ293

Level: (low/med) LOW

Date Received: / /

% Moisture: not dec.

Date Analyzed: 8/14/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO. COMPOUND CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/L Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	10.	U
75-00-3-----	Chloroethane	10.	U
75-09-2-----	Methylene chloride	10.	U
67-64-1-----	Acetone	10.	U
75-15-0-----	Carbon Disulfide	10.	U
75-35-4-----	1,1-Dichloroethene	10.	U
75-34-3-----	1,1-Dichloroethane	10.	U
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	10.	U
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	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
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	10.	U
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	10.	U
108-90-7-----	Chlorobenzene	10.	U
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	10.	U
95-47-6-----	o-Xylene	10.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

VBK1

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145

Case No.:

SAS No.:

SDG No.:DMW1

Matrix: (soil/water) WATER

Lab Sample ID:VBK1

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

Lab File ID: AZ293

Level: (low/med) LOW

Date Received: / /

% Moisture: not dec.

Date Analyzed: 8/14/95

GC Column:RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume:0

(uL)

Soil Aliquot Volume:0

(uL)

Number TICs Found: 0

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
2.				
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VOLATILE METHOD BLANK SUMMARY

VBLK2

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145

Case No.:

SAS No.:

SDG No.:DMW1

Lab File ID:AZ321

Lab Sample ID:VBLK2

Date Analyzed: 8/15/95

Time Analyzed:2109

GC Column:RTX-502

ID: 0.53 (mm)

Heated Purge: (Y/N) N

Instrument ID:MS#1

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS, AND MSD:

	EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	TIME ANALYZED
01	DMW1	34052	AZ332	0444
02	MW1	34051	AZ326	0048
03	MW1MS	34051MS	AZ327	0121
04	MW1MSD	34051MSD	AZ328	0157
05	MW2	34053	AZ333	0525
06	RINS1	34050	AZ330	0322
07	TB1	34054	AZ329	0240
08				
09				
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COMMENTS:

000031

VOLATILE ORGANICS ANALYSIS DATA SHEET

VBLK2

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: VBLK2

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

Lab File ID: AZ321

Level: (low/med) LOW

Date Received: / /

% Moisture: not dec.

Date Analyzed: 8/15/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO.

COMPOUND

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

Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	10.	U
75-00-3-----	Chloroethane	10.	U
75-09-2-----	Methylene chloride	10.	U
67-64-1-----	Acetone	10.	U
75-15-0-----	Carbon Disulfide	10.	U
75-35-4-----	1,1-Dichloroethene	10.	U
75-34-3-----	1,1-Dichloroethane	10.	U
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	10.	U
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	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
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	10.	U
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	10.	U
108-90-7-----	Chlorobenzene	10.	U
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	10.	U
95-47-6-----	o-Xylene	10.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

VBK2

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

Matrix: (soil/water) WATER

Lab Sample ID: VBK2

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

Lab File ID: AZ321

Level: (low/med) LOW

Date Received: / /

% Moisture: not dec.

Date Analyzed: 8/15/95

GC Column: RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0 (uL)

Soil Aliquot Volume: 0 (uL)

Number TICs Found: 0

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
2.				
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VOLATILE INTERNAL STANDARD AREA AND RT SUMMARY

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145

Case No.:

SAS No.:

SDG No.:DMW1

File ID (Standard):AZ292

Date Analyzed: 8/14/95

Instrument ID:MS#1

Time Analyzed:1817

GC Column:RTX-502

ID: 0.53 (mm)

Heated Purge: (Y/N) N

	IS1(BCM) AREA #	RT #	IS2(DFB) AREA #	RT #	IS3(CBZ) AREA #	RT #
=====	=====	=====	=====	=====	=====	=====
12 HOUR STD	70477	9.14	291850	11.87	218251	18.68
UPPER LIMIT	140954	9.64	583700	12.37	436502	19.18
LOWER LIMIT	35239	8.64	145925	11.37	109126	18.18
=====	=====	=====	=====	=====	=====	=====
EPA SAMPLE NO.						
=====	=====	=====	=====	=====	=====	=====
01 VBLK1	70143	9.04	297849	11.80	214184	18.65
02 VBLK1MS	70348	8.99	298858	11.81	219342	18.71
03						
04						
05						
06						
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17						
18						
19						
20						
21						
22						

IS1 (BCM) = Bromochloromethane
 IS2 (DFB) = 1,4-Difluorobenzene
 IS3 (CBZ) = Chlorobenzene-d5

AREA UPPER LIMIT = +100% of internal standard area
 AREA LOWER LIMIT = - 50% of internal standard area
 RT UPPER LIMIT = +0.50 minutes of internal standard RT
 RT LOWER LIMIT = -0.50 minutes of internal standard RT

Column used to flag values outside of QC limits with an asterisk.
 * Values outside of QC limits.

VOLATILE INTERNAL STANDARD AREA AND RT SUMMARY

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: DMW1

File ID (Standard): AZ320

Date Analyzed: 8/15/95

Instrument ID: MS#1

Time Analyzed: 2015

GC Column: RTX-502

ID: 0.53 (mm)

Heated Purge: (Y/N) N

	IS1(BCM) AREA #	RT #	IS2(DFB) AREA #	RT #	IS3(CBZ) AREA #	RT #
=====	=====	=====	=====	=====	=====	=====
12 HOUR STD	79692	9.04	320965	11.88	254414	18.71
UPPER LIMIT	159384	9.54	641930	12.38	508828	19.21
LOWER LIMIT	39846	8.54	160483	11.38	127207	18.21
=====	=====	=====	=====	=====	=====	=====
EPA SAMPLE NO.						
=====	=====	=====	=====	=====	=====	=====
01 VBLK2	79635	9.05	335119	11.83	259170	18.63
02 MW1	73342	8.89	310459	11.67	229002	18.63
03 MW1MS	69721	8.93	303288	11.70	231471	18.54
04 MW1MSD	66916	9.01	293089	11.78	216650	18.61
05 TB1	71759	8.89	302970	11.64	220846	18.60
06 RINS1	74050	8.87	310945	11.63	232961	18.47
07 DMW1	74829	9.00	302244	11.74	240380	18.49
08 MW2	69568	8.99	288720	11.75	219583	18.53
09						
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19						
20						
21						
22						

IS1 (BCM) = Bromochloromethane
 IS2 (DFB) = 1,4-Difluorobenzene
 IS3 (CBZ) = Chlorobenzene-d5

AREA UPPER LIMIT = +100% of internal standard area
 AREA LOWER LIMIT = - 50% of internal standard area
 RT UPPER LIMIT = +0.50 minutes of internal standard RT
 RT LOWER LIMIT = -0.50 minutes of internal standard RT

Column used to flag values outside of QC limits with an asterisk.
 * Values outside of QC limits.



A Full Service Environmental Laboratory

August 29, 1995

Mr. Peter von Schondorf
Camp Dresser & McKee
660 Reynolds Arcade
16 East Main Street
Rochester, NY 14614

Re: Campus Industries
Submission #9508000224
SDG #B1S3

Dear Mr. von Schondorf:

Enclosed is an analytical data report for the above referenced facility. A total of seven (7) soil samples and one (1) water sample were received by our laboratory on August 11, 1995.

Any problems encountered with this project are addressed in a case narrative section which is presented later in this report.

This report consists of two (2) packages: the sample data summary package and the sample data package. All data presented in these packages has been reviewed prior to report submission. If you should have any questions or concerns, please contact me at (716) 454-3760.

Thank you for your continued use of our services.

Sincerely,

A handwritten signature in cursive script, appearing to read 'Janice M. Jaeger', is written over the typed name.

Janice M. Jaeger
Customer Service Representative

SUBMISSION #: 9508000224

SAMPLE DATA SUMMARY PACKAGE

- SECTION A: NYSDEC Data Package Summary Forms**
- SECTION B: SDG Narrative**
- SECTION C: Sample Data**
- SECTION D: Surrogate Summary**
- SECTION E: MS/MSD Data**
- SECTION F: Blank Data**

SUBMISSION #: 9508000224

SECTION A

NYSDEC Data Package Summary Forms

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SAMPLE IDENTIFICATION AND ANALYTICAL REQUIREMENT SUMMARY

Check Appropriate Boxes

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VOA
ANALYSES

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SUBMISSION #: 9508000224

SECTION B

SDG NARRATIVE

000004

CASE NARRATIVE

COMPANY: Camp, Dresser, & McKee
Project: Campus Industries
SUBMISSION #: 9508000224

Camp, Dresser, & McKee soil samples and rinsate blank were collected on 8/11/95 and received by GTC on 8/11/95 in good condition.

VOLATILE ORGANICS

Camp, Dresser, & McKee samples were analyzed for the target compound list of volatile organics using NYSDEC ASP Method 91-1.

All initial and continuing calibration criteria were met.

All surrogate standard recoveries were within QC limits.

All internal standard recoveries were within QC limits except for IS1 and IS3 in B268 and IS3 in B268MS and B268MSD.

The Laboratory Blanks were free of contamination except for 2-Butanone found in the medium level blank VBLK4.

All required analysis holding times were met.

No analytical or QC problems were encountered.

I certify that this data package is in compliance with the terms and conditions of the contract, both technically and for completeness, for other than the conditions detailed above. Release of the data contained in this hard copy data package has been authorized by the Laboratory Manager or his designee, as verified by the following signature.



Michael K. Perry
Laboratory Director

8/29/95

Date

000005

SUBMISSION #: 950800224

SECTION C

SAMPLE DATA

000006

VOLATILE ORGANICS ANALYSIS DATA SHEET

B1S3

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3-

Matrix: (soil/water) SOIL

Lab Sample ID: 33993

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5515

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec. 26

Date Analyzed: 8/16/95

C Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

oil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO. COMPOUND CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/KG Q

74-87-3-----	Chloromethane	14.	U
74-83-9-----	Bromomethane	14.	U
75-01-4-----	Vinyl chloride	14.	U
75-00-3-----	Chloroethane	14.	U
75-09-2-----	Methylene chloride	2.	J
67-64-1-----	Acetone	42.	
75-15-0-----	Carbon Disulfide	14.	U
75-35-4-----	1,1-Dichloroethene	14.	U
75-34-3-----	1,1-Dichloroethane	14.	U
156-60-5-----	trans-1,2-Dichloroethene	2.	J
67-66-3-----	Chloroform	14.	U
107-06-2-----	1,2-Dichloroethane	14.	U
78-93-3-----	2-Butanone	20.	
156-59-2-----	cis-1,2-Dichloroethene	21.	
71-55-6-----	1,1,1-Trichloroethane	14.	U
56-23-5-----	Carbon tetrachloride	14.	U
75-27-4-----	Bromodichloromethane	14.	U
78-87-5-----	1,2-Dichloropropane	14.	U
10061-01-5-----	cis-1,3-Dichloropropene	14.	U
79-01-6-----	Trichloroethene	11.	J
124-48-1-----	Dibromochloromethane	14.	U
79-00-5-----	1,1,2-Trichloroethane	14.	U
71-43-2-----	Benzene	14.	U
50061-02-6-----	trans-1,3-Dichloropropene	14.	U
75-25-2-----	Bromoform	14.	U
108-10-1-----	4-Methyl-2-Pentanone	14.	U
591-78-6-----	2-Hexanone	14.	U
127-18-4-----	Tetrachloroethene	14.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	14.	U
108-88-3-----	Toluene	14.	U
108-90-7-----	Chlorobenzene	40.	
100-41-4-----	Ethylbenzene	14.	U
100-42-5-----	Styrene	14.	U
108-38-3-----	(m+p)Xylene	14.	U
95-47-6-----	o-Xylene	14.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

LAB SAMPLE NO.

B1S3

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) SOIL

Lab Sample ID: 33993

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5515

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec. 26

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

Number TICs Found: 0

CONCENTRATION UNITS:

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		0.00	0.	
2.		0.00	0.	
3.				
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VOLATILE ORGANICS ANALYSIS DATA SHEET

B268

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3-

Matrix: (soil/water) SOIL

Lab Sample ID: 33994

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5505

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec. 41

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO.

COMPOUND

CONCENTRATION UNITS:

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

Q

74-87-3-----	Chloromethane	17.	U
74-83-9-----	Bromomethane	17.	U
75-01-4-----	Vinyl chloride	17.	U
75-00-3-----	Chloroethane	17.	U
75-09-2-----	Methylene chloride	3.	J
67-64-1-----	Acetone	21.	
75-15-0-----	Carbon Disulfide	17.	U
75-35-4-----	1,1-Dichloroethene	17.	U
75-34-3-----	1,1-Dichloroethane	17.	U
156-60-5-----	trans-1,2-Dichloroethene	4.	J
67-66-3-----	Chloroform	17.	U
107-06-2-----	1,2-Dichloroethane	17.	U
78-93-3-----	2-Butanone	17.	U
156-59-2-----	cis-1,2-Dichloroethene	33.	
71-55-6-----	1,1,1-Trichloroethane	17.	U
56-23-5-----	Carbon tetrachloride	17.	U
75-27-4-----	Bromodichloromethane	17.	U
78-87-5-----	1,2-Dichloropropane	17.	U
10061-01-5-----	cis-1,3-Dichloropropene	17.	U
79-01-6-----	Trichloroethene	29.	
124-48-1-----	Dibromochloromethane	17.	U
79-00-5-----	1,1,2-Trichloroethane	17.	U
71-43-2-----	Benzene	3.	J
50061-02-6-----	trans-1,3-Dichloropropene	17.	U
75-25-2-----	Bromoform	17.	U
108-10-1-----	4-Methyl-2-Pentanone	17.	U
591-78-6-----	2-Hexanone	17.	U
127-18-4-----	Tetrachloroethene	17.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	17.	U
108-88-3-----	Toluene	2.	J
108-90-7-----	Chlorobenzene	2.	J
100-41-4-----	Ethylbenzene	3.	J
100-42-5-----	Styrene	17.	U
108-38-3-----	(m+p)Xylene	8.	J
95-47-6-----	o-Xylene	17.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

B268

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3-

Matrix: (soil/water) SOIL

Lab Sample ID: 33994

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5505

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec. 41

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

Number TICs Found: 10

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		0.00	0.	
2.		0.00	0.	
3.	Unknown Hydrocarbon	19.46	18.	J
4.	Unknown Aromatic Hydrocarbon	21.48	15.	J
5.	Unknown Hydrocarbon	22.62	14.	J
6.	Unknown Hydrocarbon	24.39	21.	J
7.	Unknown Aromatic Hydrocarbon	24.59	20.	J
8.	Unknown Aromatic Hydrocarbon	25.97	27.	J
9.	Unknown Hydrocarbon	27.15	45.	J
10.	Unknown Hydrocarbon	27.45	14.	J
11.	Unknown	28.12	15.	J
12.	Unknown Hydrocarbon	28.97	19.	J
13.				
14.				
15.				
16.				
17.				
18.				
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VOLATILE ORGANICS ANALYSIS DATA SHEET

B368

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3-

Matrix: (soil/water) SOIL

Lab Sample ID: 33995

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5516

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec. 26

Date Analyzed: 8/16/95

GC Column: RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0 (uL)

Soil Aliquot Volume: 0 (uL)

CAS NO.

COMPOUND

CONCENTRATION UNITS:

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

Q

74-87-3-----	Chloromethane	14.	U
74-83-9-----	Bromomethane	14.	U
75-01-4-----	Vinyl chloride	3.	J
75-00-3-----	Chloroethane	14.	U
75-09-2-----	Methylene chloride	14.	U
67-64-1-----	Acetone	180.	
75-15-0-----	Carbon Disulfide	14.	U
75-35-4-----	1,1-Dichloroethene	14.	U
75-34-3-----	1,1-Dichloroethane	14.	U
156-60-5-----	trans-1,2-Dichloroethene	14.	U
67-66-3-----	Chloroform	14.	U
107-06-2-----	1,2-Dichloroethane	14.	U
78-93-3-----	2-Butanone	94.	
156-59-2-----	cis-1,2-Dichloroethene	14.	U
71-55-6-----	1,1,1-Trichloroethane	14.	U
56-23-5-----	Carbon tetrachloride	14.	U
75-27-4-----	Bromodichloromethane	14.	U
78-87-5-----	1,2-Dichloropropane	14.	U
10061-01-5-----	cis-1,3-Dichloropropene	14.	U
79-01-6-----	Trichloroethene	2.	J
124-48-1-----	Dibromochloromethane	14.	U
79-00-5-----	1,1,2-Trichloroethane	14.	U
71-43-2-----	Benzene	14.	U
50061-02-6-----	trans-1,3-Dichloropropene	14.	U
75-25-2-----	Bromoform	14.	U
108-10-1-----	4-Methyl-2-Pentanone	14.	U
591-78-6-----	2-Hexanone	14.	U
127-18-4-----	Tetrachloroethene	14.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	14.	U
108-88-3-----	Toluene	14.	U
108-90-7-----	Chlorobenzene	14.	U
100-41-4-----	Ethylbenzene	14.	U
100-42-5-----	Styrene	14.	U
108-38-3-----	(m+p)Xylene	14.	U
95-47-6-----	o-Xylene	14.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

B368

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3-

Matrix: (soil/water) SOIL

Lab Sample ID: 33995

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5516

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec. 26

Date Analyzed: 8/16/95

GC Column: RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0 (uL)

Soil Aliquot Volume: 0 (uL)

Number TICs Found: 0

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		0.00	0.	
2.				
3.				
4.				
5.				
6.				
7.				
8.				
9.				
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VOLATILE ORGANICS ANALYSIS DATA SHEET

B424

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145

Case No.:

SAS No.:

SDG No.:B1S3-

Matrix: (soil/water) SOIL

Lab Sample ID:33996

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5517

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec. 20

Date Analyzed: 8/16/95

GC Column:RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume:0

(uL)

Soil Aliquot Volume:0

(uL)

CONCENTRATION UNITS:

CAS NO.

COMPOUND

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

Q

74-87-3-----	Chloromethane	12.	U
74-83-9-----	Bromomethane	12.	U
75-01-4-----	Vinyl chloride	33.	
75-00-3-----	Chloroethane	12.	U
75-09-2-----	Methylene chloride	1.	J
67-64-1-----	Acetone	48.	
75-15-0-----	Carbon Disulfide	12.	U
75-35-4-----	1,1-Dichloroethene	12.	U
75-34-3-----	1,1-Dichloroethane	12.	U
156-60-5-----	trans-1,2-Dichloroethene	2.	J
67-66-3-----	Chloroform	12.	U
107-06-2-----	1,2-Dichloroethane	12.	U
78-93-3-----	2-Butanone	12.	
156-59-2-----	cis-1,2-Dichloroethene	11.	J
71-55-6-----	1,1,1-Trichloroethane	12.	U
56-23-5-----	Carbon tetrachloride	12.	U
75-27-4-----	Bromodichloromethane	12.	U
78-87-5-----	1,2-Dichloropropane	12.	U
10061-01-5-----	cis-1,3-Dichloropropene	12.	U
79-01-6-----	Trichloroethene	7.	J
124-48-1-----	Dibromochloromethane	12.	U
79-00-5-----	1,1,2-Trichloroethane	12.	U
71-43-2-----	Benzene	12.	U
50061-02-6-----	trans-1,3-Dichloropropene	12.	U
75-25-2-----	Bromoform	12.	U
108-10-1-----	4-Methyl-2-Pentanone	12.	U
591-78-6-----	2-Hexanone	12.	U
127-18-4-----	Tetrachloroethene	8.	J
79-34-5-----	1,1,2,2-Tetrachloroethane	12.	U
108-88-3-----	Toluene	12.	U
108-90-7-----	Chlorobenzene	12.	U
100-41-4-----	Ethylbenzene	12.	U
100-42-5-----	Styrene	12.	U
108-38-3-----	(m+p)Xylene	12.	U
95-47-6-----	o-Xylene	12.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

B424

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3-

Matrix: (soil/water) SOIL

Lab Sample ID: 33996

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5517

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec. 20

Date Analyzed: 8/16/95

GC Column: RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0 (uL)

Soil Aliquot Volume: 0 (uL)

Number TICs Found: 1

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		0.00	0.	
2.		0.00	0.	
3.	Unknown	24.56	5.1	J
4.				
5.				
6.				
7.				
8.				
9.				
10.				
11.				
12.				
13.				
14.				
15.				
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VOLATILE ORGANICS ANALYSIS DATA SHEET

LAB SAMPLE NO.

B512

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

matrix: (soil/water) SOIL

Lab Sample ID: 33997

Sample wt/vol: 4.00 (g/ml) G

Lab File ID: AZ351

Level: (low/med) MED

Date Received: 8/11/95

% Moisture: not dec. 29

Date Analyzed: 8/17/95

GC Column: RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 10000.00 (uL)

Soil Aliquot Volume: 100.0 (uL)

CAS NO.

COMPOUND

CONCENTRATION UNITS:

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

Q

74-87-3-----	Chloromethane	1800.	U
74-83-9-----	Bromomethane	1800.	U
75-01-4-----	Vinyl chloride	1800.	U
75-00-3-----	Chloroethane	1800.	U
75-09-2-----	Methylene chloride	1800.	U
67-64-1-----	Acetone	1800.	U
75-15-0-----	Carbon Disulfide	1800.	U
75-35-4-----	1,1-Dichloroethene	960.	J
75-34-3-----	1,1-Dichloroethane	1800.	U
156-60-5-----	trans-1,2-Dichloroethene	16000.	
67-66-3-----	Chloroform	1800.	U
107-06-2-----	1,2-Dichloroethane	1800.	U
78-93-3-----	2-Butanone	2900.	B
156-59-2-----	cis-1,2-Dichloroethene	110000.	
71-55-6-----	1,1,1-Trichloroethane	1800.	U
56-23-5-----	Carbon tetrachloride	1800.	U
75-27-4-----	Bromodichloromethane	1800.	U
78-87-5-----	1,2-Dichloropropane	1800.	U
10061-01-5-----	cis-1,3-Dichloropropene	1800.	U
79-01-6-----	Trichloroethene	110000.	
124-48-1-----	Dibromochloromethane	1800.	U
79-00-5-----	1,1,2-Trichloroethane	1800.	U
71-43-2-----	Benzene	1800.	U
50061-02-6-----	trans-1,3-Dichloropropene	1800.	U
75-25-2-----	Bromoform	1800.	U
108-10-1-----	4-Methyl-2-Pentanone	1800.	U
591-78-6-----	2-Hexanone	1800.	U
127-18-4-----	Tetrachloroethene	1800.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	1800.	U
108-88-3-----	Toluene	110.	J
108-90-7-----	Chlorobenzene	1800.	U
100-41-4-----	Ethylbenzene	1800.	U
100-42-5-----	Styrene	1800.	U
108-38-3-----	(m+p)Xylene	1800.	U
95-47-6-----	o-Xylene	1800.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

B512

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3-

Matrix: (soil/water) SOIL

Lab Sample ID: 33997

Sample wt/vol: 4.00 (g/ml) G

Lab File ID: AZ351

Level: (low/med) MED

Date Received: 8/11/95

% Moisture: not dec. 29

Date Analyzed: 8/17/95

GC Column: RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 10000.00 (uL)

Soil Aliquot Volume: 100.0 (uL)

Number TICs Found: 0

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
2.				
3.				
4.				
5.				
6.				
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27.				
28.				
29.				
30.				

VOLATILE ORGANICS ANALYSIS DATA SHEET

LAB SAMPLE NO.

B512DL

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145

Case No.:

SAS No.:

SDG No.:B1S3

matrix: (soil/water) SOIL

Lab Sample ID:33997DL

Sample wt/vol: 4.00 (g/ml) G

Lab File ID: AZ354

Level: (low/med) MED

Date Received: 8/11/95

% Moisture: not dec. 29

Date Analyzed: 8/17/95

GC Column:RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume:10000.00 (uL)

Soil Aliquot Volume: 20.0 (uL)

CAS NO. COMPOUND CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/KG Q

74-87-3-----	Chloromethane	8800.	U
74-83-9-----	Bromomethane	8800.	U
75-01-4-----	Vinyl chloride	8800.	U
75-00-3-----	Chloroethane	8800.	U
75-09-2-----	Methylene chloride	8800.	U
67-64-1-----	Acetone	8800.	U
75-15-0-----	Carbon Disulfide	8800.	U
75-35-4-----	1,1-Dichloroethene	8800.	U
75-34-3-----	1,1-Dichloroethane	8800.	U
156-60-5-----	trans-1,2-Dichloroethene	15000.	D
67-66-3-----	Chloroform	8800.	U
107-06-2-----	1,2-Dichloroethane	8800.	U
78-93-3-----	2-Butanone	6000.	DJB
156-59-2-----	cis-1,2-Dichloroethene	100000.	D
71-55-6-----	1,1,1-Trichloroethane	8800.	U
56-23-5-----	Carbon tetrachloride	8800.	U
75-27-4-----	Bromodichloromethane	8800.	U
78-87-5-----	1,2-Dichloropropane	8800.	U
10061-01-5-----	cis-1,3-Dichloropropene	8800.	U
79-01-6-----	Trichloroethene	110000.	D
124-48-1-----	Dibromochloromethane	8800.	U
79-00-5-----	1,1,2-Trichloroethane	8800.	U
71-43-2-----	Benzene	8800.	U
50061-02-6-----	trans-1,3-Dichloropropene	8800.	U
75-25-2-----	Bromoform	8800.	U
108-10-1-----	4-Methyl-2-Pentanone	8800.	U
591-78-6-----	2-Hexanone	8800.	U
127-18-4-----	Tetrachloroethene	8800.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	8800.	U
108-88-3-----	Toluene	8800.	U
108-90-7-----	Chlorobenzene	8800.	U
100-41-4-----	Ethylbenzene	8800.	U
100-42-5-----	Styrene	8800.	U
108-38-3-----	(m+p)Xylene	8800.	U
95-47-6-----	o-Xylene	8800.	U

000017

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

B512DL

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) SOIL

Lab Sample ID: 33997DL

Sample wt/vol: 4.00 (g/ml) G

Lab File ID: AZ354

Level: (low/med) MED

Date Received: 8/11/95

% Moisture: not dec. 29

Date Analyzed: 8/17/95

GC Column: RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 10000.00 (uL)

Soil Aliquot Volume: 20.0 (uL)

Number TICs Found: 0

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
2.				
3.				
4.				
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VOLATILE ORGANICS ANALYSIS DATA SHEET

B624

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) SOIL

Lab Sample ID: 33998

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5522

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec. 33

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO. COMPOUND CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/KG Q

74-87-3-----	Chloromethane	15.	U
74-83-9-----	Bromomethane	15.	U
75-01-4-----	Vinyl chloride	15.	U
75-00-3-----	Chloroethane	15.	U
75-09-2-----	Methylene chloride	2.	J
67-64-1-----	Acetone	12.	J
75-15-0-----	Carbon Disulfide	15.	U
75-35-4-----	1,1-Dichloroethene	15.	U
75-34-3-----	1,1-Dichloroethane	15.	U
156-60-5-----	trans-1,2-Dichloroethene	3.	J
67-66-3-----	Chloroform	15.	U
107-06-2-----	1,2-Dichloroethane	15.	U
78-93-3-----	2-Butanone	15.	U
156-59-2-----	cis-1,2-Dichloroethene	25.	
71-55-6-----	1,1,1-Trichloroethane	15.	U
56-23-5-----	Carbon tetrachloride	15.	U
75-27-4-----	Bromodichloromethane	15.	U
78-87-5-----	1,2-Dichloropropane	15.	U
10061-01-5-----	cis-1,3-Dichloropropene	15.	U
79-01-6-----	Trichloroethene	15.	
124-48-1-----	Dibromochloromethane	15.	U
79-00-5-----	1,1,2-Trichloroethane	15.	U
71-43-2-----	Benzene	15.	U
50061-02-6-----	trans-1,3-Dichloropropene	15.	U
75-25-2-----	Bromoform	15.	U
108-10-1-----	4-Methyl-2-Pentanone	15.	U
591-78-6-----	2-Hexanone	15.	U
127-18-4-----	Tetrachloroethene	15.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	15.	U
108-88-3-----	Toluene	15.	U
108-90-7-----	Chlorobenzene	15.	U
100-41-4-----	Ethylbenzene	15.	U
100-42-5-----	Styrene	15.	U
108-38-3-----	(m+p)Xylene	15.	U
95-47-6-----	o-Xylene	15.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

LAB SAMPLE NO.

B624

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) SOIL

Lab Sample ID: 33998

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5522

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec. 33

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

Number TICs Found: 1

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		0.00	0.	
2.		0.00	0.	
3.	Unknown	7.10	17.	J
4.				
5.				
6.				
7.				
8.				
9.				
10.				
11.				
12.				
13.				
14.				
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26.				
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30.				

VOLATILE ORGANICS ANALYSIS DATA SHEET

DB424

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) SOIL

Lab Sample ID: 33999

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5523

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec. 20

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO.

COMPOUND

CONCENTRATION UNITS:

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

Q

74-87-3-----	Chloromethane	12.	U
74-83-9-----	Bromomethane	12.	U
75-01-4-----	Vinyl chloride	46.	
75-00-3-----	Chloroethane	12.	U
75-09-2-----	Methylene chloride	2.	J
67-64-1-----	Acetone	44.	
75-15-0-----	Carbon Disulfide	12.	U
75-35-4-----	1,1-Dichloroethene	12.	U
75-34-3-----	1,1-Dichloroethane	12.	U
156-60-5-----	trans-1,2-Dichloroethene	3.	J
67-66-3-----	Chloroform	12.	U
107-06-2-----	1,2-Dichloroethane	12.	U
78-93-3-----	2-Butanone	12.	U
156-59-2-----	cis-1,2-Dichloroethene	28.	
71-55-6-----	1,1,1-Trichloroethane	12.	U
56-23-5-----	Carbon tetrachloride	12.	U
75-27-4-----	Bromodichloromethane	12.	U
78-87-5-----	1,2-Dichloropropane	12.	U
10061-01-5-----	cis-1,3-Dichloropropene	12.	U
79-01-6-----	Trichloroethene	27.	
124-48-1-----	Dibromochloromethane	12.	U
79-00-5-----	1,1,2-Trichloroethane	12.	U
71-43-2-----	Benzene	12.	U
50061-02-6-----	trans-1,3-Dichloropropene	12.	U
75-25-2-----	Bromoform	12.	U
108-10-1-----	4-Methyl-2-Pentanone	12.	U
591-78-6-----	2-Hexanone	12.	U
127-18-4-----	Tetrachloroethene	24.	
79-34-5-----	1,1,2,2-Tetrachloroethane	12.	U
108-88-3-----	Toluene	12.	U
108-90-7-----	Chlorobenzene	12.	U
100-41-4-----	Ethylbenzene	12.	U
100-42-5-----	Styrene	12.	U
108-38-3-----	(m+p)Xylene	12.	U
95-47-6-----	o-Xylene	12.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

LAB SAMPLE NO.

DB424

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) SOIL

Lab Sample ID: 33999

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5523

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec. 20

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

Number TICs Found: 8

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		0.00	0.	
2.		0.00	0.	
3.	Unknown	7.13	7.4	J
4.	Unknown Hydrocarbon	21.62	5.	J
5.	Unknown Hydrocarbon	22.74	13.	J
6.	Unknown Hydrocarbon	23.55	8.	J
7.	Unknown Hydrocarbon	24.09	8.	J
8.	Unknown	24.17	7.	J
9.	Unknown Hydrocarbon	24.49	20.	J
10.	Unknown Hydrocarbon	28.87	6.8	J
11.				
12.				
13.				
14.				
15.				
16.				
17.				
18.				
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27.				
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30.				

000022

VOLATILE ORGANICS ANALYSIS DATA SHEET

RINS2

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) WATER

Lab Sample ID: 33992

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

Lab File ID: AZ331

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec.

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO.

COMPOUND

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

Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	10.	U
75-00-3-----	Chloroethane	10.	U
75-09-2-----	Methylene chloride	10.	U
67-64-1-----	Acetone	10.	U
75-15-0-----	Carbon Disulfide	10.	U
75-35-4-----	1,1-Dichloroethene	10.	U
75-34-3-----	1,1-Dichloroethane	10.	U
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	10.	U
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	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
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	10.	U
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	10.	U
108-90-7-----	Chlorobenzene	10.	U
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	10.	U
95-47-6-----	o-Xylene	10.	U

000023

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

RINS2

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) WATER

Lab Sample ID: 33992

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

Lab File ID: AZ331

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec.

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

Number TICs Found: 0

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
2.				
3.				
4.				
5.				
6.				
7.				
8.				
9.				
10.				
11.				
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000024



SUBMISSION #: 9508000224

SECTION D

SURROGATE SUMMARY

000025

WATER VOLATILE SYSTEM MONITORING COMPOUND RECOVERY

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145 Case No.:

SAS No.:

SDG No.: B1S3

	EPA SAMPLE NO.	SMC1 (TOL) #	SMC2 (BFB) #	SMC3 (DCE) #	OTHER	TOT OUT
01	RINS2	102	104	106		0
02	VLK2	100	100	100		0
03						
04						
05						
06						
07						
08						
09						
10						
11						
12						
13						
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27						
28						
29						
30						

QC LIMITS

SMC1 (TOL) = Toluene-d8 (88-110)
 SMC2 (BFB) = Bromofluorobenzene (86-115)
 SMC3 (DCE) = 1,2-Dichloroethane-d4 (76-114)

Column to be used to flag recovery values

* Values outside of contract required QC limits

D System Monitoring Compound diluted out

42
SOIL VOLATILE SYSTEM MONITORING COMPOUND RECOVERY

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145 Case No.:

SAS No.:

SDG No.: B1S3

Level: (low/med) LOW

	EPA SAMPLE NO.	SMC1 (TOL) #	SMC2 (BFB) #	SMC3 (DCE) #	OTHER	TOT OUT
	=====	=====	=====	=====	=====	=====
01	B1S3	108	93	105		0
02	B268	110	92	98		0
03	B268MS	113	92	87		0
04	B268MSD	109	94	99		0
05	B368	108	80	111		0
06	B424	109	94	117		0
07	B624	113	84	111		0
08	DB424	115	88	114		0
09	VLK1	98	102	102		0
10	VLK1MS	94	100	92		0
11	VLK3	100	102	114		0
12						
13						
14						
15						
16						
17						
18						
19						
20						
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25						
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28						
29						
30						

QC LIMITS

SMC1 (TOL) = Toluene-d8 (84-138)
 SMC2 (BFB) = Bromofluorobenzene (59-113)
 SMC3 (DCE) = 1,2-Dichloroethane-d4 (70-121)

Column to be used to flag recovery values

* Values outside of contract required QC limits

D System Monitoring Compound diluted out

SOIL VOLATILE SYSTEM MONITORING COMPOUND RECOVERY

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145 Case No.:

SAS No.:

SDG No.: B1S3

Level: (low/med) MED

	EPA SAMPLE NO.	SMC1 (TOL) #	SMC2 (BFB) #	SMC3 (DCE) #	OTHER	TOT OUT
01	B512	122	98	94		0
02	B512DL	102	98	100		0
03	B512MS	103	99	95		0
04	B512MSD	103	98	95		0
05	VBLK4	101	96	96		0
06	VBLK4MS	101	96	98		0
07						
08						
09						
10						
11						
12						
13						
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17						
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27						
28						
29						
30						

QC LIMITS

SMC1 (TOL) = Toluene-d8 (84-138)

SMC2 (BFB) = Bromofluorobenzene (59-113)

SMC3 (DCE) = 1,2-Dichloroethane-d4 (70-121)

Column to be used to flag recovery values

* Values outside of contract required QC limits

D System Monitoring Compound diluted out



SUBMISSION #: 9508000224

SECTION E

MS/MSD

000029

SOIL VOLATILE MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145 Case No.:

SAS No.:

SDG No.: B1S3

Matrix Spike - EPA Sample No.:

B268

Level: (low/med) LOW

COMPOUND	SPIKE ADDED (ug/Kg)	SAMPLE CONCENTRATION (ug/Kg)	MS CONCENTRATION (ug/Kg)	MS % REC #	QC. LIMITS REC.
1,1-Dichloroethene	85.	0.	86.	101	59-172
Trichloroethene	85.	29.	94.	76	62-137
Benzene	85.	3.	87.	99	66-142
Toluene	85.	2.	94.	108	59-139
Chlorobenzene	85.	2.	84.	96	60-133

COMPOUND	SPIKE ADDED (ug/Kg)	MSD CONCENTRATION (ug/Kg)	MSD % REC #	% RPD #	QC LIMITS RPD	REC.
1,1-Dichloroethene	85.	96.	113	11	22	59-172
Trichloroethene	85.	100.	84	10	24	62-137
Benzene	85.	87.	99	0	21	66-142
Toluene	85.	93.	107	1	21	59-139
Chlorobenzene	85.	86.	99	3	21	60-133

Column to be used to flag recovery and RPD values with an asterisk

* Values outside of QC limits

RPD: 0 out of 5 outside limits

Spike Recovery: 0 out of 10 outside limits

COMMENTS:

000030

VOLATILE ORGANICS ANALYSIS DATA SHEET

B268MS

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3-

Matrix: (soil/water) SOIL

Lab Sample ID: 33994MS

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5503

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec. 41

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

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

CAS NO.

COMPOUND

Q

74-87-3-----	Chloromethane	17.	U
74-83-9-----	Bromomethane	17.	U
75-01-4-----	Vinyl chloride	17.	U
75-00-3-----	Chloroethane	17.	U
75-09-2-----	Methylene chloride	17.	U
67-64-1-----	Acetone	17.	
75-15-0-----	Carbon Disulfide	17.	U
75-35-4-----	1,1-Dichloroethene	86.	
75-34-3-----	1,1-Dichloroethane	17.	U
156-60-5-----	trans-1,2-Dichloroethene	4.	J
67-66-3-----	Chloroform	17.	U
107-06-2-----	1,2-Dichloroethane	17.	U
78-93-3-----	2-Butanone	17.	U
156-59-2-----	cis-1,2-Dichloroethene	30.	
71-55-6-----	1,1,1-Trichloroethane	17.	U
56-23-5-----	Carbon tetrachloride	17.	U
75-27-4-----	Bromodichloromethane	17.	U
78-87-5-----	1,2-Dichloropropane	17.	U
10061-01-5-----	cis-1,3-Dichloropropene	17.	U
79-01-6-----	Trichloroethene	94.	
124-48-1-----	Dibromochloromethane	17.	U
79-00-5-----	1,1,2-Trichloroethane	17.	U
71-43-2-----	Benzene	87.	
50061-02-6-----	trans-1,3-Dichloropropene	17.	U
75-25-2-----	Bromoform	17.	U
108-10-1-----	4-Methyl-2-Pentanone	17.	U
591-78-6-----	2-Hexanone	17.	U
127-18-4-----	Tetrachloroethene	17.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	17.	U
108-88-3-----	Toluene	94.	
108-90-7-----	Chlorobenzene	84.	
100-41-4-----	Ethylbenzene	2.	J
100-42-5-----	Styrene	17.	U
108-38-3-----	(m+p)Xylene	3.	J
95-47-6-----	o-Xylene	17.	U

000031

VOLATILE ORGANICS ANALYSIS DATA SHEET

B268MSD

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3-

Matrix: (soil/water) SOIL

Lab Sample ID: 33994MSD

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5504

Level: (low/med) LOW

Date Received: 8/11/95

% Moisture: not dec. 41

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO. COMPOUND CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/KG Q

74-87-3-----	Chloromethane	17.	U
74-83-9-----	Bromomethane	17.	U
75-01-4-----	Vinyl chloride	17.	U
75-00-3-----	Chloroethane	17.	U
75-09-2-----	Methylene chloride	17.	U
67-64-1-----	Acetone	20.	
75-15-0-----	Carbon Disulfide	17.	U
75-35-4-----	1,1-Dichloroethene	96.	
75-34-3-----	1,1-Dichloroethane	17.	U
156-60-5-----	trans-1,2-Dichloroethene	3.	J
67-66-3-----	Chloroform	17.	U
107-06-2-----	1,2-Dichloroethane	17.	U
78-93-3-----	2-Butanone	17.	U
156-59-2-----	cis-1,2-Dichloroethene	25.	
71-55-6-----	1,1,1-Trichloroethane	17.	U
56-23-5-----	Carbon tetrachloride	17.	U
75-27-4-----	Bromodichloromethane	17.	U
78-87-5-----	1,2-Dichloropropane	17.	U
10061-01-5-----	cis-1,3-Dichloropropene	17.	U
79-01-6-----	Trichloroethene	100.	
124-48-1-----	Dibromochloromethane	17.	U
79-00-5-----	1,1,2-Trichloroethane	17.	U
71-43-2-----	Benzene	87.	
50061-02-6-----	trans-1,3-Dichloropropene	17.	U
75-25-2-----	Bromoform	17.	U
108-10-1-----	4-Methyl-2-Pentanone	17.	U
591-78-6-----	2-Hexanone	17.	U
127-18-4-----	Tetrachloroethene	17.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	17.	U
108-88-3-----	Toluene	93.	
108-90-7-----	Chlorobenzene	86.	
100-41-4-----	Ethylbenzene	2.	J
100-42-5-----	Styrene	17.	U
108-38-3-----	(m+p)Xylene	3.	J
95-47-6-----	o-Xylene	17.	U

000032

SOIL VOLATILE MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145 Case No.:

SAS No.:

SDG No.:B1S3

Matrix Spike - EPA Sample No.:

B512

Level:(low/med) MED

COMPOUND	SPIKE ADDED (ug/Kg)	SAMPLE CONCENTRATION (ug/Kg)	MS CONCENTRATION (ug/Kg)	MS % REC #	QC. LIMITS REC.
1,1-Dichloroethene	8800.	960.	11000.	114	59-172
Trichloroethene	8800.	110000.	120000.	114	62-137
Benzene	8800.	0.	9600.	109	66-142
Toluene	8800.	110.	9600.	108	59-139
Chlorobenzene	8800.	0.	9300.	106	60-133

COMPOUND	SPIKE ADDED (ug/Kg)	MSD CONCENTRATION (ug/Kg)	MSD % REC #	% RPD #	QC LIMITS	
					RPD	REC.
1,1-Dichloroethene	8800.	11000.	114	0	22	59-172
Trichloroethene	8800.	120000.	114	0	24	62-137
Benzene	8800.	9400.	107	2	21	66-142
Toluene	8800.	9400.	106	2	21	59-139
Chlorobenzene	8800.	8900.	101	5	21	60-133

Column to be used to flag recovery and RPD values with an asterisk

* Values outside of QC limits

RPD: 0 out of 5 outside limits

Spike Recovery: 0 out of 10 outside limits

COMMENTS:

000033

VOLATILE ORGANICS ANALYSIS DATA SHEET

LFA SAMPLE NO.

B512MS

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) SOIL

Lab Sample ID: 33997MS

Sample wt/vol: 4.00 (g/ml) G

Lab File ID: AZ352

Level: (low/med) MED

Date Received: 8/11/95

% Moisture: not dec. 29

Date Analyzed: 8/17/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 10000.00 (uL)

Soil Aliquot Volume: 100.0 (uL)

CAS NO.

COMPOUND

CONCENTRATION UNITS:

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

Q

74-87-3-----	Chloromethane	1800.	U
74-83-9-----	Bromomethane	1800.	U
75-01-4-----	Vinyl chloride	1800.	U
75-00-3-----	Chloroethane	1800.	U
75-09-2-----	Methylene chloride	1800.	U
67-64-1-----	Acetone	1800.	U
75-15-0-----	Carbon Disulfide	1800.	U
75-35-4-----	1,1-Dichloroethene	11000.	
75-34-3-----	1,1-Dichloroethane	1800.	U
156-60-5-----	trans-1,2-Dichloroethene	15000.	
67-66-3-----	Chloroform	1800.	U
107-06-2-----	1,2-Dichloroethane	1800.	U
78-93-3-----	2-Butanone	2700.	B
156-59-2-----	cis-1,2-Dichloroethene	100000.	
71-55-6-----	1,1,1-Trichloroethane	1800.	U
56-23-5-----	Carbon tetrachloride	1800.	U
75-27-4-----	Bromodichloromethane	1800.	U
78-87-5-----	1,2-Dichloropropane	1800.	U
10061-01-5-----	cis-1,3-Dichloropropene	1800.	U
79-01-6-----	Trichloroethene	120000.	
124-48-1-----	Dibromochloromethane	1800.	U
79-00-5-----	1,1,2-Trichloroethane	1800.	U
71-43-2-----	Benzene	9600.	
50061-02-6-----	trans-1,3-Dichloropropene	1800.	U
75-25-2-----	Bromoform	1800.	U
108-10-1-----	4-Methyl-2-Pentanone	1800.	U
591-78-6-----	2-Hexanone	1800.	U
127-18-4-----	Tetrachloroethene	1800.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	1800.	U
108-88-3-----	Toluene	9600.	
108-90-7-----	Chlorobenzene	9300.	
100-41-4-----	Ethylbenzene	1800.	U
100-42-5-----	Styrene	1800.	U
108-38-3-----	(m+p)Xylene	1800.	U
95-47-6-----	o-Xylene	1800.	U

VOLATILE ORGANICS ANALYSIS DATA SHEET

B512MSD

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) SOIL

Lab Sample ID: 33997MSD

Sample wt/vol: 4.00 (g/ml) G

Lab File ID: AZ353

Level: (low/med) MED

Date Received: 8/11/95

% Moisture: not dec. 29

Date Analyzed: 8/17/95

GC Column: RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 10000.00 (uL)

Soil Aliquot Volume: 100.0 (uL)

CAS NO. COMPOUND CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/KG Q

74-87-3-----	Chloromethane	1800.	U
74-83-9-----	Bromomethane	1800.	U
75-01-4-----	Vinyl chloride	1800.	U
75-00-3-----	Chloroethane	1800.	U
75-09-2-----	Methylene chloride	1800.	U
67-64-1-----	Acetone	1800.	U
75-15-0-----	Carbon Disulfide	1800.	U
75-35-4-----	1,1-Dichloroethene	11000.	
75-34-3-----	1,1-Dichloroethane	1800.	U
156-60-5-----	trans-1,2-Dichloroethene	15000.	
67-66-3-----	Chloroform	1800.	U
107-06-2-----	1,2-Dichloroethane	1800.	U
78-93-3-----	2-Butanone	3300.	B
156-59-2-----	cis-1,2-Dichloroethene	100000.	
71-55-6-----	1,1,1-Trichloroethane	1800.	U
56-23-5-----	Carbon tetrachloride	1800.	U
75-27-4-----	Bromodichloromethane	1800.	U
78-87-5-----	1,2-Dichloropropane	1800.	U
10061-01-5-----	cis-1,3-Dichloropropene	1800.	U
79-01-6-----	Trichloroethene	120000.	
124-48-1-----	Dibromochloromethane	1800.	U
79-00-5-----	1,1,2-Trichloroethane	1800.	U
71-43-2-----	Benzene	9400.	
50061-02-6-----	trans-1,3-Dichloropropene	1800.	U
75-25-2-----	Bromoform	1800.	U
108-10-1-----	4-Methyl-2-Pentanone	1800.	U
591-78-6-----	2-Hexanone	1800.	U
127-18-4-----	Tetrachloroethene	1800.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	1800.	U
108-88-3-----	Toluene	9400.	
108-90-7-----	Chlorobenzene	8900.	
100-41-4-----	Ethylbenzene	1800.	U
100-42-5-----	Styrene	1800.	U
108-38-3-----	(m+p)Xylene	1800.	U
95-47-6-----	o-Xylene	1800.	U

SOIL VOLATILE MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145 Case No.:

SAS No.:

SDG No.: B1S3

Matrix Spike - EPA Sample No.:

VLK1

Level: (low/med) LOW

COMPOUND	SPIKE ADDED (ug/Kg)	SAMPLE CONCENTRATION (ug/Kg)	MS CONCENTRATION (ug/Kg)	MS % REC #	QC. LIMITS REC.
1,1-Dichloroethene	50.	0.	52.	104	59-172
Trichloroethene	50.	0.	48.	96	62-137
Benzene	50.	0.	51.	102	66-142
Toluene	50.	0.	48.	96	59-139
Chlorobenzene	50.	0.	48.	96	60-133

Column to be used to flag recovery and RPD values with an asterisk

* Values outside of QC limits

RPD: 0 out of 0 outside limits

Spike Recovery: 0 out of 5 outside limits

COMMENTS:

000036

FORM III VOA-2

3/90

VOLATILE ORGANICS ANALYSIS DATA SHEET

VBLK1MS

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) SOIL

Lab Sample ID: VBLK1MS

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5501

Level: (low/med) LOW

Date Received: / /

% Moisture: not dec. 0

Date Analyzed: 8/15/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO. COMPOUND CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/KG Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	10.	U
75-00-3-----	Chloroethane	10.	U
75-09-2-----	Methylene chloride	10.	U
67-64-1-----	Acetone	10.	U
75-15-0-----	Carbon Disulfide	10.	U
75-35-4-----	1,1-Dichloroethene	52.	
75-34-3-----	1,1-Dichloroethane	10.	U
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	10.	U
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	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	48.	
124-48-1-----	Dibromochloromethane	10.	U
79-00-5-----	1,1,2-Trichloroethane	10.	U
71-43-2-----	Benzene	51.	
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	10.	U
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	48.	
108-90-7-----	Chlorobenzene	48.	
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	10.	U
95-47-6-----	o-Xylene	10.	U

SOIL VOLATILE MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145 Case No.:

SAS No.:

SDG No.:B1S3

Matrix Spike - EPA Sample No.:

VBLK4

Level:(low/med) MED

COMPOUND	SPIKE ADDED (ug/Kg)	SAMPLE CONCENTRATION (ug/Kg)	MS CONCENTRATION (ug/Kg)	MS % REC #	QC. LIMITS REC.
1,1-Dichloroethene	6200.	0.	7200.	116	59-172
Trichloroethene	6200.	0.	6400.	103	62-137
Benzene	6200.	0.	6700.	108	66-142
Toluene	6200.	0.	6600.	106	59-139
Chlorobenzene	6200.	0.	6400.	103	60-133

Column to be used to flag recovery and RPD values with an asterisk

* Values outside of QC limits

RPD: 0 out of 0 outside limits

Spike Recovery: 0 out of 5 outside limits

COMMENTS:

000038

VOLATILE ORGANICS ANALYSIS DATA SHEET

VBLK4MS

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) SOIL

Lab Sample ID: VBLK4MS

Sample wt/vol: 4.00 (g/ml) G

Lab File ID: AZ350

Level: (low/med) MED

Date Received: / /

% Moisture: not dec. 0

Date Analyzed: 8/17/95

GC Column: RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 10000.00 (uL)

Soil Aliquot Volume: 100.0 (uL)

CAS NO. COMPOUND CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/KG Q

74-87-3-----	Chloromethane	1200.	U
74-83-9-----	Bromomethane	1200.	U
75-01-4-----	Vinyl chloride	1200.	U
75-00-3-----	Chloroethane	1200.	U
75-09-2-----	Methylene chloride	1200.	U
67-64-1-----	Acetone	1200.	U
75-15-0-----	Carbon Disulfide	1200.	U
75-35-4-----	1,1-Dichloroethene	7200.	
75-34-3-----	1,1-Dichloroethane	1200.	U
156-60-5-----	trans-1,2-Dichloroethene	1200.	U
67-66-3-----	Chloroform	100.	J
107-06-2-----	1,2-Dichloroethane	1200.	U
78-93-3-----	2-Butanone	2200.	B
156-59-2-----	cis-1,2-Dichloroethene	1200.	U
71-55-6-----	1,1,1-Trichloroethane	1200.	U
56-23-5-----	Carbon tetrachloride	1200.	U
75-27-4-----	Bromodichloromethane	1200.	U
78-87-5-----	1,2-Dichloropropane	1200.	U
10061-01-5-----	cis-1,3-Dichloropropene	1200.	U
79-01-6-----	Trichloroethene	6400.	
124-48-1-----	Dibromochloromethane	1200.	U
79-00-5-----	1,1,2-Trichloroethane	1200.	U
71-43-2-----	Benzene	6700.	
50061-02-6-----	trans-1,3-Dichloropropene	1200.	U
75-25-2-----	Bromoform	1200.	U
108-10-1-----	4-Methyl-2-Pentanone	1200.	U
591-78-6-----	2-Hexanone	1200.	U
127-18-4-----	Tetrachloroethene	1200.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	1200.	U
108-88-3-----	Toluene	6600.	
108-90-7-----	Chlorobenzene	6400.	
100-41-4-----	Ethylbenzene	1200.	U
100-42-5-----	Styrene	1200.	U
108-38-3-----	(m+p)Xylene	1200.	U
95-47-6-----	o-Xylene	1200.	U

000039

SUBMISSION #: 9508000224

SECTION F

BLANK DATA

000040

VOLATILE METHOD BLANK SUMMARY

VBLK1

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145

Case No.:

SAS No.:

SDG No.:B1S3

Lab File ID:J5500

Lab Sample ID:VBLK1

Date Analyzed: 8/15/95

Time Analyzed:2246

GC Column:RTX-502 ID: 0.53 (mm)

Heated Purge: (Y/N) Y

Instrument ID:MS#3

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS, AND MSD:

	EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	TIME ANALYZED
01	B268	33994	J5505	0300
02	B268MS	33994MS	J5503	0105
03	B268MSD	33994MSD	J5504	0208
04	VBLK1MS	VBLK1MS	J5501	2325
05				
06				
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COMMENTS:

000041

VOLATILE ORGANICS ANALYSIS DATA SHEET

VBLK1

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145

Case No.:

SAS No.:

SDG No.:B1S3

Matrix: (soil/water) SOIL

Lab Sample ID:VBLK1

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5500

Level: (low/med) LOW

Date Received: / /

% Moisture: not dec. 0

Date Analyzed: 8/15/95

GC Column:RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume:0 (uL)

Soil Aliquot Volume:0 (uL)

CAS NO. COMPOUND CONCENTRATION UNITS:
(ug/L or ug/Kg) UG/KG Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	10.	U
75-00-3-----	Chloroethane	10.	U
75-09-2-----	Methylene chloride	1.	J
67-64-1-----	Acetone	10.	U
75-15-0-----	Carbon Disulfide	10.	U
75-35-4-----	1,1-Dichloroethene	10.	U
75-34-3-----	1,1-Dichloroethane	10.	U
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	10.	U
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	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
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	10.	U
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	10.	U
108-90-7-----	Chlorobenzene	10.	U
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	10.	U
95-47-6-----	o-Xylene	10.	U

000042

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

VBLK1

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) SOIL

Lab Sample ID: VBLK1

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5500

Level: (low/med) LOW

Date Received: / /

% Moisture: not dec. 0

Date Analyzed: 8/15/95

GC Column: RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0 (uL)

Soil Aliquot Volume: 0 (uL)

Number TICs Found: 0

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		0.00	0.	
2.		0.00	0.	
3.				
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000043

VOLATILE METHOD BLANK SUMMARY

VBLK2

Lab Name:General Testing Corp Contract:CDM

Lab Code:10145 Case No.: SAS No.: SDG No.:B1S3

Lab File ID:AZ321

Lab Sample ID:VBLK2

Date Analyzed: 8/15/95

Time Analyzed:2109

GC Column:RTX-502 ID: 0.53 (mm)

Heated Purge: (Y/N) N

Instrument ID:MS#1

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS, AND MSD:

	EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	TIME ANALYZED
01	RINS2	33992	AZ331	0403
02				
03				
04				
05				
06				
07				
08				
09				
10				
11				
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COMMENTS:

000044

VOLATILE ORGANICS ANALYSIS DATA SHEET

VBLK2

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) WATER

Lab Sample ID: VBLK2

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

Lab File ID: AZ321

Level: (low/med) LOW

Date Received: / /

% Moisture: not dec.

Date Analyzed: 8/15/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0

(uL)

Soil Aliquot Volume: 0

(uL)

CAS NO.

COMPOUND

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

Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	10.	U
75-00-3-----	Chloroethane	10.	U
75-09-2-----	Methylene chloride	10.	U
67-64-1-----	Acetone	10.	U
75-15-0-----	Carbon Disulfide	10.	U
75-35-4-----	1,1-Dichloroethene	10.	U
75-34-3-----	1,1-Dichloroethane	10.	U
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	10.	U
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	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
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	10.	U
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	10.	U
108-90-7-----	Chlorobenzene	10.	U
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	10.	U
95-47-6-----	o-Xylene	10.	U

000045

1E
VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

VBLK2

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) WATER

Lab Sample ID: VBLK2

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

Lab File ID: AZ321

Level: (low/med) LOW

Date Received: / /

% Moisture: not dec.

Date Analyzed: 8/15/95

GC Column: RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0 (uL)

Soil Aliquot Volume: 0 (uL)

Number TICs Found: 0

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
2.				
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000046

VOLATILE METHOD BLANK SUMMARY

VBLK3

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145

Case No.:

SAS No.:

SDG No.:B1S3

Lab File ID:J5514

Lab Sample ID:VBLK3

Date Analyzed: 8/16/95

Time Analyzed:1133

GC Column:RTX-502 ID: 0.53 (mm)

Heated Purge: (Y/N) Y

Instrument ID:MS##

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS, AND MSD:

	EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	TIME ANALYZED
01	B1S3	33993	J5515	1259
02	B368	33995	J5516	1346
03	B424	33996	J5517	1425
04	B624	33998	J5522	1840
05	DB424	33999	J5523	1925
06				
07				
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COMMENTS:

000047

VOLATILE ORGANICS ANALYSIS DATA SHEET

VBLK3

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) SOIL

Lab Sample ID: VBLK3

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5514

Level: (low/med) LOW

Date Received: / /

% Moisture: not dec. 0

Date Analyzed: 8/16/95

GC Column: RTX-502

ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0 (uL)

Soil Aliquot Volume: 0 (uL)

CAS NO.

COMPOUND

CONCENTRATION UNITS:

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

Q

74-87-3-----	Chloromethane	10.	U
74-83-9-----	Bromomethane	10.	U
75-01-4-----	Vinyl chloride	10.	U
75-00-3-----	Chloroethane	10.	U
75-09-2-----	Methylene chloride	1.	J
67-64-1-----	Acetone	7.	J
75-15-0-----	Carbon Disulfide	10.	U
75-35-4-----	1,1-Dichloroethene	10.	U
75-34-3-----	1,1-Dichloroethane	10.	U
156-60-5-----	trans-1,2-Dichloroethene	10.	U
67-66-3-----	Chloroform	10.	U
107-06-2-----	1,2-Dichloroethane	10.	U
78-93-3-----	2-Butanone	10.	U
156-59-2-----	cis-1,2-Dichloroethene	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
50061-02-6-----	trans-1,3-Dichloropropene	10.	U
75-25-2-----	Bromoform	10.	U
108-10-1-----	4-Methyl-2-Pentanone	10.	U
591-78-6-----	2-Hexanone	10.	U
127-18-4-----	Tetrachloroethene	10.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	10.	U
108-88-3-----	Toluene	10.	U
108-90-7-----	Chlorobenzene	10.	U
100-41-4-----	Ethylbenzene	10.	U
100-42-5-----	Styrene	10.	U
108-38-3-----	(m+p)Xylene	10.	U
95-47-6-----	o-Xylene	10.	U

000048

1E
VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

VBLK3

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3-

Matrix: (soil/water) SOIL

Lab Sample ID: VBLK3

Sample wt/vol: 5.00 (g/ml) G

Lab File ID: J5514

Level: (low/med) LOW

Date Received: / /

% Moisture: not dec. 0

Date Analyzed: 8/16/95

GC Column: RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 0 (uL)

Soil Aliquot Volume: 0 (uL)

Number TICs Found: 0

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.		0.00	0.	
2.		0.00	0.	
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000049

VOLATILE METHOD BLANK SUMMARY

VBLK4

Lab Name: General Testing Corp Contract: CDM

Lab Code: 10145 Case No.: SAS No.: SDG No.: B1S3

Lab File ID: AZ349

Lab Sample ID: VBLK4

Date Analyzed: 8/17/95

Time Analyzed: 1033

GC Column: RTX-502 ID: 0.53 (mm)

Heated Purge: (Y/N) N

Instrument ID: MS#1

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS, AND MSD:

	EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	TIME ANALYZED
01	B512	33997	AZ351	1304
02	B512DL	33997DL	AZ354	1537
03	B512MS	33997MS	AZ352	1358
04	B512MSD	33997MSD	AZ353	1442
05	VBLK4MS	VBLK4MS	AZ350	1119
06				
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COMMENTS:

000050

VOLATILE ORGANICS ANALYSIS DATA SHEET

VBLK4

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) SOIL

Lab Sample ID: VBLK4

Sample wt/vol: 4.00 (g/ml) G

Lab File ID: AZ349

Level: (low/med) MED

Date Received: / /

% Moisture: not dec. 0

Date Analyzed: 8/17/95

GC Column: RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 10000.00 (uL)

Soil Aliquot Volume: 100.0 (uL)

CAS NO.

COMPOUND

CONCENTRATION UNITS:

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

Q

74-87-3-----	Chloromethane	1200.	U
74-83-9-----	Bromomethane	1200.	U
75-01-4-----	Vinyl chloride	1200.	U
75-00-3-----	Chloroethane	1200.	U
75-09-2-----	Methylene chloride	1200.	U
67-64-1-----	Acetone	1200.	U
75-15-0-----	Carbon Disulfide	1200.	U
75-35-4-----	1,1-Dichloroethene	1200.	U
75-34-3-----	1,1-Dichloroethane	1200.	U
156-60-5-----	trans-1,2-Dichloroethene	1200.	U
67-66-3-----	Chloroform	1200.	U
107-06-2-----	1,2-Dichloroethane	1200.	U
78-93-3-----	2-Butanone	1900.	
156-59-2-----	cis-1,2-Dichloroethene	1200.	U
71-55-6-----	1,1,1-Trichloroethane	1200.	U
56-23-5-----	Carbon tetrachloride	1200.	U
75-27-4-----	Bromodichloromethane	1200.	U
78-87-5-----	1,2-Dichloropropane	1200.	U
10061-01-5-----	cis-1,3-Dichloropropene	1200.	U
79-01-6-----	Trichloroethene	1200.	U
124-48-1-----	Dibromochloromethane	1200.	U
79-00-5-----	1,1,2-Trichloroethane	1200.	U
71-43-2-----	Benzene	1200.	U
50061-02-6-----	trans-1,3-Dichloropropene	1200.	U
75-25-2-----	Bromoform	1200.	U
108-10-1-----	4-Methyl-2-Pentanone	1200.	U
591-78-6-----	2-Hexanone	1200.	U
127-18-4-----	Tetrachloroethene	1200.	U
79-34-5-----	1,1,2,2-Tetrachloroethane	1200.	U
108-88-3-----	Toluene	1200.	U
108-90-7-----	Chlorobenzene	1200.	U
100-41-4-----	Ethylbenzene	1200.	U
100-42-5-----	Styrene	1200.	U
108-38-3-----	(m+p)Xylene	1200.	U
95-47-6-----	o-Xylene	1200.	U

000051

1E
VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

VLBK4

Lab Name: General Testing Corp

Contract: CDM

Lab Code: 10145

Case No.:

SAS No.:

SDG No.: B1S3

Matrix: (soil/water) SOIL

Lab Sample ID: VBLK4

Sample wt/vol: 4.00 (g/ml) G

Lab File ID: AZ349

Level: (low/med) MED

Date Received: / /

% Moisture: not dec. 0

Date Analyzed: 8/17/95

GC Column: RTX-502 ID: 0.53 (mm)

Dilution Factor: 1.0

Soil Extract Volume: 10000.00 (uL)

Soil Aliquot Volume: 100.0 (uL)

Number TICs Found: 0

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

CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.				
2.				
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000052

VOLATILE INTERNAL STANDARD AREA AND RT SUMMARY

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145

Case No.:

SAS No.:

SDG No.:B1S3

b File ID (Standard):AZ320

Date Analyzed: 8/15/95

Instrument ID:MS#1

Time Analyzed:2015

GC Column:RTX-502

ID: 0.53 (mm)

Heated Purge: (Y/N) N

	IS1(BCM) AREA #	RT #	IS2(DFB) AREA #	RT #	IS3(CBZ) AREA #	RT #
12 HOUR STD	79692	9.04	320965	11.88	254414	18.71
UPPER LIMIT	159384	9.54	641930	12.38	508828	19.21
LOWER LIMIT	39846	8.54	160483	11.38	127207	18.21
EPA SAMPLE NO.						
01 VBLK2	79635	9.05	335119	11.83	259170	18.63
02 RINS2	73995	8.89	311442	11.62	230854	18.49
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IS1 (BCM) = Bromochloromethane
 IS2 (DFB) = 1,4-Difluorobenzene
 IS3 (CBZ) = Chlorobenzene-d5

AREA UPPER LIMIT = +100% of internal standard area
 AREA LOWER LIMIT = - 50% of internal standard area
 RT UPPER LIMIT = +0.50 minutes of internal standard RT
 RT LOWER LIMIT = -0.50 minutes of internal standard RT

Column used to flag values outside of QC limits with an asterisk.
 * Values outside of QC limits.

000053

VOLATILE INTERNAL STANDARD AREA AND RT SUMMARY

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145

Case No.:

SAS No.:

SDG No.:B1S3

File ID (Standard):AZ348

Date Analyzed: 8/17/95

Instrument ID:MS#1

Time Analyzed:0946

GC Column:RTX-502

ID: 0.53 (mm)

Heated Purge: (Y/N) N

	IS1(BCM) AREA #	RT #	IS2(DFB) AREA #	RT #	IS3(CBZ) AREA #	RT #
=====	=====	=====	=====	=====	=====	=====
12 HOUR STD	84622	9.00	355564	11.77	263627	18.61
UPPER LIMIT	169244	9.50	711128	12.27	527254	19.11
LOWER LIMIT	42311	8.50	177782	11.27	131814	18.11
=====	=====	=====	=====	=====	=====	=====
EPA SAMPLE NO.						
=====	=====	=====	=====	=====	=====	=====
01 VBLK4	81861	9.01	369274	11.77	264604	18.55
02 VBLK4MS	86183	9.06	367981	11.80	272291	18.64
03 B512	87694	8.98	364543	11.74	268830	18.53
04 B512MS	86177	9.03	351336	11.82	263676	18.58
05 B512MSD	85956	9.09	347823	11.86	265038	18.63
06 B512DL	79003	9.12	344443	11.87	247267	18.73
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22						

IS1 (BCM) = Bromochloromethane
 IS2 (DFB) = 1,4-Difluorobenzene
 IS3 (CBZ) = Chlorobenzene-d5

AREA UPPER LIMIT = +100% of internal standard area
 AREA LOWER LIMIT = - 50% of internal standard area
 RT UPPER LIMIT = +0.50 minutes of internal standard RT
 RT LOWER LIMIT = -0.50 minutes of internal standard RT

Column used to flag values outside of QC limits with an asterisk.
 * Values outside of QC limits.

VOLATILE INTERNAL STANDARD AREA AND RT SUMMARY

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145

Case No.:

SAS No.:

SDG No.:B1S3

File ID (Standard):J5499

Date Analyzed: 8/15/95

Instrument ID:MS#3

Time Analyzed:2149

GC Column:RTX-502

ID: 0.53 (mm)

Heated Purge: (Y/N) Y

	IS1(BCM) AREA #	RT #	IS2(DFB) AREA #	RT #	IS3(CBZ) AREA #	RT #
12 HOUR STD	370413	9.47	2290227	11.22	1998866	17.83
UPPER LIMIT	740826	9.97	4580454	11.72	3997732	18.33
LOWER LIMIT	185207	8.97	1145114	10.72	999433	17.33
EPA SAMPLE NO.						
01 VBLK1	359294	9.48	2254080	11.22	1995016	17.79
02 VBLK1MS	379821	9.43	2159231	11.17	1879362	17.81
03 B268MS	189898	9.47	1212668	11.17	934008*	17.74
04 B268MSD	268841	9.47	1620020	11.18	1207503	17.73
05 B268	180743*	9.38	1173509	11.12	957329*	17.78
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22						

IS1 (BCM) = Bromochloromethane
 IS2 (DFB) = 1,4-Difluorobenzene
 IS3 (CBZ) = Chlorobenzene-d5

AREA UPPER LIMIT = +100% of internal standard area
 AREA LOWER LIMIT = - 50% of internal standard area
 RT UPPER LIMIT = +0.50 minutes of internal standard RT
 RT LOWER LIMIT = -0.50 minutes of internal standard RT

Column used to flag values outside of QC limits with an asterisk.
 * Values outside of QC limits.

000055

VOLATILE INTERNAL STANDARD AREA AND RT SUMMARY

Lab Name:General Testing Corp

Contract:CDM

Lab Code:10145

Case No.:

SAS No.:

SDG No.:B1S3

File ID (Standard):J5513

Date Analyzed: 8/16/95

Instrument ID:MS#3

Time Analyzed:1034

GC Column:RTX-502

ID: 0.53 (mm)

Heated Purge: (Y/N) Y

	IS1(BCM) AREA #	RT #	IS2(DFB) AREA #	RT #	IS3(CBZ) AREA #	RT #
=====	=====	=====	=====	=====	=====	=====
12 HOUR STD	257545	9.45	1512103	11.17	1357668	17.79
UPPER LIMIT	515090	9.95	3024206	11.67	2715336	18.29
LOWER LIMIT	128773	8.95	756052	10.67	678834	17.29
=====	=====	=====	=====	=====	=====	=====
EPA SAMPLE NO.						
=====	=====	=====	=====	=====	=====	=====
01 VBLK3	219163	9.50	1410734	11.25	1217597	17.86
02 B1S3	255673	9.45	1578723	11.20	1285175	17.83
03 B368	186704	9.54	1049183	11.24	764899	17.82
04 B424	252363	9.52	1566221	11.23	1215415	17.91
05 B624	262016	9.49	1474163	11.22	1138478	17.88
06 DB424	244811	9.50	1272521	11.24	922450	17.87
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IS1 (BCM) = Bromochloromethane
 IS2 (DFB) = 1,4-Difluorobenzene
 IS3 (CBZ) = Chlorobenzene-d5

AREA UPPER LIMIT = +100% of internal standard area
 AREA LOWER LIMIT = - 50% of internal standard area
 RT UPPER LIMIT = +0.50 minutes of internal standard RT
 RT LOWER LIMIT = -0.50 minutes of internal standard RT

Column used to flag values outside of QC limits with an asterisk.
 * Values outside of QC limits.

000056