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SEMI-ANNUAL O&M REPORT
REMEDIAL WORK ELEMENTS I, II AND IV

Reporting period June 23, 2001, through December 5, 2001

Malta Rocket Fuel Area Site
Malta, New York

Prepared for:

General Electric Company
Corporate Environmental Programs
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CERTIFICATION: This document has been reviewed and is prepared in accordance with the contract documents.

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1.0 INTRODUCTION

This operations and maintenance (O&M) report documents on going O&M activities conducted at the Malta Rocket Fuel Area (MRFA) site, in the town of Malta, New York. This report has been prepared in accordance with the following documents:

- Operation and Maintenance Manual, Remedial Work Element I, Drinking Water, dated March 31, 1998 and prepared by ERM - Northeast, Inc.
- Operations and Maintenance Manual, Remedial Work Element II, Groundwater, dated December 11, 1997 and prepared by ERM - Northeast, Inc.
- Operation and Maintenance Manual, Remedial Work Element IV, Institutional Controls, dated September 9, 1999, revised September 27, 1999, prepared by IT Corporation, Inc.

This report covers all site activities performed at the site as required in each of the previously referenced documents, for the period from June 23, 2001 through December 5, 2001.

2.0 O&M OF REMEDIAL WORK ELEMENT I (Drinking Water)

Six monthly site visits were performed to check system operation, record system operating conditions, and to determine system treatment effectiveness by sampling of the drinking water process stream. These visits took place on July 31, August 30, September 27, October 23, November 19 and December 5, 2001. Additional visits were performed at the site during October and November 2001 to install upgraded components into the existing system. These activities are discussed in further detail in section 2.1.1 of this report.

System effectiveness sampling was performed during the August 30 and October 23 site visits to document adherence to treatment system discharge objectives. Analytical results from these sample events (including validated analytical results and chain of custody forms for the August 30 and October 23, 2001 samples), are provided in **Appendix A** and **Appendix B**, respectively. The validation summary for samples is included in **Appendix C**.

Based on the information gathered during this reporting period, it is evident that the ground water treatment system is operating as intended and is meeting the performance standards for the MRFA site. Both RW-1D and RW-2D have operated at an instantaneous flow rate of approximately 6 to 6.5 gallons per minute (gpm) each. This yields an instantaneous system flow of approximately 12 to 13 gpm. System design capacity is a maximum of 25 gpm.

System alarm conditions were received on several occasions from the system Remote Telemetry Unit (RTU) during the current reporting period. Alarms were received on July 6, August 30, October 25 and November 8, 2001 and indicated a power failure at the site. In each case, normal system operation was subsequently resumed with the restoration of power to the site. An extra site visit was performed on July 9, 2001 to verify all components were operating satisfactorily, with no problems observed. No further visits were conducted in response to system alarms indicating a power failure during the period.

System alarms indicating a low air stripper blower pressure and low air stripper blower motor amps were received on November 20, 28, 29, 30 and December 3, 2001. These alarms were determined to be spurious after examination of operating data contained in the RTU. In addition, a supplementary site visit was performed on December 2, 2001 to check the system and to verify proper system operation. No problems were found at this time. It is believed that the spurious alarms were a result of a calibration error on the air stripper blower motor amperage sensor, causing the generation of false alarms. Adjustments were made to the

amperage sensor during a site visit on December 5, 2001. No additional spurious alarms are expected to be experienced after these adjustments.

All system interlocks were thoroughly checked during the December 5, 2001 O&M visit to insure all interlocks and alarms were functioning normally.

Air stripper blower pressure readings as well as effluent water quality indicate that the air stripper packing material is not in need of cleaning or replacement.

2.1 Remote Telemetry/Programmable Logic Controller

The RTU has successfully notified key personnel via facsimile and voice messaging of alarm conditions (power failure events and low blower pressure/low blower motor amps as previously discussed) during the current period. All system equipment is in good repair and should continue to be inspected and repaired in accordance with the schedule provided in **Table 1**.

2.1.1 System Enhancements

During the period between October 30 and November 1, 2001, select enhancements were installed in the system controls to minimize the possibility of a system malfunction and to allow for the remote monitoring of additional operating parameters. Enhancements consisted of several elements, including the following:

- Installation of an expansion module into the RTU, allowing for the addition of up to eight additional inputs to the RTU. Two of the eight additional inputs on the expansion module have been utilized on the expansion module as part of the system enhancement.
- Installation of an air velocity transmitter in the air stripper blower intake duct. This allows for real-time monitoring of the air flow through the air stripper tower. This air velocity data is also logged by the RTU and can be reviewed through a database program after downloading to a personal computer.
- Installation of an amperage sensor on the air stripper blower motor power circuit. This sensor ensures that the air stripper blower motor is operational while extraction pumps are sending groundwater through the air stripper for removal of VOCs. Lack of sufficient amperage through this sensor will disable the extraction pumps and trigger a system alarm.

A detailed description of these system enhancements can be found in the following document: Design *Package – System Enhancements, Malta Rocket Fuel Area Site, dated October 4, 2001, by IT Corporation.*

Subsequent to the described system enhancements, a revision to the existing Operations and Maintenance (O&M) manual for the project was initiated. The revised O&M manual has been distributed to all concerned parties in conjunction with this report.

2.2 Visual Inspection

2.2.1 System Inspection

Visual inspections were made of all accessible system components during monthly site visits in accordance with attached **Table 1**, *Maintenance Checklist*. Inspections were performed to check for signs of component wear, process piping leaks and general system integrity.

The system was found to be in generally good working order during monthly site visits. Maintenance activities included regular inspection of the air stripper blower intake for obstructions, inspection of all process valves and piping to prevent leakage of untreated groundwater, and inspection of the air stripper sight tube for sediment buildup. In addition, the settling tank sump exterior was cleaned monthly, and operation of the transfer sump pump and associated high level float was checked. The settling tank interior was also visually inspected for signs of sediment buildup or corrosion.

During the October 23, 2001 site visit, a polyvinyl chloride (PVC) ball valve on the RW-1D line fractured while collecting samples from the system manifold. RW-1D was subsequently idled, locked, and tagged out to prevent the loss of untreated water. Replacement parts were ordered and all components of the manifold between the totalizer units and the air stripper tower feed line were replaced with new schedule 80 PVC pipe and valves. Replacement of these parts was completed on October 31, 2001. RW-1D was returned to active service on November 1, 2001.

2.3 Operating Measurements

2.3.1 Water Flow Measurements

Water flow measurements for wells RW-1D and RW-2D have been tabulated and are shown in

Table 3, *Process Operating Report* for the reporting period. These readings indicate that the average water flow rates for the period from June 23, 2001 to December 5, 2001 are as follows:

Well RW-1D: 0.350 gpm
Well RW-2D: 0.393 gpm
System Avg: 0.743 gpm

Average daily water flow as recorded by the data logger are provided in **Appendix D**. This information provides more detailed influent water flow data than that reported in **Table 3**. Information obtained from the data logger indicates an average daily water flow rate of 0.732 gpm for the current reporting period. This is a slight decrease from the average rate of 0.726 gpm for the reporting period ending June 22, 2001.

2.3.2 Blower Air Pressure

Measurements of the air stripper blower back pressure were recorded during monthly O&M site visits. Readings from the pressure gauge installed to monitor the air stripper back pressure are provided in **Table 3**. Pressure readings ranged from 3.30 to 3.45 inches of water column during the current period. Pressure readings will continue to be monitored for trends indicating tower packing fouling and the associated potential loss of efficiency for the treatment system.

2.4 Water Quality Data

Samples of the drinking water system influent and effluent were collected on August 30 and October 23, 2001. All samples were collected by IT Corporation personnel and directed to Columbia Analytical Laboratories, Incorporated in Rochester, New York for analysis. All samples were analyzed for volatile organic compounds (VOCs) using USEPA Method Contract Laboratory Program (CLP) OLC-02, modified to include hexachlorobutadiene, 1,2,3 trichlorobenzene and trichlorofluoromethane as summarized in **Table 4**. The validated analytical results and chain of custody forms for the August 30 and October 23, 2001 samples are provided in **Appendix A** and **Appendix B**, respectively. All validation was performed by Data Validation Services, Incorporated of North Creek, New York. Validation reports are included in **Appendix C**.

Carbon tetrachloride (Carbon Tet) and trichloroethene (TCE) concentrations are tracked to document treatment system effectiveness. Values for all analyzed compounds including Carbon Tet and TCE were reduced to below method detection limits for all effluent samples.

Analyte	Date Sampled	Influent (ppb)	Effluent (ppb)	Performance Standard (ppb)
Carbon Tet	August 30, 2001	19.3	<1.0	5
	October 23, 2001	32.2	<1.0	5
TCE	August 30, 2001	14.8	<1.0	5
	October 23, 2001	19.9	<1.0	5

Effluent sampling results indicated that Carbon Tet and TCE were below detection limits for both monitoring events. Historical influent concentrations for Carbon Tet range from 12 ppb in October 1996 to 149 ppb in December 1990. Effluent concentrations range from below method detection limits to 4.0 ppb in April 1990. Historical influent concentrations for TCE vary from 14.8 ppb in August 2001 to 83 ppb in June 1992. Effluent concentrations have been observed from below method detection limits to 2.8 ppb in March 1987.

Chloroform was detected at a concentration of 2.0 ppb in the air stripper influent sample collected on August 30, 2001. Chloroform was also detected in the air stripper influent sample collected on October 23, 2001 at a concentration of 3.0 ppb. Chloroform was below detection limits in the effluent samples collected on both dates.

Effluent concentrations for VOCs indicate that the treated water meets the performance standards established for the site for use as a potable water supply.

In addition to the influent and effluent samples collected during the October 23, 2001 site visit, water samples were also collected from each recovery well (RW-1D and RW-2D). This one-time sampling event was conducted to determine the contaminate concentrations coming from each individual well. The results are included in **Appendix B**.

3.0 O&M OF REMEDIAL WORK ELEMENT II (Groundwater)

3.1 Sample Collection

In accordance with the Operations and Maintenance Manual for Remedial Work Element II - Ground Water (O&M-GW) approved by the USEPA, groundwater samples were obtained and analyzed from wells DGC-3S, DGC-4S, 13S, M-27S, M-27D, M-33S, and M-33I. Surface water samples were obtained and analyzed from locations SW-A, SW-B, and SW-D (**Figure 1**). One trip blank and one blind duplicate sample (DUPA) from well M-27S were also obtained and analyzed.

Unfiltered samples were collected on October 23, 2001 and submitted to Columbia Analytical Services, Inc. in Rochester, New York. Samples from all monitoring wells (with the exception of 13S) and all surface water locations were analyzed for volatile organic compounds (VOCs) by USEPA Method OLC-02. Samples from wells 13S, M-27S, and M-27D, and surface water location SW-B were analyzed for unfiltered total matrix chromium following CLP procedures and unfiltered hexavalent chromium by SW-846 Method 7196 (Test Methods for Evaluating Solid Waste, 3rd Edition, November 1986).

Results of the October 2001 semi-annual sampling are summarized in **Table 5**. The laboratory reporting data sheets and a data validation report for this sampling event are also attached (**Appendices B and C**). A summary of analytical results from 1987 through the most recent round is provided in **Tables 6**, **7**, and **8** for sampling points presently included in the EWMS sampling program. The Sampling and Analysis Plan (SAP) as presented in the O&M-GW contains a complete table of historical EWMS analytical results through 1994.

Time-concentration plots for hexavalent chromium at well 13S (**Figure 2**) and carbon tetrachloride at well M-27D (**Figure 3**) are also included. Based on the October 2001 analytical results, the groundwater from this site does not appear to be impacting the Luther Forest Well Field or the water supply wells north of the Site.

3.2 Chromium Analytical Results

Results of the unfiltered total chromium analyses are as follows: well 13S contained 43.3 ug/l. For comparison purposes only, the New York State Ground Water Standard (NYSGWS) for total chromium is 50 ug/l.

The unfiltered hexavalent chromium analytical results were "ND" at the detection limit of 10 ug/l for all groundwater samples and one surface water sample except well 13S which contained an estimated 43.6 ug/l. For comparison purposes only, the NYSGWS for hexavalent chromium is 50 ug/l. It is unlikely that hexavalent chromium, as a component of total chromium, could have a concentration higher than total chromium. The two are similar and hexavalent chromium is estimated.

The attached time-concentration plot for unfiltered hexavalent chromium in well 13S (**Figure 2**) indicates a significant decrease in the concentrations of hexavalent chromium after August 1993. Between November 1994 and May 1999, the hexavalent chromium concentrations in well 13S have been at or slightly above the NYSGWS. The past three semi-annual sampling event results have shown decreases and have been lower than the NYSGWS.

Neither total chromium nor hexavalent chromium were detected in surface water location SW-B during this reporting period.

3.3 Volatile Analytical Results

Carbon tetrachloride was detected in well M-27D at 16.2 ug/l. The federal drinking water standard for carbon tetrachloride is 5 ug/l. The attached time-concentration plot for carbon tetrachloride in well M-27D (**Figure 3**) demonstrates that the October 2001 concentration remains relatively low and is decreasing with time. Chloroform was detected in well M-27D at 1.1 ug/l. The NYSGWS for chloroform is 7 ug/l. Trichloroethylene was detected in well M-27D at 27 ug/l. Trichlorofluoromethane was detected in well M-27D at 2.2 ug/l. The third party validation identified the acetone detections as estimated based on low relative response factors in the laboratory calibration standards.

No VOCs were detected in surface water samples SW-A, SW-B and SW-D collected and analyzed during the October 2001 sampling event. The third party validation identified the acetone detections as estimated based on low relative response factors in the laboratory calibration standards.

Additionally, the third party validation identified the carbon tetrachloride in the sample from SW-B as carry over from the previous sample, and the result was edited to non detection.

3.4 Comparison of Observed VOC Concentrations to Simulation Results

As described in the O&M-GW report, the carbon tetrachloride and trichloroethylene concentrations observed during the semi-annual monitoring are to be compared to the results from the contaminant fate and transport modeling reported in Appendix A of the O&M-GW. This comparison was performed for carbon tetrachloride in monitoring well M-27D (**Figure 4**) and for trichloroethylene in monitoring well M-33S (**Figure 5**) during the October 2001 sampling event. The starting point for the simulation reported in the O&M-GW report was the carbon tetrachloride spatial distribution as measured in June 1992. As shown in **Figure 4**, the simulated carbon tetrachloride results are much higher than the observed concentrations. As shown in **Figures 5** and **6**, there were no observed concentrations of TCE in monitoring wells M-33S and M-33I as predicted by the simulations.

4.0 INSTITUTIONAL CONTROLS

IT Corporation personnel conducted O&M activities, for Remedial Work Element IV, Institutional Controls, in accordance with the O&M Manual dated September 9, 1999.

4.1 Sampling and Survey Results

On October 23, 2001, concurrent with the O&M for Remedial Work Element I (Drinking Water) and II (Groundwater), IT Corporation personnel conducted a visual inspection of the surrounding areas. The purpose of this inspection was to document any changes or land development activities, specifically looking for the installation of new groundwater wells. This inspection was conducted on the following areas of the site:

- Proximate to the surface water sampling locations, as well as along the access roads and wooded paths leading to these locations.
- Proximate to the monitoring well locations, as well as the access roads leading to these locations. And,
- Proximate to building number 15 at the MRFA site.

The visual inspections did not reveal any signs of development or well installation activities. Visual inspections did reveal indications of recent survey work throughout the site, as indicated by survey tape. In addition, visual inspections revealed improvements to roadways, particularly in the area of the M-33 well locations. Improvements were limited to widening and smoothing of dirt roadways.

4.2 Interviews with Property Owners

IT Corporation personnel conducted telephone interviews with the following representatives:

- Hal Brodie representing NYSERDA was interviewed on December 17, 2001.

- Alexander Mackey representing Luther Forest Corporation was interviewed on December 3, 2001 and,

- Ray Kazyaka, Sr. representing Wright-Malta Corporation was mailed the interview log on December 3, 2001. The interview was completed on December 4, 2001 and returned via mail to IT Corporation.

Interview logs documenting the conversations with each of the previously mentioned representatives are included in **Appendix E**. All three representatives indicated that they were not aware of any new ground water usage, proposed changes in land use, or other actions, within the environmental restriction zone, that would impact any condition of the Environmental Restriction Easements and the Declarations of Restrictive Covenants.

5.0 SUMMARY

5.1 Drinking Water

The ground water treatment system is operating as intended and is meeting the performance standards for the MRFA site. All effluent samples collected and analyzed during the current period revealed concentrations below project discharge objectives. Treatment equipment continues to operate satisfactorily, with the only maintenance required being typical of components in use at the facility. System equipment will continue to be monitored as necessary to ensure continued operation of all components and to maintain a reliable source of potable water for the Test Station.

5.2 Groundwater

In summary, only well M-27D had detectable concentrations of carbon tetrachloride above federal drinking water standards. Chromium was detected at a concentration of 43.3 μg/l, and hexavalent chromium was detected at a concentration of 43.6 μg/l in well 13S. Carbon tetrachloride was not detected in the monitoring wells adjacent to the Luther Forest Well Field. Based on the current analytical results, the ground water from the MRFA Site does not appear to be impacting the Luther Forest Well Field or the water supply wells north of the site.

Comparison of the observed carbon tetrachloride concentrations to simulated carbon tetrachloride concentrations at selected EWMS monitoring well locations shows that the simulated concentrations are higher than the observed concentrations. The simulated TCE concentrations are also higher than the observed TCE concentrations in M-27S and M-27D. TCE was not detected in M-33S or M-33I. Future comparisons will continue to help assess the natural attenuation and degradation of VOCs in ground water at the MRFA Site.

5.3 Institutional Controls

The visual inspection completed during the October 23 site visit did not reveal any signs of site development or well installation activities. Visual inspections did reveal indications of recent land surveying activity, as well as limited improvements to dirt roadways, primarily in the area of the M-33 well locations. These inspections were conducted on those areas of the environmental restriction zone proximate to the Wright-Malta Test Station, building #15, the surface water sampling locations and the ground water monitoring wells that were sampled.

Additionally, representatives of NYSERDA, Luther Forest Corporation and Wright-Malta Corporation were interviewed (**Appendix E**). All three representatives indicated that they were not aware of any new ground water usage, proposed changes in land use, or other actions, within the environmental restriction zone, that would impact any condition of the Environmental Restriction Easements and the Declarations of Restrictive Covenants.

TABLES

TABLE 1
MAINTENANCE CHECKLIST
OPERATION AND MAINTENANCE PLAN
TEST STATION WATER SUPPLY AND TREATMENT SYSTEM
MALTA ROCKET FUEL AREA SITE

Equipment Name	Item	Action	Frequency	Comments
Well Pump 1D	Pump bowls	Check for signs of iron fouling & impeller wear	Annually	More frequently as problems occur
Well Pump 2D	Pump bowls	Check for signs of iron fouling & impeller wear	Annually	More frequently as problems occur
Control Valves	Miscellaneous	Inspect for leaks	Monthly	Adjust frequency depending on operating experience
Air Stripper Sight Tube		Inspect for siltation and biofouling	Monthly	Adjust frequency depending on operating experience
Air Stripper Spray Nozzle		Inspect for fouling	Annually	No required routine maintenance
Air Stripper Blower	Intake	Inspect and clean	Quarterly	Adjust frequency depending on operating experience
Air Stripper Blower	Motor & bearings	Check and lubricate	Annually	More frequently as problems occur
Air Stripper Unit	Packing	Clean or replace	Every 5 years	Adjust frequency depending on operating experience
Mist Eliminator	Mesh screen	Clean or replace	Annually	Adjust frequency depending on operating experience

Equipment Name	Item	Action	Frequency	Comments
Settling Tank		Inspect for siltation	Monthly	Adjust frequency depending on operating experience
100K Gallon Reservoir		Inspect for siltation, debris, etc.	Annually	Adjust frequency depending on operating experience
Level Sensor	Probe	Manually check start-up/shutdown. Check probe float for free range of motion. Remove and inspect for buildup of minerals if resistance is detected.	Monthly	Adjust frequency depending on operating experience
Misc. Guys, Hardware etc.		Inspect	Annually	Adjust frequency depending on operating experience

TABLE 2
EQUIPMENT LOG
AIR STRIPPER MAINTENANCE
MALTA ROCKET FUEL AREA SITE

Date	Operator	Operational Status of System	Work Performed
7/6/2001	Karl Ladner	OK	Responded to the site due to recent alarm indicating an AC power failure. System was found to be operational with no problems observed.
7/31/2001	Grant Anderson	OK	System operating normally on arrival. Checked settling tank high level float, reservoir level probe and inspected all system process lines. Tested operation of all system alarms and interlocks - all are operating properly. Took air stripper blower motor running amperage readings (3.55 amps). No problems were noted.
8/30/2001	Grant Anderson	OK	System operating normally on arrival. Checked settling tank high level float, reservoir level probe and inspected all system process lines. Observed moderate sweating on pipes due to humidity but no leaks were observed. Tested operation of all system alarms and interlocks - all are operating properly. Collected quarterly influent and effluent performance samples from the air stripper.
9/27/2001	Grant Anderson	OK	Inspected system piping and valves. Checked settling tank and associated high level float. Checked air stripper blower intake. Cycled system and took water flow readings. Beginning to note buildup of sand in settling tank. No other problems observed.
10/23/2001	Grant Anderson Bob Hyde	OK	Collected influent and effluent performance samples from air stripper for laboratory analysis. Checked settling tank pump and sump. Inspected system process piping and valves. Collected samples from RW-1D and RW-2D sample ports. PVC control valve on RW-1D fractured during sample activities. This pump was subsequently idled, locked and tagged. System was left running on RW-2D alone until repairs can be made. Instantaneous flow rate was not adjusted.
10/30/01	Grant Anderson	OK – System idled mid-morning for repairs and hardware installation.	Shut down system to install enhancements and to make repairs to the manifold piping. Installed new control and check valves, replaced piping between totalizers and air stripper tower influent line. Working on installing RTU expansion module, air stripper blower motor current sensor and air velocity transmitter.
10/31/2001	Grant Anderson	System still idle while enhancements are being completed.	Completed fabrication of new manifold piping. Still working on completing system enhancements.
11/1/2001	Grant Anderson	OK after system restart	Completed system enhancements. System operating properly.

Date	Operator	Operational Status of System	Work Performed
11/2/2001	Grant Anderson	OK	Performed follow-up visit to document system performance after completion of system enhancements. Tested all system alarms and interlocks. Found building temperature switch was not working properly. Dis-assembled switch and cleaned contacts. Restored temperature switch to good working order. All other alarms and interlocks are working properly.
11/19/2001	Grant Anderson	OK	Responded to the site due to a low blower pressure/low motor amperage alarm. System operating normally on arrival. Alarm appears to be spurious. Tested all system alarms and interlocks. Inspected system piping and valves. Checked settling tank sump pump and associated piping. No problems observed with system operation.
12/5/2001	Grant Anderson	OK	Checked all system settings and interlocks due to recent alarms. Adjusted settings on air stripper blower motor current sensor to mitigate spurious alarms. Checked all system equipment, took flow readings and visually inspected stripper sight tube and blower intake. Inspected all system piping and valves with no problems observed.

TABLE 3 - SHEET 1/2
PROCESS OPERATING REPORT
WATER TREATMENT SYSTEM
MALTA ROCKET FUEL AREA SITE

1	2	3					4					5
DATE	TIME	WATER FLOW --LINE 1D					WATER FLOW --LINE 2D					PROBLEMS OR COMMENTS
		1D LINE FLOW METER RDG(GPM)	1D LINE TOTALIZER RDG(GAL)	ELAPSED TIME (DAYS)	TOTAL FLOW THIS PERIOD (GAL)	AVG FLOW THIS PERIOD (GPM)	2D LINE FLOW METER RDG(GPM)	2D LINE TOTALIZER RDG(GAL)	ELAPSED TIME (DAYS)	TOTAL FLOW THIS PERIOD (GAL)	AVG FLOW THIS PERIOD (GPM)	
7/31/01	8:15	6.1	787,070	39	12,360	0.22	6.5	782,300	39	13,070	0.23	
8/30/01	8:45	6.2	801,447	30	14,377	0.33	6.6	797,340	30	15,040	0.35	
9/27/01	12:30	6.2	818,530	28	17,083	0.42	6.5	815,320	28	17,980	0.45	
10/23/01	11:00	6.2	833,535	26	15,005	0.40	6.5	831,590	26	16,270	0.43	
11/1/01	10:00	6.1	833,650	9	115	0.01	6.4	840,580	9	8,990	0.69	
11/2/01	8:30	5.9	836,150	1	2,500	1.74	5.9	842,630	1	2,050	1.42	
11/19/01	10:00	6.5	847,000	18	13,350	0.52	6	852,740	18	12,160	0.47	
12/5/01	9:30	6.3	856,430	16	9,430	0.41	6.1	861,590	16	8,850	0.38	
Summary				167	84,220	0.3502			167	94,410	0.3926	

NR = Not Recorded
NA = Not Applicable

TABLE 3 - SHEET 2/2
PROCESS OPERATING REPORT
WATER TREATMENT SYSTEM
MALTA ROCKET FUEL AREA SITE

1	2	3			4	5
DATE	TIME	STANDPIPE LEVEL (FT)	LEVEL PROBE OK?	SAMPLES TAKEN?	AIR BLOWER PRESSURE OK?	PROBLEMS OR COMMENTS
7/31/01	8:15	12.75	Yes	No	3.40	
8/30/01	8:45	12.75	Yes	Yes	3.45	
9/27/01	12:30	12.75	Yes	No	3.40	
10/23/01	11:00	12.90	Yes	Yes	3.40	
11/1/01	10:00	12.75	Yes	No	3.35	
11/2/01	8:30	12.75	Yes	No	3.35	
11/19/01	10:00	12.75	Yes	No	3.40	
12/5/01	8:15	12.75	Yes	No	3.30	

TABLE 4
SUMMARY OF DRINKING WATER SAMPLING PROGRAM, PRESERVATIVES, HOLDING TIMES AND CONTAINERS
MALTA ROCKET FUEL AREA SITE

Sample	Sampling Frequency	Sample Matrix	Analytical Parameters	Analytical Method Reference[1]	Sample Preservation	Holding Times[2]	Containers
Influent	1 per quarter	Water	CLP OLC VOCs	USEPA CLP OLCO2	Hcl, Cool, <4°C	14 days	3 - 40 ml glass vials with teflon septa and plastic screw caps
Effluent	1 per quarter	Water	CLP OLC VOCs	USEPA CLP OLCO2	Hcl, Cool, <4°C	14 days	3 - 40 ml glass vials with teflon septa and plastic screw caps

Notes:

1. *USEPA CLP OLCO2 analysis modified to include hexachlorobutadiene, 1,2,3 trichlorobenzene and trichlorofluoromethane to match the EWMS ground water analyses.*
2. *Holding times begin at the time of sample collection.*

TABLE 5
OCTOBER 2001 WATER QUALITY ANALYTICAL RESULTS
SEMI-ANNUAL SAMPLING

Compound	Remedial Action Objective	DGC-3S	DGC-4S	13S	M-27S	DUPA (27S)	M-27D	M-33S	M-33I	Trip Blank
Acetone	50	5.0 UJ	5.0 UJ	NA	5.0 UJ	5.0 UJ	5.0 UJ	5.0 UJ	5.0 UJ	5.0 UJ
Carbon Disulfide	None*	1 U	1 U	NA	1 U	1 U	1 U	1 U	1 U	1 U
Carbon Tetrachloride	5	1 U	1 U	NA	1 U	1 U	16.2	1 U	1 U	1 U
Chloroform	7	1 U	1 U	NA	1 U	1 U	1.1	1 U	1 U	1 U
Trichloroethylene	5	1 U	1 U	NA	1 U	1 U	27 D	1 U	1 U	1 U
Trichlorofluoromethane	5*	1 U	1 U	NA	1 U	1 U	2.2	1 U	1 U	1 U
Chromium	50*	NA	NA	43.3	1.2 U	1.2 U	1.5 B	NA	NA	NA
Hexavalent Chromium	50*	NA	NA	43.6 J	10 U	10 U	10 U	NA	NA	NA
Field Parameters										
pH	-	6.31	7.86	7.27	7.49	7.49	7.49	8.16	10.83	-
Temperature (celsius)	-	9.64	9.06	9.53	9.04	9.04	9.04	8.32	8.46	-
Conductivity (umhos/cm)	-	156	244	353	241	241	241	156	214	-
Dissolved Oxygen	-	1.54	5.38	10.63	11.63	11.63	11.63	9.18	8.73	-
Turbidity (NTUs)	-	NA	NA	NA	NA	NA	NA	NA	NA	-
Depth To Water (feet)	-	15.15	8.15	33.44	40.57	40.57	39.64	17.2	31.41	-
Ground Water Elevation (feet)	-	200.13	197.65	295.47	282.53	282.53	283.46	287.07	272.28	-

Notes:

1. All analytical concentrations are in µg/l (micrograms per liter (ppb)).
2. Only compounds detected at one or more sampling points are listed.
3. NA - not analyzed for.
4. U - analyte was not detected, and value shown is the detection limit.
5. J - estimated value due to data validation requirements or concentration less than CRQL (organics only).
6. B - The reported value is less than the CRDL but greater than the IDL (inorganics only).

* Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

7. D - Indentifies all compounds analyzed at a secondary dilution factor.
8. NM - Not measured due to equipment malfunction.

TABLE 5 (Continued)
OCTOBER 2001 WATER QUALITY ANALYTICAL RESULTS
SEMI-ANNUAL SAMPLING

Parameter	Remedial Action Objective	SW-A	SW-B	SW-D
Acetone	50	5.0 UJ	5.0 UJ	5.0 UJ
Carbon Disulfide	None*	1 U	1 U	1 U
Carbon Tetrachloride	5	1 U	1 U	1 U
Chloroform	7	1 U	1 U	1 U
Trichloroethylene	5	1 U	1 U	1 U
Chromium	50*	NA	1.2 U	NA
Hexavalent Chromium	50*	NA	10 U	NA
Field Parameters				
pH	-	7.56	7.69	7.66
Temperature (celsius)	-	9.80	10.52	10.48
Conductivity (umhos/cm)	-	246	307	364
Dissolved Oxygen	-	9.74	9.51	9.30
Turbidity (NTUs)	-	NA	NA	NA
Depth To Water (feet)	-	-	-	-
Ground Water Elevation (feet)	-	-	-	-

Notes:

1. All analytical concentrations are in µg/l (micrograms per liter (ppb)).
2. Only parameters detected in one or more sampling points are listed.
3. NA - not analyzed for.
4. U - analyte was not detected, and value shown was the detection limit.
5. J - estimated value due to data validation requirements or concentration less than CRQL (organics only).
6. B - The reported value is less than the CRDL but greater than the IDL (inorganics only).

* Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

7. NM - Not measured due to equipment malfunction.

TABLE 6 (MONITORING WELLS DGC-3S, DGC-4S, 13S)
SUMMARY OF WATER QUALITY ANALYTICAL RESULTS
JUNE 1987 - OCTOBER 2001
SEMI-ANNUAL SAMPLING

Wells / Compounds	Remedial Action	6/29-			1/19-	4/18-	7/20-	10/11-	1/19-
DGC-3S	**Objective**	**7/1/87**	**7/31/87**	**11/5/87**	**1/20/88**	**4/19/88**	**7/21/88**	**10/12/88**	**1/20/89**
Benzene	0.7*	ND	NA	ND	ND	ND	ND	ND	ND
Carbon Disulfide	None*	ND	NA	ND	ND	ND	ND	ND	NA
Aluminum	100*	0.48	NA	NA	NA	NA	NA	NA	NA
Lead	25*	NA	NA	NA	NA	<0.005 mg/L	NA	NA	NA
Chromium	50*	NA	NA	NA	NA	NA	NA	NA	NA
Hexavalent Chromium	50*	no data	no data	no data	no data	no data	no data	no data	no data
DGC-4S									
Carbon Disulfide	None*	--	--	--	--	--	--	--	--
Chromium	50*	--	--	--	--	--	--	--	--
13S									
Benzene	0.7*	NA	NA	NA	NA	NA	NA	NA	NA
Carbon Disulfide	None*	NA	NA	NA	NA	NA	NA	NA	NA
Carbon Tetrachloride	5	NA	NA	NA	NA	NA	NA	NA	NA
Chloroform	7	NA	NA	NA	NA	NA	NA	NA	NA
Trichloroethylene	5	NA	NA	NA	NA	NA	NA	NA	NA
Trichlorofluoromethane	5*	NA	NA	NA	NA	NA	NA	NA	NA
Chromium	50*	NA	NA	NA	NA	NA	NA	NA	NA
Hexavalent Chromium	50*	NA	NA	NA	NA	NA	NA	NA	NA

Notes:

Units are µg/l (ppb) unless otherwise stated.

Only detected compounds are listed.

NA = Not analyzed.

ND = Not detected.

B = The reported value is less than the CRQL/CRDL but greater than the IDL.

dp = Duplicate sample.

E = Estimated concentration: due to interference.

D = Concentration determined from a sample dilution.

J = Estimated concentration.

V = Estimated concentration: due to variance to quality control limits.

- - = Not sampled: well installed in December, 1990.

* Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

** = Filtered Sample.

TABLE 6 (MONITORING WELLS DGC-3S, DGC-4S, 13S)
SUMMARY OF WATER QUALITY ANALYTICAL RESULTS
JUNE 1987 - OCTOBER 2001
SEMI-ANNUAL SAMPLING

Wells / Compounds	Remedial Action								4/8-
DGC-3S	Objective	4/10/89	7/12/89	8/15/89	11/30/89	5/30/90	8/28/90	12/6/90	4/10/91
Benzene	0.7*	ND	ND	ND	ND	ND	ND	ND	ND
Carbon Disulfide	None*	ND	ND	ND	ND	ND	ND	NA	8 V / 7 Vdp
Aluminum	100*	NA	NA	NA	NA	NA	NA	NA	NA
Lead	25*	NA	NA	NA	NA	NA	NA	NA	NA
Chromium	50*	NA	NA	NA	NA	NA	NA	NA	NA
Hexavalent Chromium	50*	no data	no data	no data	no data	NA	NA	NA	NA
DGC-4S									
Carbon Disulfide	None*	--	--	--	--	--	--	--	ND/0.5Vdp
Chromium	50*	--	--	--	--	--	--	--	NA
13S									
Benzene	0.7*	NA	NA	NA	NA	NA	NA	NA	2
Carbon Disulfide	None*	NA	NA	NA	NA	NA	NA	NA	60 D
Carbon Tetrachloride	5	NA	NA	NA	NA	18/16 dp	6.4	4.4	8
Chloroform	7	NA	NA	NA	NA	ND	ND	ND	ND
Trichloroethylene	5	NA	NA	NA	NA	ND	ND	ND	ND
Trichlorofluoromethane	5*	NA	NA	NA	NA	ND	ND	ND	ND
Chromium	50*	NA	NA	NA	NA	NA	NA	NA	336 V
Hexavalent Chromium	50*	NA	NA	NA	NA	NA	NA	NA	NA

Notes:

Units are µg/l (ppb) unless otherwise stated.

Only detected compounds are listed.

NA = Not analyzed.

ND = Not detected.

B = The reported value is less than the CRQL/CRDL but greater than the IDL.

dp = Duplicate sample.

E = Estimated concentration: due to interference.

D = Concentration determined from a sample dilution.

J = Estimated concentration.

V = Estimated concentration: due to variance to quality control limits.

- - = Not sampled: well installed in December, 1990.

* Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

** = Filtered Sample.

TABLE 6 (MONITORING WELLS DGC-3S, DGC-4S, 13S)
SUMMARY OF WATER QUALITY ANALYTICAL RESULTS
JUNE 1987 - OCTOBER 2001
SEMI-ANNUAL SAMPLING

Wells / Compounds	Remedial Action Objective	6/12-6/13/91	9/23-9/24/91	12/26-12/27/91	2/10-2/11/92	6/1-6/2/92	9/28-9/29/92	11/18-11/19/92	3/17-3/18/93
DGC-3S									
Benzene	0.7*	ND	0.2 J	ND	ND/NDdp	ND	ND	ND	ND
Carbon Disulfide	None*	4	ND	ND	ND/NDdp	ND	ND	ND	ND
Aluminum	100*	NA	NA	NA	NA	NA	NA	NA	NA
Lead	25*	NA	NA	NA	NA	NA	NA	NA	NA
Chromium	50*	NA	6.1	62.2E/70.3Edp	16.2/ND*, 14.6/ND*dp	25.2/ND*	ND	33.6/ND*	18.5
Hexavalent Chromium	50*	NA	NA	NA	ND/4*/ND dp	NA	NA	NA	NA
DGC-4S									
Carbon Disulfide	None*	ND	ND	ND	ND	ND	ND/ND dp	4 V	ND
Chromium	50*	NA	15.9	11.9 E	ND/ND*	ND/ND*	ND/ND dp	8.6 B	48.1/ND*
13S									
Benzene	0.7*	0.7/0.6 Jdp	1	ND	ND	ND	ND	0.4 JV	ND
Carbon Disulfide	None*	0.6	ND	ND	ND	ND	ND	ND	ND
Carbon Tetrachloride	5	24 J/24 Jdp	8	12	9	6 J	9	16 V	15
Chloroform	7	0.8/0.9 Jdp	ND	0.4 J	0.3 J	ND	ND	0.6 V	0.6
Trichloroethylene	5	ND	0.4 J	0.9	0.6	ND	0.6	1 V	2
Trichlorofluoromethane	5*	ND	ND	ND	ND	ND	0.5	0.9 V	2
Chromium	50*	NA	269/261**	316 E/562 E**	282/498**	504/512**	179/172**	585/576**	746/614**
Hexavalent Chromium	50*	NA	280	486/302**	260/310**	NA	287	493	663

Notes:

Units are µg/l (ppb) unless otherwise stated.

Only detected compounds are listed.

NA = Not analyzed.

ND = Not detected.

B = The reported value is less than the CRQL/CRDL but greater than the IDL.

dp = Duplicate sample.

E = Estimated concentration: due to interference.

D = Concentration determined from a sample dilution.

J = Estimated concentration.

V = Estimated concentration: due to variance to quality control limits.

- - = Not sampled: well installed in December, 1990.

* Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

** = Filtered Sample.

TABLE 6 (MONITORING WELLS DGC-3S, DGC-4S, 13S)
SUMMARY OF WATER QUALITY ANALYTICAL RESULTS
JUNE 1987 - OCTOBER 2001
SEMI-ANNUAL SAMPLING

Wells / Compounds	Remedial Action Objective	5/25-5/26/93	8/24-8/25/93	11/8-11/9/93	2/22-2/23/94	5/18-5/19/94	8/24-8/25/94	11/15-11/16/94	5/23/95
DGC-3S									
Benzene	0.7*	ND	ND	ND	ND	ND V	ND	ND	ND
Carbon Disulfide	None*	ND	0.8	ND	ND	ND V	ND	ND	ND
Aluminum	100*	NA	NA	NA	NA	NA	NA	NA	NA
Lead	25*	NA	NA	NA	NA	NA	NA	NA	NA
Chromium	50*	4.3 B	4.7B	19.4	23.9	4.5 B	9.9 B	11.1	NA
Hexavalent Chromium	50*	NA	NA	NA	NA	NA	NA	NA	NA
DGC-4S									
Carbon Disulfide	None*	0.3 J	0.2J	ND	ND	ND V/ND V dp	ND	ND	ND
Chromium	50*	ND	3.3B	ND	31.2/ND*	ND/ND dp	5.6 B	ND	NA
13S									
Benzene	0.7*	ND	ND	ND	ND/ND dp	ND	ND	ND	NA
Carbon Disulfide	None*	ND	ND	ND	ND/ND dp	ND	ND	ND	NA
Carbon Tetrachloride	5	10	17	18	20/9 dp	9	9	9	NA
Chloroform	7	0.4 J	0.6	0.7	ND/ND dp	0.4 J	0.3 J	ND	NA
Trichloroethylene	5	0.6	ND	2	2/1 dp	0.8	1	0.9	NA
Trichlorofluoromethane	5*	0.5	ND	2	2/1 dp	0.9	1	ND	NA
Chromium	50*	198/609**	787/716**	572/610**	580/357** 567/357** dp	406/434**	133 V/157 V**	44.2 V/95.8 V**	140 J
Hexavalent Chromium	50*	460	800	560	530/540 dp	340	101	36	150

Notes:

Units are µg/l (ppb) unless otherwise stated.

Only detected compounds are listed.

NA = Not analyzed.

ND = Not detected.

B = The reported value is less than the CRQL/CRDL but greater than the IDL.

dp = Duplicate sample.

E = Estimated concentration: due to interference.

D = Concentration determined from a sample dilution.

J = Estimated concentration.

V = Estimated concentration: due to variance to quality control limits.

- - = Not sampled: well installed in December, 1990.

* Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

** = Filtered Sample.

TABLE 6 (MONITORING WELLS DGC-3S, DGC-4S, 13S)
SUMMARY OF WATER QUALITY ANALYTICAL RESULTS
JUNE 1987 - OCTOBER 2001
SEMI-ANNUAL SAMPLING

Wells / Compounds	Remedial Action								
DGC-3S	**Objective**	**10/17/95**	**5/14/96**	**10/23/96**	**6/2/97**	**10/14/97**	**5/28/98**	**10/29/98**	**5/11/99**
Benzene	0.7*	ND	ND	ND	ND	ND	ND	ND	ND
Carbon Disulfide	None*	ND	ND	ND	ND	ND	ND	ND	ND
Aluminum	100*	NA	NA	NA	NA	NA	NA	NA	NA
Lead	25*	NA	NA	NA	NA	NA	NA	NA	NA
Chromium	50*	NA	NA	NA	NA	NA	NA	NA	NA
Hexavalent Chromium	50*	NA	NA	NA	NA	NA	NA	NA	NA
DGC-4S									
Carbon Disulfide	None*	ND	ND	ND	ND	ND	ND	ND	ND
Chromium	50*	NA	NA	NA	NA	NA	NA	NA	NA
13S									
Benzene	0.7*	NA	NA	NA	1U	1U	NA	NA	NA
Carbon Disulfide	None*	NA	NA	NA	1U	1U	NA	NA	NA
Carbon Tetrachloride	5	NA	NA	NA	1U	8	NA	NA	NA
Chloroform	7	NA	NA	NA	1U	1U	NA	NA	NA
Trichloroethylene	5	NA	NA	NA	NA	NA	NA	NA	NA
Trichlorofluoromethane	5*	NA	NA	NA	NA	NA	NA	NA	NA
Chromium	50*	52.7 J	44.8	46.4	90.7/90.9**	71.4	71.2	98.6 J	72.4
Hexavalent Chromium	50*	48	47	47	97	67	51	54.0 J	71.0

Notes:

Units are µg/l (ppb) unless otherwise stated.

Only detected compounds are listed.

NA = Not analyzed.

ND = Not detected.

B = The reported value is less than the CRQL/CRDL but greater than the IDL.

dp = Duplicate sample.

E = Estimated concentration: due to interference.

D = Concentration determined from a sample dilution.

J = Estimated concentration.

V = Estimated concentration: due to variance to quality control limits.

- - = Not sampled: well installed in December, 1990.

* Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

** = Filtered Sample.

TABLE 6 (MONITORING WELLS DGC-3S, DGC-4S, 13S)
SUMMARY OF WATER QUALITY ANALYTICAL RESULTS
JUNE 1987 - OCTOBER 2001
SEMI-ANNUAL SAMPLING

Wells / Compounds	Remedial Action Objective	10/26/99	5/22/00	10/24/00	5/15/01	10/23/01
DGC-3S						
Benzene	0.7*	ND	ND	ND	ND	ND
Carbon Disulfide	None*	ND	ND	ND	ND	ND
Aluminum	100*	NA	NA	NA	NA	NA
Lead	25*	NA	NA	NA	NA	NA
Chromium	50*	NA	NA	NA	NA	NA
Hexavalent Chromium	50*	NA	NA	NA	NA	NA
DGC-4S						
Carbon Disulfide	None*	ND	ND	ND	ND	ND
Chromium	50*	NA	NA	NA	NA	NA
13S						
Benzene	0.7*	NA	NA	NA	NA	NA
Carbon Disulfide	None*	NA	NA	NA	NA	NA
Carbon Tetrachloride	5	NA	NA	NA	NA	NA
Chloroform	7	NA	NA	NA	NA	NA
Trichloroethylene	5	NA	NA	NA	NA	NA
Trichlorofluoromethane	5*	NA	NA	NA	NA	NA
Chromium	50*	169	249	29.9	136	43.3
Hexavalent Chromium	50*	178	262	41	12.3	43.6 J

Notes:

Units are µg/l (ppb) unless otherwise stated.

Only detected compounds are listed.

NA = Not analyzed.

ND = Not detected.

B = The reported value is less than the CRQL/CRDL but greater than the IDL.

dp = Duplicate sample.

E = Estimated concentration: due to interference.

D = Concentration determined from a sample dilution.

J = Estimated concentration.

V = Estimated concentration: due to variance to quality control limits.

- - = Not sampled: well installed in December, 1990.

* Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

** = Filtered Sample.

TABLE 7 (MONITORING WELLS M-27, M-27D, M-33S, M-33I)
SUMMARY OF WATER QUALITY ANALYTICAL RESULTS
JUNE 1992 - OCTOBER 2001
SEMI-ANNUAL SAMPLING

M-27S	Remedial Action Objective	6/5/92	11/11/92	3/14/94	5/23/95	10/17/95	5/14/96	10/23/96	6/2/97	10/14/97
Carbon Disulfide	None*	ND	ND	not sampled	ND	ND	ND	ND	ND	ND
Chloromethane	5	40	ND	not sampled	ND	ND	ND	ND	ND	ND
Chromium	50*	8.4 B/ND**	57.4/ND**	not sampled	ND	ND	ND	ND	ND	ND
Hexavalent Chromium	50*	NA	NA	not sampled	ND	ND	ND	ND	ND	ND
M-27D										
Carbon Tetrachloride	5	75/62 dp	23	not sampled	33/42 dp	56	31	28	26	22
Chloroform	7	ND	3	not sampled	4/4 dp	5	3	3	3	2
Chloromethane	5	4 J/28 dp	ND	not sampled	ND/ND dp	ND	ND	ND	ND	ND
Trichloroethylene	5									
Trichlorofluoromethane	5*	no data	no data	not sampled	no data	no data	no data	no data	no data	no data
Chromium	50*	2.0 B/ND** 2.0 B/ND** dp	19.8/ND**	not sampled	ND/ND dp	ND	ND	ND	ND	1.2B
Hexavalent Chromium	50*	NA	NA	not sampled	ND/ND dp	ND	ND	ND	ND	ND
M-33S										
VOCs	-	not sampled	not sampled	ND	ND	ND	ND	ND	ND	ND
M-33I										
VOCs	-	not sampled	not sampled	ND	ND	ND	ND	ND	ND	ND

Notes:

Units are ug/l (ppb) unless otherwise stated.

Only detected compounds are listed.

NA = Not analyzed.

ND = Not detected.

J = Estimated concentration.

dp = Duplicate sample.

B = The reported value is less than the CRQL/CRDL but greater than the IDL.

* Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

** = Filtered Sample.

TABLE 7 (MONITORING WELLS M-27, M-27D, M-33S, M-33I)
SUMMARY OF WATER QUALITY ANALYTICAL RESULTS
JUNE 1992 - OCTOBER 2001
SEMI-ANNUAL SAMPLING

M-27S	Remedial Action Objective	5/28/98	10/29/98	5/11/99	10/26/99	5/22/00	10/24/00	5/15/01	10/23/01
Carbon Disulfide	None*	ND	ND	0.85 J	ND / ND dp	ND	ND	ND / ND dp	ND / ND dp
Chloromethane	5	ND	ND	ND	ND / ND dp	ND	ND	ND / ND dp	ND / ND dp
Chromium	50**	ND	3.2 BJ	0.98B	0.85B/0.90b dp	1.1B	1.2B	ND / ND dp	ND / ND dp
Hexavalent Chromium	50**	ND	ND	ND	ND / ND dp	ND	ND	ND / ND dp	ND / ND dp
M-27D									
Carbon Tetrachloride	5	27	26 / 27 dp	20.3 / 20.1 dp	22.3	26.7D/28.9D dp	19.2/19.8 dp	13,.8	16.2
Chloroform	7	3	2 / 2 dp	1.8 / 1.8 dp	1.8	ND / ND dp	1.7J /1.3 dp	1.1	1.1
Chloromethane	5	ND	ND / ND	ND / ND dp	ND	ND / ND dp	ND / ND dp	ND	ND
Trichloroethylene	5		ND/ND dp	4.1/4.1 dp	10.7	12.8 / 12.1 dp	26.4 /26.5D dp	19.4	27 D
Trichlorofluoromethane	5**	no data	0.3 J / 0.3 J dp	0.92J / 0.99J dp	1.4	1.9 / 1.8 dp	2.9 / 2.9 dp	2.0	2.2
Chromium	50**	ND	4.6 BJ / 4.8 BJ dp	1.4 B / 1.3 B dp	0.81B	2B/1.8B dp	1.2B/1.2B dp	ND	1.5 B
Hexavalent Chromium	50**	ND	ND / ND dp	ND / ND dp	ND	ND/ND dp	ND/ND dp	ND	ND
M-33S									
VOCs	-	ND	ND	ND	ND	ND	ND	8.0 J	ND
M-33I									
VOCs	-	ND	ND	ND	ND	ND	ND	4.1 J	ND

Notes:

Units are ug/l (ppb) unless otherwise stated.

Only detected compounds are listed.

NA = Not analyzed.

ND = Not detected.

J = Estimated concentration.

dp = Duplicate sample.

B = The reported value is less than the CRQL/CRDL but greater than the IDL.

D = Indentifies compound analyzed at a secondary dilution factor.

* Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

** = Filtered Sample.

TABLE 8 (SURFACE WATER)
SUMMARY OF WATER QUALITY ANALYTICAL RESULTS
JUNE 1987 - OCTOBER 2001
SEMI-ANNUAL SAMPLING

Surface Water Points / Compounds	Cleanup	6/29-			1/19-	4/18-	7/20-	10/11-	1/19-		
SW-A	**Standard**	**7/1/87**	**7/31/87**	**11/5/87**	**1/20/88**	**4/19/88**	**7/21/88**	**10/12/88**	**1/20/89**	**4/10/89**	**7/12/89**
Carbon Disulfide	None"	ND	NA	ND	ND	ND	ND	ND	NA	NA	NA
Aluminum	100"	0.12 mg/L	NA	NA	NA	NA	NA	NA	NA	NA	NA
Lead	25"	NA	NA	NA	NA	0.02 mg/L	NA	NA	NA	NA	NA
Chromium	50"	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
SW-B											
Carbon Disulfide	None"	ND	NA	ND	ND	ND	ND	ND	NA	NA	NA
Carbon Tetrachloride	5	ND	NA	ND	ND	ND	ND	ND	1.1/1.1dp	ND	ND
Chloroform	7	ND	NA	ND	ND	ND	ND	ND	ND	ND	ND
Trichloroethylene	5	ND	NA	ND	ND	ND	ND	ND	ND	ND	ND
Trichlorofluoromethane	5"	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Aluminum	100"	0.21 mg/L	NA	NA	NA	NA	NA	NA	NA	NA	NA
Lead	25"	NA	NA	NA	NA	<0.01 mg/L	NA	NA	NA	NA	NA
Chromium	50"	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
SW-D											
Acetone	5"	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Bromochloromethane	5"	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Carbon Disulfide	None"	ND	NA	ND	ND	ND	ND	ND	NA	NA	NA
Carbon Tetrachloride	5	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
1,2-Dichloroethane	0.6"	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Methylene Chloride	5"	ND	ND	0.5	ND	ND	ND	ND	ND	ND	ND
1,2,3-Trichlorobenzene	5"	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Aluminum	100"	0.50 mg/L	NA	NA	NA	NA	NA	NA	NA	NA	NA
Lead	25"	NA	NA	NA	NA	<0.005 mg/L	NA	NA	NA	NA	NA
Chromium	50"	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

Notes:

Units are µg/l (ppb) unless otherwise stated.

Only detected compounds are listed.

NA = Not analyzed.

ND = Not detected.

dp = Duplicate sample.

B = The reported value is less than the CRQL/CRDL but greater than the IDL.

D = Concentration determined from a sample dilution.

E = Estimated concentration : due to interference.

J = Estimated concentration.

V = Estimated concentration: due to variance to quality control limits.

R = Rejected during data validation.

" Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

"" = Filtered Sample.

TABLE 8 (SURFACE WATER)
SUMMARY OF WATER QUALITY ANALYTICAL RESULTS
JUNE 1987 - OCTOBER 2001
SEMI-ANNUAL SAMPLING

Surface Water Points / Compounds SW-A	Cleanup Standard	8/15/89	11/30/89	12/27/89	2/22/90	5/30/90	8/28/90	12/6/90	4/8-4/10/91	6/12-6/13/91	9/23-9/24/91	12/26-12/27/91	2/10-2/11/92
Carbon Disulfide	None*	NA	NA	NA	NA	NA	NA	NA	0.5 V	ND	ND	ND	ND
Aluminum	100*	NA	NA	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Lead	25*	NA	NA	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Chromium	50*	NA	NA	NA	NA	NA	NA	NA	NA	NA	6.6	ND	ND
SW-B													
Carbon Disulfide	None*	NA	NA	NA	NA	NA	NA	NA	ND	0.2 J	ND	ND	ND
Carbon Tetrachloride	5	ND	0.9	NA	0.88	ND	ND	1	0.4 J	0.6 J	0.4 J	0.8	0.8
Chloroform	7	ND	ND	ND	ND	ND	ND	ND	ND	0.2 J	ND	ND	ND
Trichloroethylene	5	ND	ND	ND	ND	ND	ND	ND	ND	0.3 J	ND	0.2 J	ND
Trichlorofluoromethane	5*	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Aluminum	100*	NA	NA	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Lead	25*	NA	NA	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Chromium	50*	NA	NA	NA	NA	NA	NA	NA	NA	NA	ND	ND	ND
SW-D													
Acetone	5*	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Bromochloromethane	5*	ND	1.7, ND dp	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Carbon Disulfide	None*	NA	NA	NA	ND	ND	ND	ND	ND	ND	ND	ND	ND
Carbon Tetrachloride	5	ND	ND	NA	NA	NA	NA	NA	NA	NA	ND	ND	ND
1,2-Dichloroethane	0.6*	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Methylene Chloride	5*	ND	ND	NA	NA	NA	NA	NA	NA	NA	ND	6.3 BE	ND
1,2,3-Trichlorobenzene	5*	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Aluminum	100*	NA	NA	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Lead	25*	NA	NA	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Chromium	50*	NA	NA	NA	NA	NA	NA	NA	ND	2	ND	ND	ND

Notes:

Units are µg/l (ppb) unless otherwise stated.

Only detected compounds are listed.

NA = Not analyzed.

ND = Not detected.

dp = Duplicate sample.

B = The reported value is less than the CRQL/CRDL but greater than the IDL.

D = Concentration determined from a sample dilution.

E = Estimated concentration : due to interference.

J = Estimated concentration.

V = Estimated concentration: due to variance to quality control limits.

R = Rejected during data validation.

* Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

** = Filtered Sample.

TABLE 8 (SURFACE WATER)
SUMMARY OF WATER QUALITY ANALYTICAL RESULTS
JUNE 1987 - OCTOBER 2001
SEMI-ANNUAL SAMPLING

Surface Water Points / Compounds	Cleanup	6/1-	9/28-	11/18-	3/17-	5/25-	8/24-	11/8-	2/22-	5/18-	8/24-	11/15-
SW-A	**Standard**	**6/2/92**	**9/29/92**	**11/19/92**	**3/18/93**	**5/26/93**	**8/25/93**	**11/9/93**	**2/23/94**	**5/19/94**	**8/25/94**	**11/16/94**
Carbon Disulfide	None*	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Aluminum	100*	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Lead	25*	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Chromium	50*	ND	ND	ND	6.1 B	ND	3.2B	ND	ND	ND	ND	ND
SW-B												
Carbon Disulfide	None*	ND	ND	ND	ND	ND	ND	ND	ND/ND dp	ND	ND	ND
Carbon Tetrachloride	5	0.7	0.3 J	0.6 V	ND	ND	0.3 J	0.7	0.4 J/0.4 J dp	0.4 J	0.2 JV	ND
Chloroform	7	0.2 J	ND	ND	ND	ND	ND	0.3 J	ND/ND dp	ND	ND	ND
Trichloroethylene	5	0.3 J	ND	ND	ND	ND	ND	0.2 J	ND/ND dp	ND	ND	ND
Trichlorofluoromethane	5*	no data	ND	ND	2	ND	ND	ND	ND/ND dp	ND	ND V	ND
Aluminum	100*	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Lead	25*	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Chromium	50*	ND	ND	ND	ND	ND	ND	ND	ND/ND dp	ND	ND	ND
SW-D												
Acetone	5*	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Bromochloromethane	5*	no data	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Carbon Disulfide	None*	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Carbon Tetrachloride	5	ND	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
1,2-Dichloroethane	0.6*	no data	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Methylene Chloride	5*	ND	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
1,2,3-Trichlorobenzene	5*	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Aluminum	100*	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Lead	25*	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data	no data
Chromium	50*	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND

Notes:

Units are µg/l (ppb) unless otherwise stated.

Only detected compounds are listed.

NA = Not analyzed.

ND = Not detected.

dp = Duplicate sample.

B = The reported value is less than the CRQL/CRDL but greater than the IDL.

D = Concentration determined from a sample dilution.

E = Estimated concentration : due to interference.

J = Estimated concentration.

V = Estimated concentration: due to variance to quality control limits.

R = Rejected during data validation.

* Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

** = Filtered Sample.

TABLE 8 (SURFACE WATER)
SUMMARY OF WATER QUALITY ANALYTICAL RESULTS
JUNE 1987 - OCTOBER 2001
SEMI-ANNUAL SAMPLING

Surface Water Points / Compounds	Cleanup											
SW-A	**Standard**	**5/23/95**	**10/17/95**	**5/14/96**	**10/23/96**	**6/2/97**	**10/14/97**	**5/28/98**	**10/29/98**	**5/11/99**	**10/26/99**	**5/22/00**
Carbon Disulfide	None*	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Aluminum	100*	no data	no data	no data	no data	no data	no data	no data	NA	NA	NA	NA
Lead	25*	no data	no data	no data	no data	no data	no data	no data	NA	NA	NA	NA
Chromium	50*	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
SW-B												
Carbon Disulfide	None*	ND	ND/ND dp	ND	ND	ND	ND	ND	ND	ND	ND	ND
Carbon Tetrachloride	5	ND	0.7 J/0.6 J dp	ND	0.6J	ND	ND	0.3J	ND	ND	ND	ND
Chloroform	7	ND	ND/ND dp	ND	ND	ND	ND	0.1J	ND	ND	ND	ND
Trichloroethylene	5	ND	ND/ND dp	ND	ND	ND	ND	0.2J	ND	ND	ND	ND
Trichlorofluoromethane	5*	ND	ND/ND dp	ND	ND	ND	ND	ND	ND	ND	ND	ND
Aluminum	100*	no data	no data	no data	no data	no data	no data	no data	NA	NA	NA	NA
Lead	25*	no data	no data	no data	no data	no data	no data	no data	NA	NA	NA	NA
Chromium	50*	ND	ND/ND dp	ND	ND	NA	ND	ND	3.1 BJ	0.44 B	ND	0.9B
SW-D												
Acetone	5*	no data	no data	no data	no data	no data	no data	43 J	R	ND	ND	ND
Bromochloromethane	5*	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Carbon Disulfide	None*	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Carbon Tetrachloride	5	no data	no data	ND	ND	no data	no data	ND	0.2 J	ND	ND	ND
1,2-Dichloroethane	0.6*	1	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
Methylene Chloride	5*	no data	no data	ND	ND	no data	no data	ND	ND	ND	ND	ND
1,2,3-Trichlorobenzene	5*	no data	no data	no data	no data	no data	no data	0.1 J	ND	ND	ND	ND
Aluminum	100*	no data	no data	no data	no data	no data	no data	no data	NA	NA	NA	NA
Lead	25*	no data	no data	no data	no data	no data	no data	no data	NA	NA	NA	NA
Chromium	50*	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA

Notes:

Units are µg/l (ppb) unless otherwise stated.

Only detected compounds are listed.

NA = Not analyzed.

ND = Not detected.

dp = Duplicate sample.

B = The reported value is less than the CRQL/CRDL but greater than the IDL.

D = Concentration determined from a sample dilution.

E = Estimated concentration : due to interference.

J = Estimated concentration.

V = Estimated concentration: due to variance to quality control limits.

R = Rejected during data validation.

* Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

** = Filtered Sample.

TABLE 8 (SURFACE WATER)
SUMMARY OF WATER QUALITY ANALYTICAL RESULTS
JUNE 1987 - OCTOBER 2001
SEMI-ANNUAL SAMPLING

Surface Water Points / Compounds	Cleanup Standard	10/24/00	5/15/01	10/23/01
SW-A				
Carbon Disulfide	None*	ND	ND	ND
Aluminum	100*	NA	NA	NA
Lead	25*	NA	NA	NA
Chromium	50*	NA	NA	NA
SW-B				
Carbon Disulfide	None*	ND	ND	ND
Carbon Tetrachloride	5	0.54J	ND	ND
Chloroform	7	ND	ND	ND
Trichloroethylene	5	ND	ND	ND
Trichlorofluoromethane	5*	ND	ND	ND
Aluminum	100*	NA	NA	NA
Lead	25*	NA	NA	NA
Chromium	50*	0.75B	ND	ND
SW-D				
Acetone	5*	ND	ND	ND
Bromochloromethane	5*	ND	ND	ND
Carbon Disulfide	None*	ND	ND	ND
Carbon Tetrachloride	5	ND	ND	ND
1,2-Dichloroethane	0.6*	ND	ND	ND
Methylene Chloride	5*	ND	ND	ND
1,2,3-Trichlorobenzene	5*	ND	ND	ND
Aluminum	100*	NA	NA	NA
Lead	25*	NA	NA	NA
Chromium	50*	NA	NA	NA

Notes:

Units are µg/l (ppb) unless otherwise stated.

Only detected compounds are listed.

NA = Not analyzed.

ND = Not detected.

dp = Duplicate sample.

B = The reported value is less than the CRQL/CRDL but greater than the IDL.

D = Concentration determined from a sample dilution.

E = Estimated concentration : due to interference.

J = Estimated concentration.

V = Estimated concentration: due to variance to quality control limits.

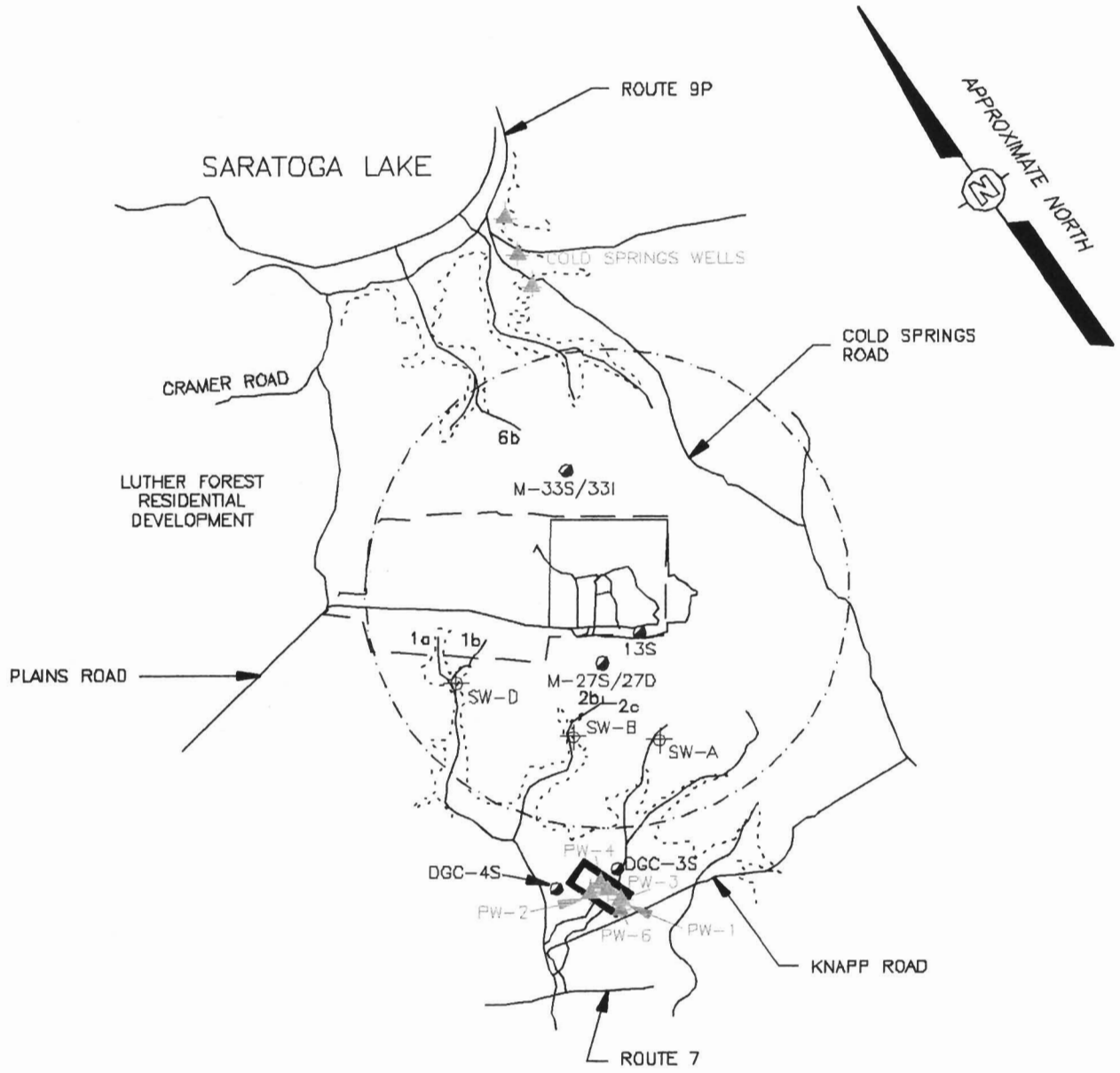
R = Rejected during data validation.

* Based on NYSDEC Final Combined Regulatory Impact and Environmental Impact Statement (Title 6, Chapter X, Parts 700-706, 1998), identified for comparison purposes only.

** = Filtered Sample.

FIGURES

IMAGE	X-REF	OFFICE	DRAWN BY	CHECKED BY	APPROVED BY	DRAWING NUMBER
---	---	ALBANY	S. SHKOLNIK 09-13-01			810066A1



LEGEND

- DGC-4S — WELL PAIR LOCATION & ID#
- PW-2 — PUMPING WELL LOCATION & ID#
- LUTHER FOREST WELL FIELD
- SW-D — SURFACE WATER SAMPLE LOCATION & ID#
- 6b — RAVINE LOCATION & ID#
- — — APPROXIMATE MRFA SITE BOUNDARY
- —·— APPROXIMATE ONE MILE EASEMENT BOUNDARY
- ------ 250' GROUND SURFACE CONTOUR LINE

APPROXIMATE

SCALE

0 3600 7200 FEET

REFERENCE:

REFERENCE DRAWING:
ERM – SEPTEMBER, 1998.

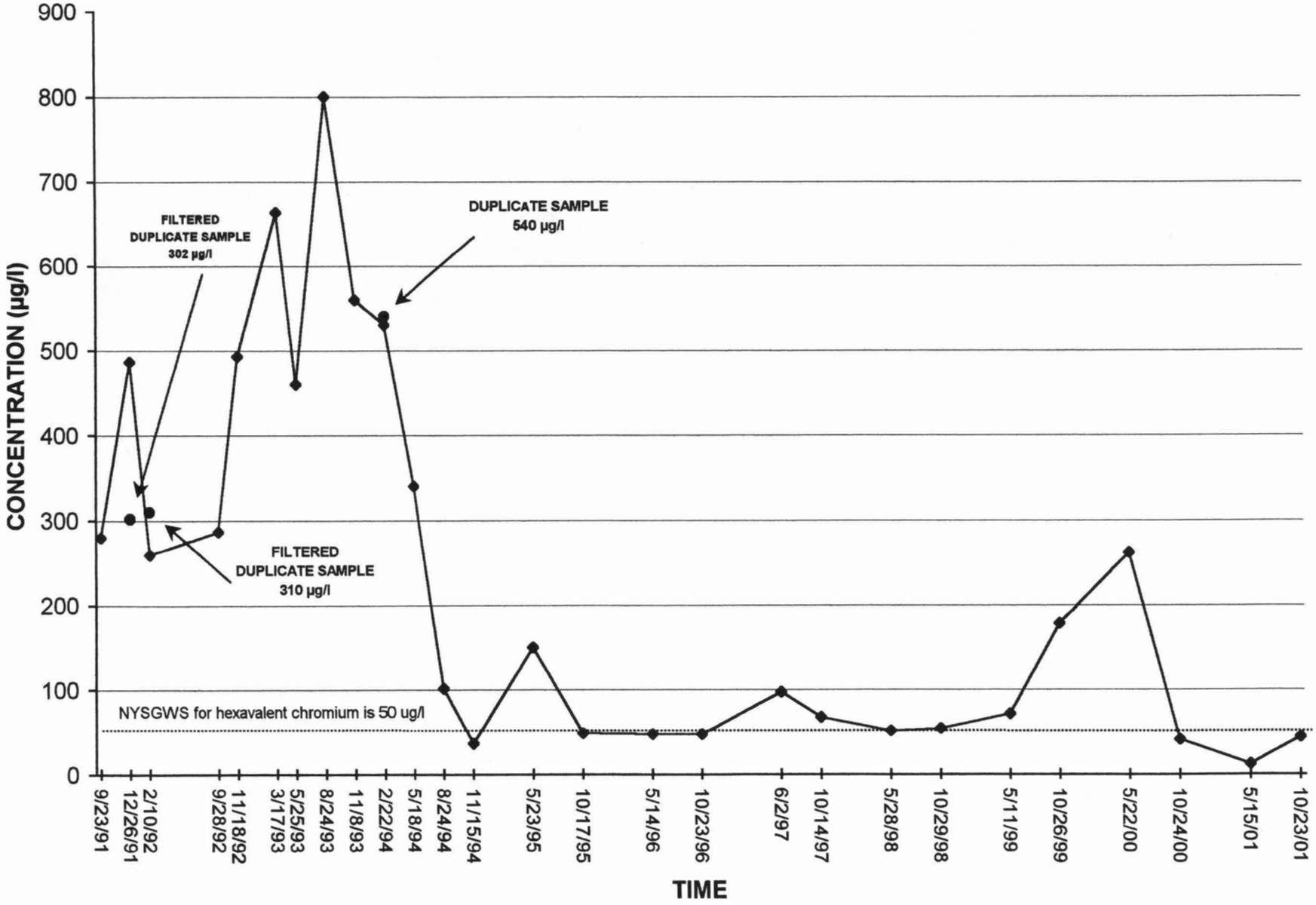
IT CORPORATION

MALTA ROCKET FUEL AREA SITE
MALTA, NEW YORK

FIGURE 1

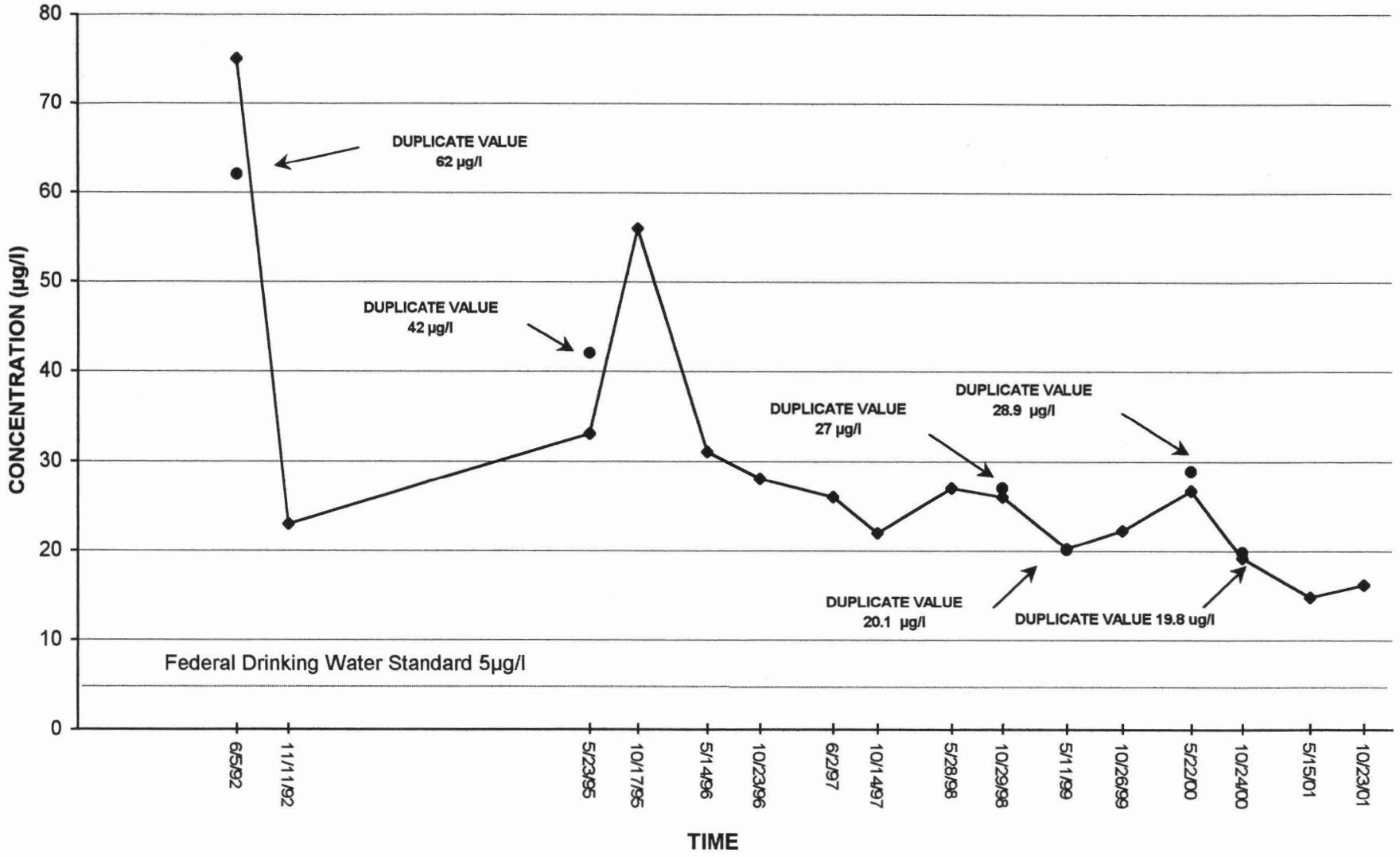
SITE LOCATION MAP

FIGURE 2
WELL 13S HEXAVALENT CHROMIUM CONCENTRATIONS



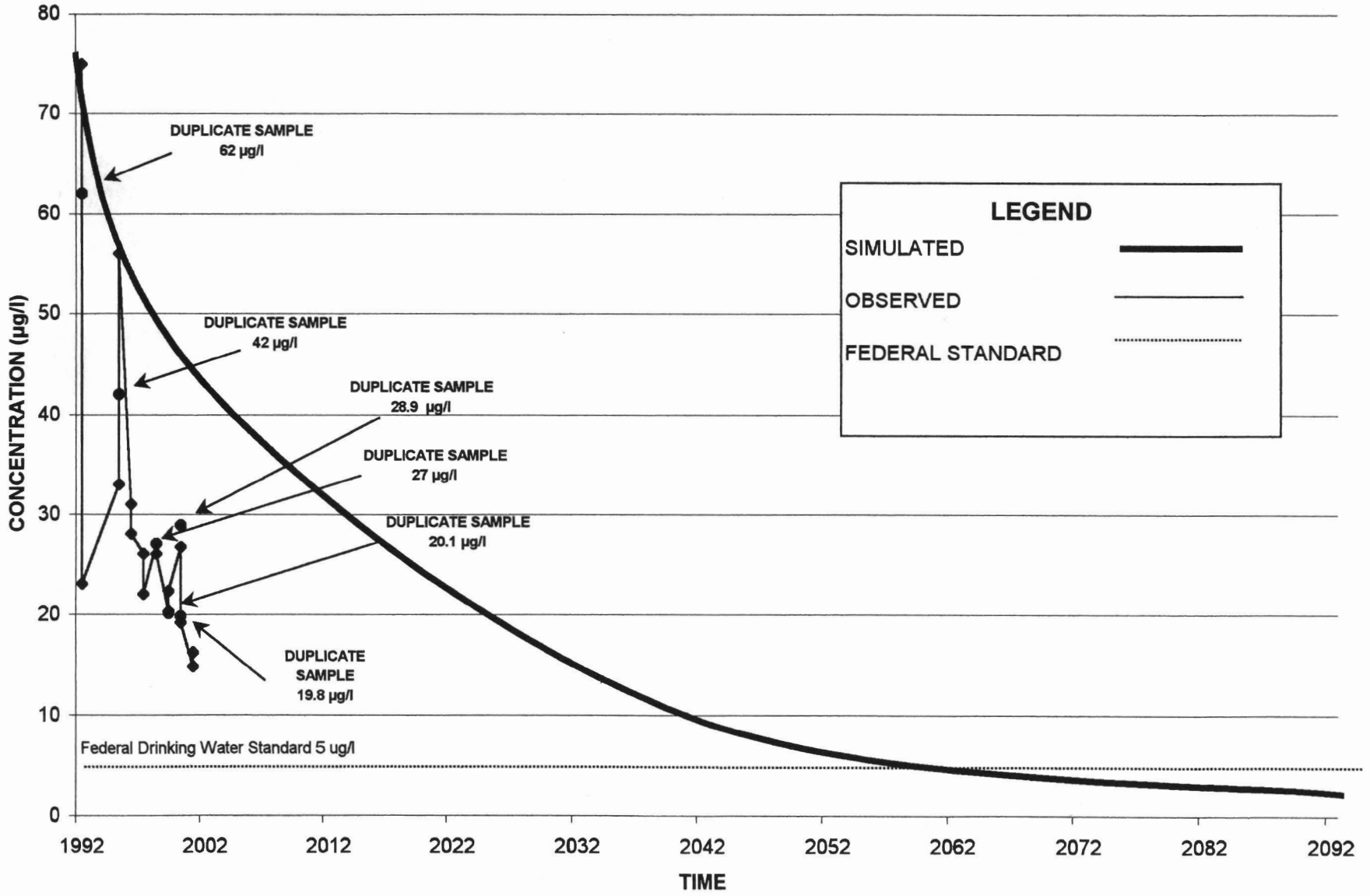
M:/191reps/MRFA/Figures_0102

FIGURE 3
WELL M-27D CARBON TETRACHLORIDE CONCENTRATIONS



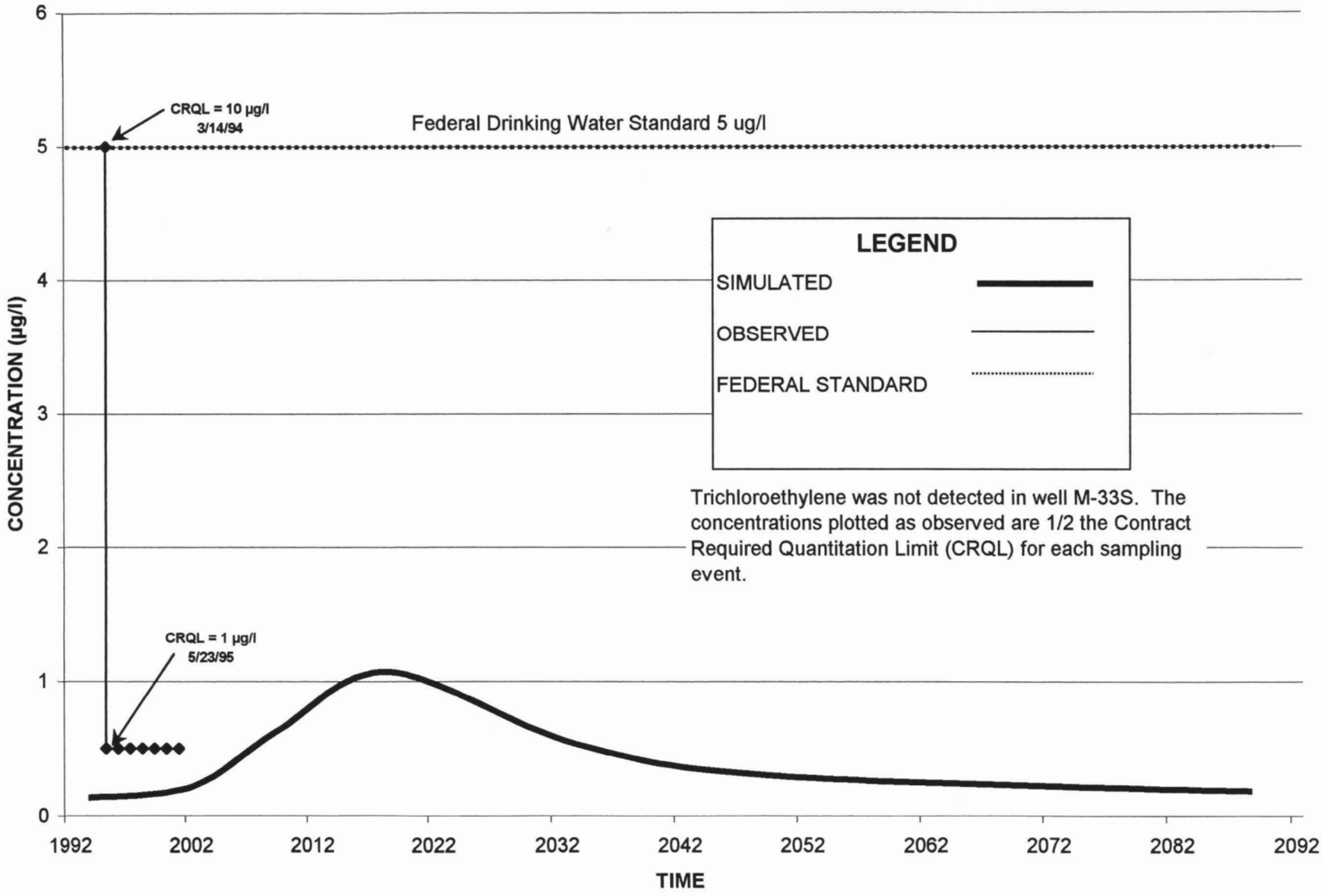
M:/191reps/MRFA/Figures_0102

FIGURE 4
SIMULATED VERSUS OBSERVED (OCTOBER 2001) CARBON TETRACHLORIDE CONCENTRATIONS AT WELL M-27D



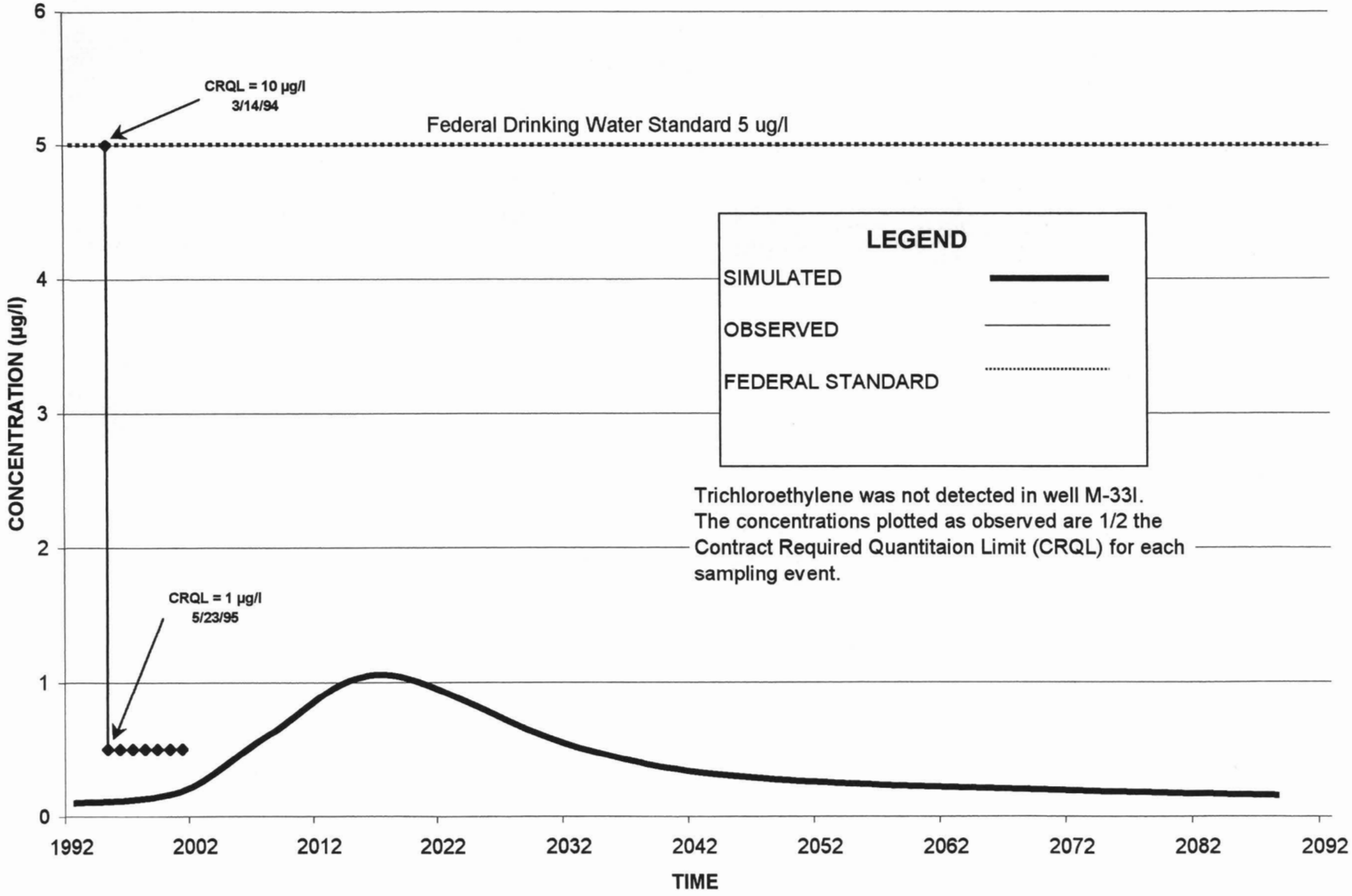
M:/191reps/MRFA/Figures_0102

FIGURE 5
SIMULATED VERSUS OBSERVED (OCTOBER 2001) TRICHLOROETHYLENE CONCENTRATIONS AT WELL M-33S



/gefigdata

FIGURE 6
SIMULATED VERSUS OBSERVED (OCTOBER 2001)
TRICHLOROETHYLENE CONCENTRATIONS
AT WELL M-33I



400.175/gefigdata

APPENDIX A

LABORATORY DATA, INFLUENT/EFFLUENT WATER SAMPLES – AUGUST 30, 2001

1A

VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

STRIP EFF

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490102

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6073

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/07/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L		Q
74-87-3	chloromethane	1.0	U	
75-01-4	vinyl chloride	1.0	U	
74-83-9	bromomethane	1.0	U	
75-00-3	chloroethane	1.0	U	
75-69-4	Trichlorofluoromethane	1.0	U	
75-35-4	1,1-dichloroethene	1.0	U	
67-64-1	acetone	5.0	U	J
75-15-0	carbon disulfide	1.0	U	
75-34-3	1,1-dichloroethane	1.0	U	
75-09-2	methylene chloride	1.0	U	
156-59-2	cis-1,2-Dichloroethene	1.0	U	
156-60-5	trans-1,2-dichloroethene	1.0	U	
67-66-3	chloroform	1.0	U	
78-93-3	2-butanone	5.0	U	J
74-97-5	bromochloromethane	1.0	U	
71-55-6	1,1,1-trichloroethane	1.0	U	
56-23-5	carbontetrachloride	1.0	U	
71-43-2	benzene	1.0	U	
107-06-2	1,2-dichloroethane	1.0	U	
79-01-6	trichloroethene	1.0	U	
78-87-5	1,2-dichloropropane	1.0	U	
75-27-4	bromodichloromethane	1.0	U	
10061-01-5	cis-1,3-dichloropropene	1.0	U	
108-10-1	4-methyl-2-pentanone	5.0	U	
108-88-3	toluene	1.0	U	
10061-02-6	trans-1,3-dichloropropene	1.0	U	
79-00-5	1,1,2-trichloroethane	1.0	U	
127-18-4	tetrachloroethene	1.0	U	
591-78-6	2-hexanone	5.0	U	
124-48-1	dibromochloromethane	1.0	U	
106-93-4	1,2-Dibromoethane	1.0	U	
108-90-7	chlorobenzene	1.0	U	
100-41-4	ethylbenzene	1.0	U	

1A

VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

STRIP EFF

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490102

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6073

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/07/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
1330-20-7	m,p-xylenes	1.0	U
1330-20-7	o-xylene	1.0	U
100-42-5	styrene	1.0	U
75-25-2	bromoform	1.0	U
79-34-5	1,1,2,2-tetrachloroethane	1.0	U
541-73-1	1,3-Dichlorobenzene	1.0	U
106-46-7	1,4-Dichlorobenzene	1.0	U
95-50-1	1,2-Dichlorobenzene	1.0	U
96-12-8	1,2-dibromo-3-chloropropane	1.0	U
120-82-1	1,2,4-Trichlorobenzene	1.0	U
87-68-3	Hexachlorobutadiene	1.0	U
87-61-6	1,2,3-Trichlorobenzene	1.0	U

1E

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

STRIP EFF

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490102

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6073

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/07/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

Number TICs found: 0

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

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

1A

VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

DUPLICATE A

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490103

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6078

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/07/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
74-87-3	chloromethane	1.0	U
75-01-4	vinyl chloride	1.0	U
74-83-9	bromomethane	1.0	U
75-00-3	chloroethane	1.0	U
75-69-4	Trichlorofluoromethane	1.0	U
75-35-4	1,1-dichloroethene	1.0	U
67-64-1	acetone	5.0	U J
75-15-0	carbon disulfide	1.0	U
75-34-3	1,1-dichloroethane	1.0	U
75-09-2	methylene chloride	1.0	U
156-59-2	cis-1,2-Dichloroethene	1.0	U
156-60-5	trans-1,2-dichloroethene	1.0	U
67-66-3	chloroform	1.0	U
78-93-3	2-butanone	5.0	U J
74-97-5	bromochloromethane	1.0	U
71-55-6	1,1,1-trichloroethane	1.0	U
56-23-5	carbontetrachloride	1.0	U
71-43-2	benzene	1.0	U
107-06-2	1,2-dichloroethane	1.0	U
79-01-6	trichloroethene	1.0	U
78-87-5	1,2-dichloropropane	1.0	U
75-27-4	bromodichloromethane	1.0	U
10061-01-5	cis-1,3-dichloropropene	1.0	U
108-10-1	4-methyl-2-pentanone	5.0	U
108-88-3	toluene	1.0	U
10061-02-6	trans-1,3-dichloropropene	1.0	U
79-00-5	1,1,2-trichloroethane	1.0	U
127-18-4	tetrachloroethene	1.0	U
591-78-6	2-hexanone	5.0	U
124-48-1	dibromochloromethane	1.0	U
106-93-4	1,2-Dibromoethane	1.0	U
108-90-7	chlorobenzene	1.0	U
100-41-4	ethylbenzene	1.0	U

1A

VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

DUPLICATE A

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490103

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6078

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/07/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
1330-20-7	m,p-xylenes	1.0	U
1330-20-7	o-xylene	1.0	U
100-42-5	styrene	1.0	U
75-25-2	bromoform	1.0	U
79-34-5	1,1,2,2-tetrachloroethane	1.0	U
541-73-1	1,3-Dichlorobenzene	1.0	U
106-46-7	1,4-Dichlorobenzene	1.0	U
95-50-1	1,2-Dichlorobenzene	1.0	U
96-12-8	1,2-dibromo-3-chloropropane	1.0	U
120-82-1	1,2,4-Trichlorobenzene	1.0	U
87-68-3	Hexachlorobutadiene	1.0	U
87-61-6	1,2,3-Trichlorobenzene	1.0	U

1E

EPA SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

DUPLICATE A

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490103

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6078

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/07/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

Number TICs found: 0

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

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
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FORM I VOA-TIC

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VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

STRIPPER INFLUENT

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490104

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6079

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/07/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
74-87-3	chloromethane	1.0	U
75-01-4	vinyl chloride	1.0	U
74-83-9	bromomethane	1.0	U
75-00-3	chloroethane	1.0	U
75-69-4	Trichlorofluoromethane	1.0	U
75-35-4	1,1-dichloroethene	1.0	U
67-64-1	acetone	5.0	U J
75-15-0	carbon disulfide	1.0	U
75-34-3	1,1-dichloroethane	1.0	U
75-09-2	methylene chloride	1.0	U
156-59-2	cis-1,2-Dichloroethene	1.0	U
156-60-5	trans-1,2-dichloroethene	1.0	U
67-66-3	chloroform	2.0	
78-93-3	2-butanone	5.0	U J
74-97-5	bromochloromethane	1.0	U
71-55-6	1,1,1-trichloroethane	1.0	U
56-23-5	carbontetrachloride	19.3	
71-43-2	benzene	1.0	U
107-06-2	1,2-dichloroethane	1.0	U
79-01-6	trichloroethene	14.8	
78-87-5	1,2-dichloropropane	1.0	U
75-27-4	bromodichloromethane	1.0	U
10061-01-5	cis-1,3-dichloropropene	1.0	U
108-10-1	4-methyl-2-pentanone	5.0	U
108-88-3	toluene	1.0	U
10061-02-6	trans-1,3-dichloropropene	1.0	U
79-00-5	1,1,2-trichloroethane	1.0	U
127-18-4	tetrachloroethene	1.0	U
591-78-6	2-hexanone	5.0	U
124-48-1	dibromochloromethane	1.0	U
106-93-4	1,2-Dibromoethane	1.0	U
108-90-7	chlorobenzene	1.0	U
100-41-4	ethylbenzene	1.0	U

1A

VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

STRIPPER INFLUENT

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490104

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6079

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/07/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
1330-20-7	m,p-xylenes	1.0	U
1330-20-7	o-xylene	1.0	U
100-42-5	styrene	1.0	U
75-25-2	bromoform	1.0	U
79-34-5	1,1,2,2-tetrachloroethane	1.0	U
541-73-1	1,3-Dichlorobenzene	1.0	U
106-46-7	1,4-Dichlorobenzene	1.0	U
95-50-1	1,2-Dichlorobenzene	1.0	U
96-12-8	1,2-dibromo-3-chloropropane	1.0	U
120-82-1	1,2,4-Trichlorobenzene	1.0	U
87-68-3	Hexachlorobutadiene	1.0	U
87-61-6	1,2,3-Trichlorobenzene	1.0	U

1E

EPA SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

STRIPPER INFLUENT

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490104

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6079

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/07/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

Number TICs found: 0

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

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
1.					
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FORM I VOA-TIC

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VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

TRIP BLANK

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490105

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6089

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/10/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
74-87-3	chloromethane	1.0	U
75-01-4	vinyl chloride	1.0	U
74-83-9	bromomethane	1.0	U
75-00-3	chloroethane	1.0	U
75-69-4	Trichlorofluoromethane	1.0	U
75-35-4	1,1-dichloroethene	1.0	U
67-64-1	acetone	5.0	U J
75-15-0	carbon disulfide	1.0	U
75-34-3	1,1-dichloroethane	1.0	U
75-09-2	methylene chloride	1.0	U
156-59-2	cis-1,2-Dichloroethene	1.0	U
156-60-5	trans-1,2-dichloroethene	1.0	U
67-66-3	chloroform	1.0	U
78-93-3	2-butanone	5.0	U J
74-97-5	bromochloromethane	1.0	U
71-55-6	1,1,1-trichloroethane	1.0	U
56-23-5	carbontetrachloride	1.0	U
71-43-2	benzene	1.0	U
107-06-2	1,2-dichloroethane	1.0	U
79-01-6	trichloroethene	1.0	U
78-87-5	1,2-dichloropropane	1.0	U
75-27-4	bromodichloromethane	1.0	U
10061-01-5	cis-1,3-dichloropropene	1.0	U
108-10-1	4-methyl-2-pentanone	5.0	U
108-88-3	toluene	1.0	U
10061-02-6	trans-1,3-dichloropropene	1.0	U
79-00-5	1,1,2-trichloroethane	1.0	U
127-18-4	tetrachloroethene	1.0	U
591-78-6	2-hexanone	5.0	U
124-48-1	dibromochloromethane	1.0	U
106-93-4	1,2-Dibromoethane	1.0	U
108-90-7	chlorobenzene	1.0	U
100-41-4	ethylbenzene	1.0	U

1A

VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

TRIP BLANK

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490105

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6089

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/10/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
1330-20-7	m,p-xylenes	1.0	U
1330-20-7	o-xylene	1.0	U
100-42-5	styrene	1.0	U
75-25-2	bromoform	1.0	U
79-34-5	1,1,2,2-tetrachloroethane	1.0	U
541-73-1	1,3-Dichlorobenzene	1.0	U
106-46-7	1,4-Dichlorobenzene	1.0	U
95-50-1	1,2-Dichlorobenzene	1.0	U
96-12-8	1,2-dibromo-3-chloropropane	1.0	U
120-82-1	1,2,4-Trichlorobenzene	1.0	U
87-68-3	Hexachlorobutadiene	1.0	U
87-61-6	1,2,3-Trichlorobenzene	1.0	U

1E

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

EPA SAMPLE NO.

TRIP BLANK

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490105

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6089

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/10/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

Number TICs found: 0

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

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
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FORM I VOA-TIC

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VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

COOLER BLANK

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490106

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6090

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/10/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
74-87-3	chloromethane	1.0	U
75-01-4	vinyl chloride	1.0	U
74-83-9	bromomethane	1.0	U
75-00-3	chloroethane	1.0	U
75-69-4	Trichlorofluoromethane	1.0	U
75-35-4	1,1-dichloroethene	1.0	U
67-64-1	acetone	5.0	U J
75-15-0	carbon disulfide	1.0	U
75-34-3	1,1-dichloroethane	1.0	U
75-09-2	methylene chloride	1.0	U
156-59-2	cis-1,2-Dichloroethene	1.0	U
156-60-5	trans-1,2-dichloroethene	1.0	U
67-66-3	chloroform	1.0	U
78-93-3	2-butanone	5.0	U J
74-97-5	bromochloromethane	1.0	U
71-55-6	1,1,1-trichloroethane	1.0	U
56-23-5	carbontetrachloride	1.0	U
71-43-2	benzene	1.0	U
107-06-2	1,2-dichloroethane	1.0	U
79-01-6	trichloroethene	1.0	U
78-87-5	1,2-dichloropropane	1.0	U
75-27-4	bromodichloromethane	1.0	U
10061-01-5	cis-1,3-dichloropropene	1.0	U
108-10-1	4-methyl-2-pentanone	5.0	U
108-88-3	toluene	1.0	U
10061-02-6	trans-1,3-dichloropropene	1.0	U
79-00-5	1,1,2-trichloroethane	1.0	U
127-18-4	tetrachloroethene	1.0	U
591-78-6	2-hexanone	5.0	U
124-48-1	dibromochloromethane	1.0	U
106-93-4	1,2-Dibromoethane	1.0	U
108-90-7	chlorobenzene	1.0	U
100-41-4	ethylbenzene	1.0	U

1A

VOLATILE ORGANICS ANALYSIS DATA SHEET

EPA SAMPLE NO.

COOLER BLANK

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490106

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6090

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/10/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

CAS NO.	COMPOUND	CONCENTRATION UNITS: (ug/L or ug/Kg) UG/L	Q
1330-20-7	m,p-xylenes	1.0	U
1330-20-7	o-xylene	1.0	U
100-42-5	styrene	1.0	U
75-25-2	bromoform	1.0	U
79-34-5	1,1,2,2-tetrachloroethane	1.0	U
541-73-1	1,3-Dichlorobenzene	1.0	U
106-46-7	1,4-Dichlorobenzene	1.0	U
95-50-1	1,2-Dichlorobenzene	1.0	U
96-12-8	1,2-dibromo-3-chloropropane	1.0	U
120-82-1	1,2,4-Trichlorobenzene	1.0	U
87-68-3	Hexachlorobutadiene	1.0	U
87-61-6	1,2,3-Trichlorobenzene	1.0	U

1E

EPA SAMPLE NO.

VOLATILE ORGANICS ANALYSIS DATA SHEET
TENTATIVELY IDENTIFIED COMPOUNDS

COOLER BLANK

Lab Name: CAS-ROC Contract: IT CORP

Lab Code: 10145 Case No.: R21-8419 SAS No.: SDG No.: STRIPPEREFF

Matrix: (soil/water) WATER Lab Sample ID: 490106

Sample wt/vol: 25.00 (g/ml) ML Lab File ID: Q6090

Level: (low/med) LOW Date Received: 08/31/01

% Moisture: not dec. _____ Date Analyzed: 09/10/01

GC Column: HP624 ID: 0.20 (mm) Dilution Factor: 1.0

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

Number TICs found: 0

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

	CAS NUMBER	COMPOUND NAME	RT	EST. CONC.	Q
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APPENDIX B

LABORATORY DATA, INFLUENT/EFFLUENT WATER SAMPLES, GROUNDWATER SAMPLES AND SURFACE WATER SAMPLES - OCTOBER 23, 2001

APPENDIX C

DATA VALIDATION REPORT

Data Validation Services

120 Cobble Creek Road P. O. Box 208
North Creek, N. Y. 12853
Phone 518-251-4429
Facsimile 518-251-4428

December 22, 2001

Grant Anderson
IT Corporation
13 British American Blvd.
Latham, NY 12110

RE: Validation of MRFA Malta Site Data Packages
CAS Sub Nos. R2108419 and R2109180

Dear Mr. Anderson:

Review has been completed for the data packages generated by Columbia Analytical Services (CAS), pertaining to samples collected at the MRFA Malta Site in August and October of 2001. Seventeen aqueous samples, and cooler and trip blanks, were processed by CAS for site specific low level volatiles. Four of these and an additional sample were also analysed for total and hexavalent chromium. Methodologies utilized are those of the USEPA OLC02/SW846.

Data validation was performed with guidance from the most current editions of the USEPA CLP National Functional Guidelines for Organic and Inorganic Data Review and the USEPA SOPs HW-2 and HW-6. The following items were reviewed:

* Data Completeness
* Custody Documentation
* Holding Times
* Surrogate and Internal Standard Recoveries
* Matrix Spike Recoveries/Duplicate Correlations
* Field Duplicate Correlations
* Preparation/Calibration Blanks
* Control Spike/Laboratory Control Samples
* Instrumental Tunes
* Calibration Standards
* Instrument IDLs
* Method Compliance
* Sample Result Verification

Those items showing deficiencies are discussed in the following sections of this report. All others were found to be acceptable as outlined in the above-mentioned validation procedures, and as applicable for the methodology. Unless noted specifically in the following text, reported results are substantiated by the raw data, and generated in compliance with protocol requirements.

In summary, sample processing was conducted with compliance to protocol requirements and with adherance to quality criteria, and results are usable as reported, or with minor qualification as estimated. These are discussed in the following analytical sections.

Copies of laboratory case narratives are attached to this narrative, and should be reviewed in conjunction with this narrative.

Data Completeness

Data packages were complete as received, and no resubmissions were required.

The sample identified as "M-27S" on the custody was reported as "MW-27S" in the data packages.

Low Level Volatile Analyses

As noted in the narrative, the analysis of RW-1D showed responses of internal standards and surrogate standards that were about half that expected. Reported target analyte concentrations were adjusted to compensate for addition of only half the required spiking solution amounts. The analysis was not repeated. Due to the low internal standard responses (two are below the allowable level), reported results for that sample are to be qualified estimated ("J" and "UJ").

Results for analytes whose values which are initially reported with the "E" qualifier should be derived from the dilution ("-DL") analyses. All other analyte values can be used from the initial analyses.

The low level carbon tetrachloride detection in the SW-B may be carryover from the previous sample analysis, and is to be considered contamination. The result is therefore edited to nondetection at the CRDL.

Due to the low relative response factors (RRFs) in the calibration standards, the reporting limits for acetone and 2-butanone in all of the project samples should be considered estimated ("UJ" qualifier), possibly biased low.

Matrix spikes of Stripper Effluent and M-27S showed acceptable accuracy and precision. Field duplicate correlations for Stripper Effluent/Duplicate A and M-27S/DUPA were acceptable.

Blanks showed no contamination. Sample reported results are substantiated by the raw data.

The laboratory Form 8A shows incorrect acceptance limits for internal standard responses. With the exception of sample RW-1D (noted above), sample responses met protocol requirements.

Total Chromium Analyses

Accuracy and precision of M-27S were good. The ICP serial dilution correlation for MW27S was acceptable. Field duplicate correlation for M-27S and DUPA was also acceptable.

Reported results are substantiated by the raw data, and generated in compliance with required protocols.

Hexavalent Chromium Analyses

The initial analysis for sample 13S was not accompanyed by a sample matrix color blank. The reanalysis and color blank were peformed beyond the allowable holding time, and showed comparable results. The reported result (from reanalysis) is still to be qualified estimated ("J"), possibly biased low due to potential losses from extended holding time.

Accuracy and precision of M-27S, and the field duplicate correlation of M-27S and DUPA were acceptable.

With the exception of the holding time exceedence, processing was compliant with protocol requirements.

Please do not hesitate to contact me if questions or comments arise during your review of this report.

Very truly yours,

Judy Harry

SDG #:	STRIPPER EFF	BATCH COMPLETE: __yes_____		DATE REVISED:	
SUBMISSION	R2108419	DISKETTE REQUESTED: Y___ N__x__		DATE DUE: 9/28/01	
CLIENT:	IT Corporation	DATE: 08/31/01		PROTOCOL: CLP	
CLIENT REP:	Janice Jaeger	CUSTODY SEAL: PRESENT/ABSENT:		SHIPPING No.:	
PROJECT:	MRFA PROJECT #810066	CHAIN OF CUSTODY: PRESENT/ABSENT:			

CAS JOB #	CLIENT/EPA ID	MATRIX	REQUESTED PARAMETERS	DATE SAMPLED	DATE RECEIVED	pH (SOLIDS)	% SOLIDS	REMARKS SAMPLE CONDITION
490102QC	STRIPPER EFFLUENT	WATER	OLC 2.1 + 3 COMPOUNDS	8/30/01	8/31/01			
490103	DUPLICATE A	WATER	OLC 2.1 + 3 COMPOUNDS	8/30/01	8/31/01			
490104	STRIPPER INFLUENT	WATER	OLC 2.1 + 3 COMPOUNDS	8/30/01	8/31/01			
490105	TRIP BLANK	WATER	OLC 2.1 + 3 COMPOUNDS	8/30/01	8/31/01			
490106	COOLER BLANK	WATER	OLC 2.1 + 3 COMPOUNDS					

04

SDG #: DGC3S	BATCH COMPLETE: __yes_____	DATE REVISED:	
SUBMISSION R2109180	DISKETTE REQUESTED: Y___ N__x__	DATE DUE: 11/21/01	
CLIENT: IT Corporation	DATE:10/24/01	PROTOCOL: CLP	
CLIENT REP: Janice Jaeger	CUSTODY SEAL: PRESENT/ABSENT:	SHIPPING No.:	
PROJECT: GE MRFA PROJECT #810066	CHAIN OF CUSTODY: PRESENT/ABSENT:		

CAS JOB #	CLIENT/EPA ID	MATRIX	REQUESTED PARAMETERS	DATE SAMPLED	DATE RECEIVED	pH (SOLIDS)	% SOLIDS	REMARKS SAMPLE CONDITION
503360	TRIP BLANK	WATER	OLC2.1	10/23/01	10/24/01			
503361	DGC-3S	WATER	OLC2.1	10/23/01	10/24/01			
503362	DGC-4S	WATER	OLC2.1	10/23/01	10/24/01			
503363	M33I	WATER	OLC2.1	10/23/01	10/24/01			
503364	M33S	WATER	OLC2.1	10/23/01	10/24/01			
503365	STRIPPER EFFLUENT	WATER	OLC2.1	10/23/01	10/24/01			
503366	STRIPPER INFLUENT	WATER	OLC2.1	10/23/01	10/24/01			
503367	RW-1D	WATER	OLC2.1	10/23/01	10/24/01			
503368	RW-2D	WATER	OLC2.1	10/23/01	10/24/01			
503369	13S	WATER	CR,CR6	10/23/01	10/24/01			
503370QC	MW-27S	WATER	OLC2.1, CR6,CR	10/23/01	10/24/01			
503371	DUP A	WATER	OLC2.1, CR6,CR	10/23/01	10/24/01			
503372	M-27D	WATER	OLC2.1, CR6,CR	10/23/01	10/24/01			
503373	SW-A	WATER	OLC2.1	10/23/01	10/24/01			
503374	SW-B	WATER	OLC2.1, CR6, CR	10/23/01	10/24/01			
503375	SW-D	WATER	OLC2.1	10/23/01	10/24/01			
503377	COOLER BLANK	WATER	OLC2.1	10/23/01	10/24/01			
			OLC2.1 + 3 CPDS					

04

CASE NARRATIVE

COMPANY: IT Corporation
MRFA
SUBMISSION #: R2108419

IT water samples were collected on 8/30/01 and received at CAS on 8/31/01 in good condition at a cooler temperature of 1 C.

VOLATILE ORGANICS

Three water samples and one trip blank were analyzed for a Site Specific List of Volatiles by Low Level CLP.

All Tuning criteria for BFB were within limits.

The initial and continuing calibration criteria were met for all analytes.

All internal standard areas were within limits.

All surrogate standard recoveries were within limits.

All samples were analyzed within required holding times.

Site specific QC was performed on Stripper Effluent. All MS/MSD recoveries were within limits. All Blank Spike recoveries were within limits. All RPD's were within limits.

The Laboratory Blanks associated with these samples was free of contamination.

No other 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 the hard copy package has been authorized by the Laboratory Manager or his designee, as verified by the following signature;

4 Mustard Street, Suite 250 ▪ Rochester, NY 14609-6925 ▪ Telephone (716) 288-5380 ▪ Fax (716) 288-8475

CASE NARRATIVE

COMPANY: IT Corporation
GE MRFA Project #810066
SUBMISSION #: R2109180

IT water samples were collected on 10/23/01 and received at CAS on 10/24/01 in good condition at a cooler temperature of 0 C.

INORGANICS

Five water samples were analyzed for Total Chromium by CLP methodology and Hexavalent Chromium by method 7196A.

Matrix Spike/Duplicate was performed on M-27S as requested. All MS recoveries were within limits. All RPD's were within limits.

13S was originally analyzed within the 24 hour holding time, however it was not analyzed with a matrix match to determine if the result was due to the sample itself. The sample was reanalyzed the next day with the matrix match. The results of the 2 analyses were comparable (0.0499 mg/l and 0.0436 mg/l) and the matrix match result was 0, therefore the 10/24 result was reported. A copy of the 10/25 raw data has been included in this report.

No other analytical or QC problems were encountered

VOLATILE ORGANICS

Fourteen water samples and one trip blank were analyzed for a Site Specific List of Volatiles by Low Level CLP.

Only 5ul of the Internal Standard/Surrogate mixture was added to RW-1D rather than 10ul. The sample was requantitated to compensate for this and the Form I reflects this correction and the Quanitation sheet has been labelled as being compensated. The Form VIII flags the Internal Standards as being low when they are probably within limits. The sample was not repeated.

All Tuning criteria for BFB were within limits.

The initial and continuing calibration criteria were met for all analytes.

All internal standard areas were within limits except as mentioned above.

All surrogate standard recoveries were within limits.

All samples were analyzed within required holding times.

Site specific QC was performed on M-27S. All MS/MSD recoveries were within limits. All Blank Spike recoveries were within limits. All RPD's were within limits.

Various compounds for Stripper Influent, RW-2D and M-27D have been flagged with an "E" as being outside the calibration range of the instrument. The samples were repeated at dilutions and both sets of results have been reported out.

The Laboratory Blanks associated with these samples was free of contamination.

No other analytical or QC problems were encountered.

Telephone (716) 288-5380 - Fax (716) 288-8475

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 the hard copy package has been authorized by the Laboratory Manager or his designee, as verified by the following signature: Michael K. Perry

APPENDIX D

AIR STRIPPER FLOW DATA

APPENDIX D
MALTA ROCKET FUEL AREA SITE
AIR STRIPPER FLOW DATA

Date	Well #2 Flow (gal)	Well #1 Flow (gal)	Well #2 Average Flow (gpm)	Well #1 Average Flow (gpm)	Total Daily Average Flow (gpm)
05-Dec-01 Total	640	670	0.44	0.47	0.91
04-Dec-01 Total	550	600	0.38	0.42	0.80
03-Dec-01 Total	510	540	0.35	0.38	0.73
02-Dec-01 Total	550	600	0.38	0.42	0.80
01-Dec-01 Total	400	430	0.28	0.30	0.58
30-Nov-01 Total	550	590	0.38	0.41	0.79
29-Nov-01 Total	530	570	0.37	0.40	0.76
28-Nov-01 Total	580	620	0.40	0.43	0.83
27-Nov-01 Total	580	630	0.40	0.44	0.84
26-Nov-01 Total	470	500	0.33	0.35	0.67
25-Nov-01 Total	540	590	0.38	0.41	0.78
24-Nov-01 Total	550	600	0.38	0.42	0.80
23-Nov-01 Total	800	860	0.56	0.60	1.15
22-Nov-01 Total	650	700	0.45	0.49	0.94
21-Nov-01 Total	150	160	0.10	0.11	0.22
20-Nov-01 Total	690	750	0.48	0.52	1.00
19-Nov-01 Total	600	640	0.42	0.44	0.86
18-Nov-01 Total	550	590	0.38	0.41	0.79
17-Nov-01 Total	600	650	0.42	0.45	0.87
16-Nov-01 Total	550	600	0.38	0.42	0.80
15-Nov-01 Total	640	690	0.44	0.48	0.92
14-Nov-01 Total	550	590	0.38	0.41	0.79
13-Nov-01 Total	600	640	0.42	0.44	0.86
12-Nov-01 Total	600	650	0.42	0.45	0.87
11-Nov-01 Total	500	540	0.35	0.38	0.72
10-Nov-01 Total	600	640	0.42	0.44	0.86
09-Nov-01 Total	500	540	0.35	0.38	0.72
08-Nov-01 Total	690	740	0.48	0.51	0.99
07-Nov-01 Total	600	640	0.42	0.44	0.86
06-Nov-01 Total	650	690	0.45	0.48	0.93
05-Nov-01 Total	650	690	0.45	0.48	0.93
04-Nov-01 Total	550	590	0.38	0.41	0.79
03-Nov-01 Total	590	630	0.41	0.44	0.85
02-Nov-01 Total	630	680	0.44	0.47	0.91
01-Nov-01 Total	14450	5240	10.03	3.64	13.67
18-Oct-01 Total	210	200	0.15	0.14	0.28

APPENDIX D
MALTA ROCKET FUEL AREA SITE
AIR STRIPPER FLOW DATA

Date	Well #2 Flow (gal)	Well #1 Flow (gal)	Well #2 Average Flow (gpm)	Well #1 Average Flow (gpm)	Total Daily Average Flow (gpm)
17-Oct-01 Total	630	600	0.44	0.42	0.85
16-Oct-01 Total	690	660	0.48	0.46	0.94
15-Oct-01 Total	580	550	0.40	0.38	0.78
14-Oct-01 Total	620	610	0.43	0.42	0.85
13-Oct-01 Total	470	430	0.33	0.30	0.63
12-Oct-01 Total	690	670	0.48	0.47	0.94
11-Oct-01 Total	530	490	0.37	0.34	0.71
10-Oct-01 Total	740	700	0.51	0.49	1.00
09-Oct-01 Total	530	510	0.37	0.35	0.72
08-Oct-01 Total	730	700	0.51	0.49	0.99
07-Oct-01 Total	480	450	0.33	0.31	0.65
06-Oct-01 Total	630	600	0.44	0.42	0.85
05-Oct-01 Total	580	550	0.40	0.38	0.78
04-Oct-01 Total	680	650	0.47	0.45	0.92
03-Oct-01 Total	580	550	0.40	0.38	0.78
02-Oct-01 Total	680	650	0.47	0.45	0.92
01-Oct-01 Total	570	550	0.40	0.38	0.78
30-Sep-01 Total	580	550	0.40	0.38	0.78
29-Sep-01 Total	530	500	0.37	0.35	0.72
28-Sep-01 Total	620	600	0.43	0.42	0.85
27-Sep-01 Total	790	750	0.55	0.52	1.07
26-Sep-01 Total	700	670	0.49	0.47	0.95
25-Sep-01 Total	660	630	0.46	0.44	0.90
24-Sep-01 Total	620	590	0.43	0.41	0.84
23-Sep-01 Total	570	550	0.40	0.38	0.78
22-Sep-01 Total	580	550	0.40	0.38	0.78
21-Sep-01 Total	730	690	0.51	0.48	0.99
20-Sep-01 Total	620	600	0.43	0.42	0.85
19-Sep-01 Total	680	650	0.47	0.45	0.92
18-Sep-01 Total	670	640	0.47	0.44	0.91
17-Sep-01 Total	630	600	0.44	0.42	0.85
16-Sep-01 Total	670	640	0.47	0.44	0.91
15-Sep-01 Total	580	550	0.40	0.38	0.78
14-Sep-01 Total	680	650	0.47	0.45	0.92
13-Sep-01 Total	670	640	0.47	0.44	0.91
12-Sep-01 Total	630	600	0.44	0.42	0.85

APPENDIX D
MALTA ROCKET FUEL AREA SITE
AIR STRIPPER FLOW DATA

Date	Well #2 Flow (gal)	Well #1 Flow (gal)	Well #2 Average Flow (gpm)	Well #1 Average Flow (gpm)	Total Daily Average Flow (gpm)
11-Sep-01 Total	620	590	0.43	0.41	0.84
10-Sep-01 Total	970	920	0.67	0.64	1.31
09-Sep-01 Total	490	470	0.34	0.33	0.67
08-Sep-01 Total	570	540	0.40	0.38	0.77
07-Sep-01 Total	620	590	0.43	0.41	0.84
06-Sep-01 Total	620	600	0.43	0.42	0.85
05-Sep-01 Total	630	590	0.44	0.41	0.85
04-Sep-01 Total	670	640	0.47	0.44	0.91
03-Sep-01 Total	570	550	0.40	0.38	0.78
02-Sep-01 Total	520	500	0.36	0.35	0.71
01-Sep-01 Total	520	490	0.36	0.34	0.70
31-Aug-01 Total	620	590	0.43	0.41	0.84
30-Aug-01 Total	670	640	0.47	0.44	0.91
29-Aug-01 Total	670	640	0.47	0.44	0.91
28-Aug-01 Total	620	590	0.43	0.41	0.84
27-Aug-01 Total	670	640	0.47	0.44	0.91
26-Aug-01 Total	630	590	0.44	0.41	0.85
25-Aug-01 Total	570	540	0.40	0.38	0.77
24-Aug-01 Total	720	700	0.50	0.49	0.99
23-Aug-01 Total	780	730	0.54	0.51	1.05
22-Aug-01 Total	670	640	0.47	0.44	0.91
21-Aug-01 Total	780	740	0.54	0.51	1.06
20-Aug-01 Total	1200	1150	0.83	0.80	1.63
19-Aug-01 Total	560	540	0.39	0.38	0.76
18-Aug-01 Total	680	640	0.47	0.44	0.92
17-Aug-01 Total	880	840	0.61	0.58	1.19
16-Aug-01 Total	360	340	0.25	0.24	0.49
15-Aug-01 Total	420	390	0.29	0.27	0.56
14-Aug-01 Total	360	350	0.25	0.24	0.49
13-Aug-01 Total	260	240	0.18	0.17	0.35
12-Aug-01 Total	210	200	0.15	0.14	0.28
11-Aug-01 Total	250	240	0.17	0.17	0.34
10-Aug-01 Total	420	390	0.29	0.27	0.56
09-Aug-01 Total	250	250	0.17	0.17	0.35
08-Aug-01 Total	370	340	0.26	0.24	0.49
07-Aug-01 Total	560	540	0.39	0.38	0.76

APPENDIX D
MALTA ROCKET FUEL AREA SITE
AIR STRIPPER FLOW DATA

Date	Well #2 Flow (gal)	Well #1 Flow (gal)	Well #2 Average Flow (gpm)	Well #1 Average Flow (gpm)	Total Daily Average Flow (gpm)
06-Aug-01 Total	260	240	0.18	0.17	0.35
05-Aug-01 Total	300	290	0.21	0.20	0.41
04-Aug-01 Total	210	200	0.15	0.14	0.28
03-Aug-01 Total	360	340	0.25	0.24	0.49
02-Aug-01 Total	200	190	0.14	0.13	0.27
01-Aug-01 Total	260	240	0.18	0.17	0.35
31-Jul-01 Total	500	480	0.35	0.33	0.68
30-Jul-01 Total	260	240	0.18	0.17	0.35
29-Jul-01 Total	250	250	0.17	0.17	0.35
28-Jul-01 Total	210	200	0.15	0.14	0.28
27-Jul-01 Total	520	490	0.36	0.34	0.70
26-Jul-01 Total	310	290	0.22	0.20	0.42
25-Jul-01 Total	300	290	0.21	0.20	0.41
24-Jul-01 Total	370	340	0.26	0.24	0.49
23-Jul-01 Total	250	240	0.17	0.17	0.34
22-Jul-01 Total	260	250	0.18	0.17	0.35
21-Jul-01 Total	260	240	0.18	0.17	0.35
20-Jul-01 Total	310	290	0.22	0.20	0.42
19-Jul-01 Total	260	250	0.18	0.17	0.35
18-Jul-01 Total	310	290	0.22	0.20	0.42
17-Jul-01 Total	460	440	0.32	0.31	0.63
16-Jul-01 Total	320	290	0.22	0.20	0.42
15-Jul-01 Total	310	290	0.22	0.20	0.42
14-Jul-01 Total	200	200	0.14	0.14	0.28
13-Jul-01 Total	370	340	0.26	0.24	0.49
12-Jul-01 Total	360	330	0.25	0.23	0.48
11-Jul-01 Total	360	350	0.25	0.24	0.49
10-Jul-01 Total	310	290	0.22	0.20	0.42
09-Jul-01 Total	350	330	0.24	0.23	0.47
08-Jul-01 Total	310	290	0.22	0.20	0.42
07-Jul-01 Total	260	240	0.18	0.17	0.35
06-Jul-01 Total	310	290	0.22	0.20	0.42
05-Jul-01 Total	250	250	0.17	0.17	0.35
04-Jul-01 Total	310	290	0.22	0.20	0.42
03-Jul-01 Total	310	290	0.22	0.20	0.42
02-Jul-01 Total	310	300	0.22	0.21	0.42

APPENDIX D
MALTA ROCKET FUEL AREA SITE
AIR STRIPPER FLOW DATA

Date	Well #2 Flow (gal)	Well #1 Flow (gal)	Well #2 Average Flow (gpm)	Well #1 Average Flow (gpm)	Total Daily Average Flow (gpm)
01-Jul-01 Total	270	250	0.19	0.17	0.36
30-Jun-01 Total	300	290	0.21	0.20	0.41
29-Jun-01 Total	410	390	0.28	0.27	0.56
28-Jun-01 Total	360	340	0.25	0.24	0.49
27-Jun-01 Total	840	800	0.58	0.56	1.14
26-Jun-01 Total	360	340	0.25	0.24	0.49
25-Jun-01 Total	370	340	0.26	0.24	0.49
24-Jun-01 Total	350	340	0.24	0.24	0.48
23-Jun-01 Total	370	340	0.26	0.24	0.49
Grand Total	**92340**	**81700**	**0.39**	**0.34**	**0.732**

APPENDIX E

TELEPHONE INTERVIEW LOGS

Annual Telephone Interview Log
Remedial Work Element IV - Institutional Controls
Malta Rocket Fuel Area Site
Malta and Stillwater, New York

Indicate Property Owner Interviewed: Mr. Hal Brodie 518-862-1090, ext. 3280	X	New York State Energy Research and Developmental Authority
		Wright-Malta Corporation
		Luther Forest Corporation
Date of Interview: 12/17/01	Property Owner Representative: Mr. Hal Brodie	
Interview Questions:	**Representative Response:**	
Do you have any knowledge of current or proposed future use of groundwater within the area of the Environmental Restriction Zone? Do not include activities associated with Remedial Work Element II, Malta Test Station Drinking Water System.	NO	
Are you aware of any current or proposed changes in land use within the area of the Environmental Restriction Zone?	PROPOSED TECHNOLOGY PARK IN FUTURE. ON NYSERDA ONLY. NO CHANGES IN GROUNDWATER WOULD BE PROPOSED.	
Are you aware of the notice requirements associated with the Environmental Restriction Easement and Declaration of Restrictive Covenants?	YES	
Have you provided any interested parties with a notice of Environmental Restriction Easement and Declaration of Restrictive Covenants in any instrument (document) conveying an interest in any part of the affected property? If so, please provide a date of execution and recording reference number, as provided by the Office of the Clerk of Saratoga County, New York.	YES. SARATOGA ECONOMIC DEVELOPMENT CORP. PLAN WHICH HAS NOT BEEN SUBMITTED TO DATE. TECHNOLOGY PARK IN COOPERATION WITH NYSERDA + UNIVERSITY OF ALBANY.	
Are you aware of any other conditions or actions within the Environmental Restriction Zone that would impact any condition of the Environmental Restriction Easement and Declaration of Restrictive Covenants?	NO.	
Interview completed by: BRIAN NEUMANN (IT CORP)	Interviewer signature: [signature] Date: 12/17/01	

Annual Telephone Interview Log
Remedial Work Element IV - Institutional Controls
Malta Rocket Fuel Area Site
Malta and Stillwater, New York

Indicate Property Owner Interviewed: Mr. Raymond (RP) Kazyaka 518-899-2227		New York State Energy Research and Developmental Authority
	X	Wright-Malta Corporation
		Luther Forest Corporation
Date of Interview: 12/3/01 MAILED TO MR. KAZYAKA.	Property Owner Representative: Mr. Raymond Kazyaka	
Interview Questions:	**Representative Response:**	
Do you have any knowledge of current or proposed future use of groundwater within the area of the Environmental Restriction Zone? Do not include activities associated with Remedial Work Element II, Malta Test Station Drinking Water System.	No	
Are you aware of any current or proposed changes in land use within the area of the Environmental Restriction Zone?	No	
Are you aware of the notice requirements associated with the Environmental Restriction Easement and Declaration of Restrictive Covenants?	~~No~~ Yes DISCUSSED WITH R. KAZYAKA ON 1/11/02. RAY SAID TO CHANGE RESPONSE TO YES. LSS 1/11/02	
Have you provided any interested parties with a notice of Environmental Restriction Easement and Declaration of Restrictive Covenants in any instrument (document) conveying an interest in any part of the affected property? If so, please provide a date of execution and recording reference number, as provided by the Office of the Clerk of Saratoga County, New York.	No	
Are you aware of any other conditions or actions within the Environmental Restriction Zone that would impact any condition of the Environmental Restriction Easement and Declaration of Restrictive Covenants?	No	
Interview completed by: BRIAN NEWMANN MAILED TO RP KAZYAKA FOR COMPLETION ON 12/3/01	Interviewer signature: Raymond J Kazyaka Date: 12/4/01	

Annual Telephone Interview Log
Remedial Work Element IV - Institutional Controls
Malta Rocket Fuel Area Site
Malta and Stillwater, New York

Indicate Property Owner Interviewed: Mr. Alex Mackey 518-899-6001		New York State Energy Research and Developmental Authority
		Wright-Malta Corporation
	X	Luther Forest Corporation
Date of Interview: 12/3/01	Property Owner Representative: Mr. Alex Mackey	
Interview Questions:	**Representative Response:**	
Do you have any knowledge of current or proposed future use of groundwater within the area of the Environmental Restriction Zone? Do not include activities associated with Remedial Work Element II, Malta Test Station Drinking Water System.	NO	
Are you aware of any current or proposed changes in land use within the area of the Environmental Restriction Zone?	YES. PROPOSED 10 YRS. DEVELOPMENT PLAN (SEE BELOW)	
Are you aware of the notice requirements associated with the Environmental Restriction Easement and Declaration of Restrictive Covenants?	YES.	
Have you provided any interested parties with a notice of Environmental Restriction Easement and Declaration of Restrictive Covenants in any instrument (document) conveying an interest in any part of the affected property? If so, please provide a date of execution and recording reference number, as provided by the Office of the Clerk of Saratoga County, New York.	YES. SARATOGA ECONOMIC DEVELOPMENT CORP. (PRIMARY ORGANIZATION FORMULATING PLAN)	
Are you aware of any other conditions or actions within the Environmental Restriction Zone that would impact any condition of the Environmental Restriction Easement and Declaration of Restrictive Covenants?	NO.	
Interview completed by: BRIAN NEUMANN (IT CORP.)	Interviewer signature: Brian Neumann Date: 12/3/01	

JOINT VENTURE - NOTHING OFFICIAL PLAN WITH TOWN OF MALTA YET. PRE-ENGINEERING PHASE CURRENTLY. JOINT PARTIES DO NOT KNOW WHEN FORMAL PLAN WILL BE SUBMITTED TO TOWN OF MALTA.