

FINAL

**QUARTERLY OPERATIONS REPORT
FOURTH QUARTER 2010**

**GROUNDWATER TREATMENT PLANT
GM-38 AREA GROUNDWATER REMEDIATION
NAVAL WEAPONS INDUSTRIAL RESERVE PLANT
BETHPAGE, NEW YORK**

**Contract No. N62472-05-D-0031
Contract Task Order #003**

Prepared for:



Naval Facilities Engineering Command Mid-Atlantic
9742 Maryland Avenue
Norfolk, VA 23511

Prepared By:



ECOR Federal Services, LLC.
21 S. High St, 2nd Floor
West Chester, PA 19382

March 2011

TABLE OF CONTENTS

1.0	Introduction.....	1
1.1	Background.....	1
1.2	GWTP Overview	1
2.0	GWTP Operations and Maintenance	2
2.1	Routine Maintenance Activities.....	2
2.2	Non Routine Maintenance Activities.....	2
3.0	GWTP Monitoring.....	3
3.1	Process Water Quality Monitoring	3
3.2	Air Quality Monitoring	4
3.3	Groundwater Quality Monitoring	4
	3.3.1 Groundwater Quality Results.....	5
	3.3.2 Quality Assurance/Quality Control Sampling	5

TABLES

TABLE 1	Discharge Monitoring Results – Fourth Quarter 2010
TABLE 2	Air Sampling Results – Fourth Quarter 2010
TABLE 3	Stack Emissions – Fourth Quarter 2010
TABLE 4	Groundwater Level Measurements – November 2010
TABLE 5	Summaries of Groundwater Chemistry Data – November 2010
TABLE 6	Historic Groundwater VOC Analytical Results through November 2010
TABLE 7	Calculated Relative Percent Differences – November 2010

FIGURES

FIGURE 1	Site Map
FIGURE 2	Process Flow Diagram
FIGURE 3	All Monitoring and Recovery Well Locations Part of GM-38 Area Remedy
FIGURE 4	Monitoring Well Locations Sampled as Part of Quarterly GM-38 OMM
FIGURE 5	Monitoring Well Locations Sampled by Northrop Grumman

APPENDICES

APPENDIX A	- NYSDEC Effluent Limitations and Monitoring Requirements
APPENDIX B	- NYSDEC Air Permit Equivalent Approval
APPENDIX C	- Field Data Sheets
APPENDIX D	- Validation Report
APPENDIX E	- GW Laboratory Analytical Data Package

1.0 INTRODUCTION

ECOR Federal Services, LLC (ECOR) has prepared this Quarterly Operations Report for the GM-38 Area Groundwater Treatment Plant (GWTP) at the Naval Weapons Industrial Reserve Plant (NWIRP) in Bethpage, New York, for the United States Department of the Navy (Navy), Naval Facilities Engineering Command (NAVFAC), Mid-Atlantic, under Contract No. N62472-05-D-0031, Contract Task Order No. 003.

1.1 Background

NWIRP Bethpage is located in east central Nassau County, Long Island, New York, approximately 30 miles east of New York City (**Figure 1**) and is currently listed by New York State Department of Environmental Conservation (NYSDEC) as an “inactive hazardous waste site” (#1-30-003B). Historically, the Navy's property totaled approximately 109.5 acres and was a Government Owned Contractor-Operated (GOCO) facility that was operated by the Northrop Grumman Corporation (NGC) until September 1998. NWIRP Bethpage is bordered on the north, west, and south by property owned, or formerly owned, by NGC that covered approximately 605 acres, and, on the east, by a residential neighborhood.

The GM-38 Area refers to a cluster of monitoring wells that were installed in the 1990s by NGC. The GM-38 Area is approximately 8,500 feet south southeast and hydraulically down-gradient of NWIRP Bethpage. The GWTP is located within a utility easement with a street address of 100 Broadway.

The “hot spot” cleanup remedy for the GM-38 Area groundwater was originally set forth in Record of Decision (ROD) documents for Operable Unit 2 (OU 2) Groundwater for the Northrop NGC and NWIRP Sites (New York State Registry Site Numbers 1-30-003A & 1-30-003B, respectively) issued by NYSDEC Division of Environmental Remediation in March 2001 and for the NWIRP Bethpage Site by NAVFAC in April 2003 (Revision 1). The selected remedy was chosen in accordance with the New York State Environmental Conservation Law (ECL) and the Navy's Installation Restoration Program (IRP). It is also consistent with the Comprehensive Environmental Response Compensation and Liability Act (CERCLA), as amended, 42 U.S.C. §§ 9601-9675.

1.2 GWTP Overview

Groundwater is extracted from recovery wells RW-1 and RW-3 and treated in the GWTP. The treatment process consists of flow equalization, air stripping and vapor-phase carbon treatment, bag filtration, liquid-phase carbon treatment and pH adjustment (if needed). To this point, pH adjustment has not been necessary. A process flow diagram is presented as **Figure 2**. The treated water is either re-injected into injection well IW-1 or discharged into the Nassau County Recharge Basin #495. Under CERCLA, the Navy is required to meet the effluent requirement in the NYSDEC's Storm Pollution Discharge Elimination System Permit as Applicable or Relevant and Appropriate Requirements (ARAR).

The GWTP was designed to operate at an average flow rate of 1,100 gallons per minute (gpm) (800 gpm from RW-1 and 300 gpm from RW-3) with a maximum flow rate of 1,375 gpm, as measured by the average discharge flow rate. It was determined that this flow rate would be necessary to effectively contain the limits of the higher concentration of contamination in the GM-38 Area groundwater. The average concentration of Volatile Organic Compounds (VOCs) in the influent groundwater consists of 3,400 µg/l of trichloroethene, 900 µg/l of tetrachloroethene, 300 µg/l of vinyl chloride, 1,100 µg/l of cis-1,2-dichloroethene, and smaller concentrations of 1,2-dichloroethane, benzene, toluene, and total xylenes.

The air stripper (AS) is a structural aluminum tower that is packed with 3.5 inch diameter polypropylene Jaeger Tripack. Groundwater is pumped to the air stripper distribution port and sprayed over the column of Jaeger Tripack at a flow rate of approximately 1,200 gpm. This includes approximately 1,100 gpm of raw groundwater and 100 gpm of recirculation water. An induced draft countercurrent flow of air enters the air stripper below the base of the packing material at a rate of 8,000 scfm. The large surface area of the packing material allows for a mass transfer of the VOCs from the groundwater into the air stream. All of the VOCs in the off-gas, except for vinyl chloride, are removed via two 20,000 lb vapor phase granular activated carbon (VGAC) units (VGAC-1 and VGAC-2). Vinyl chloride is oxidized by a 20,000 lb potassium permanganate vessel (VGAC-3) into potassium chloride and carbon dioxide. The potassium chloride remains in the pore structure of the zeolite substrate. The treated off-gas is discharged out of the stack.

Water treated by the air stripper is passed through three 8,000 liquid phase granular activated carbon (LGAC) units in parallel prior to discharge in the recovery basin (or injection well, if necessary).

The GWTP is controlled by a PLC-based digital and analog control system, with monitoring instrumentation, such as pH, pressure, tank level, and flow transmitters, differential pressure transmitters, and pump signals that communicate with a PLC. In turn, the information in the PLC is made available to an operator via a human-machine interface (HMI) program. By using this program, the status of the GWTP can be displayed in real time and adjusted, if necessary, by the operator.

2.0 GWTP OPERATION AND MAINTENANCE

While designed to run completely automated, the GWTP requires regular weekly visits by an operator to record and adjust operational parameters and to perform scheduled maintenance.

2.1 Routine Maintenance Activities

Routine maintenance activities at the GWTP during the quarter were performed during the operator's weekly visits (generally; Monday, Wednesday and Friday averaging 20 hours a week). These activities include general site inspections, collection of operational data (water and vapor flowrates, pressures, tank levels and totalizer readings), measurement of water depth in the recovery wells, adjustment of pump signal settings, collection of vapor and process water samples, changing out of bag filters, switching of lead/lag pump assignments, and preventive maintenance of system equipment.

2.2 Non-routine Maintenance Activities

The following non-routine activities were performed during the Fourth Quarter 2010:

- October 27-28, the Hydrosil media (40,000lbs) was changed out
- November 8-10, the three liquid phase carbon vessels (8,000lbs x 3) were changed out. The carbon in the vessels (12x40 mesh size) was replaced with a larger mesh size (8x30) to help reduce blinding of the carbon.
- December 20-24, the two vapor phase carbon vessels (20,000lbs x 2) were changed out

3.0 GWTP MONITORING

The GWTP is not intended to remediate groundwater contamination in the local aquifer to non-detectable levels. Rather, the intent of the system is to remove mass and reduce elevated VOC levels to levels similar to those in the surrounding aquifer. Doing so will minimize the impacts on water supply wells and currently unaffected portions of the aquifer. To monitor GWTP effectiveness and for compliance with Federal and State requirements, several process (water and vapor) samples are collected on a monthly basis. In addition, groundwater samples are collected quarterly to monitor water quality and hydraulic containment.

3.1 Process Water Quality Monitoring

Processed groundwater is tested to comply with calculations submitted by the Navy and approved by NYSDEC Water Division for the effluent limitations and monitoring requirements. These results are also submitted to the NYSDEC on a monthly basis in the form of a Discharge Monitoring Report (DMR). A copy of the approved NYSDEC effluent limitation and monitoring constituents and the reporting forms are included as **Appendix A**.

Samples are collected from each recovery well (RW-1 and RW-3), as well as, the effluent water discharge line. The analytical results of monthly process water sampling performed during the Fourth Quarter 2010 are presented in **Table 1**. The data demonstrates that all permitted constituents were in compliance for the quarter. **Table 1** also summarizes the average monthly flowrates in gallons per minute along with the total volume of water processed.

3.2 Air Quality Monitoring

Treated off-gas discharged at the stack of the GWTP is subject to emissions limitations as described by the calculations submitted by the Navy and approved by the NYSDEC Division of Air Resources (DAR) in July 2009. A copy of the NYSDEC approved calculations are included as **Appendix B**.

While only sampling of the stack is required for NYSDEC compliance, vapor samples are also collected using 6L summa canisters at various locations to monitor for breakthrough of the VGAC units. The analytical results of monthly influent and effluent vapor samples collected during the Fourth Quarter 2010

are presented in **Table 2**. Air emissions calculations using the stack vapor concentrations along with discharge flowrates are presented in **Table 3**. The calculations demonstrate that all permitted constituents were in compliance.

3.3 Groundwater Quality Monitoring

The groundwater monitoring well system at the GM-38 Groundwater Remediation Area consists of 14 monitoring wells (as summarized in **Table 4**), 3 recovery wells (RW-1, RW-2, RW-3) and 1 injection well (IW-1). All well locations are shown on **Figure 3**.

On a quarterly basis, depth to water (DTW) measurements are collected from 12 of the monitoring wells, while water quality samples are collected from seven of the monitoring wells (as shown on **Figure 4**). Two wells, GM-38D and GM-38D2, located at the corner of Aurthur Avenue and Broadway shown in **Figure 5**, are being monitored by others.

The monitoring system includes well clusters located near the recovery and injection wells as described below and shown on **Figure 3**.

Recovery Well 1(RW-1)

The RW-1 cluster consists of three monitoring wells screened between 395 and 435 feet below ground surface (bgs). RW-1 MW-1 is located approximately 140 feet northwest of RW-1 and RW-1 MW-2 is located approximately 50 feet north of RW-1. RW-1 MW-3 is located approximately 400 feet northeast of RW-1, on the eastern side of Seaford Oyster Bay Expressway. All three wells are hydraulically monitored while only RW-1MW1 and RW-1MW-3 are monitored for water quality.

Recovery Well 2(RW-2)

The RW-2 cluster consists of three monitoring wells screened between 470 and 510 feet bgs. RW-2 MW-1 is located approximately 60 feet northwest of RW-2, RW-2 MW-2 is located approximately 20 feet west of RW-2, and RW-2 MW-3 is located approximately 100 feet west of RW-2. All three wells are hydraulically monitored while only RW-2 MW1 is monitored for water quality.

Recovery Well 3(RW-3)

The RW-3 cluster consists of four monitoring wells RW-3 MW-1 and RW-3 MW-3 are screened between 320 and 340 ft bgs, RW-3 MW-2 and RW-3 MW-4 are screened between 475 and 495 feet bgs. RW-3 MW-1 and RW-3 MW-2 are located approximately 500 feet west of the GM-38 cluster, at the intersection of Arthur Avenue and Leroy Avenue. RW-3 MW-3 and RW-3 MW-4 are located approximately 400 feet north of the intersection of Arthur Avenue and Broadway. All four wells are both hydraulically monitored and monitored for water quality.

Injection Well 3(IW-1)

There is one monitoring well associated with injection well IW-1. IW-1 MW-1 is screened between 130 and 150 feet bgs and is located approximately 20 feet south of IW-1. It is only hydraulically monitored.

TP-1

TP-1 is screened between 450 and 470 feet bgs and is located approximately 25 feet north of the GWTP building, inside the fenced area. It is hydraulically monitored to observe the change in water levels due to the influence from the pumping rates at the neighboring public water supply well field near the hot spot area.

3.3.1 Groundwater Quality Results

ECOR collected groundwater samples from seven (7) monitoring wells (RW1-MW1, RW1-MW3, RW2-MW1, RW3-MW1, RW3-MW2, RW3-MW3, RW3-MW4). Samples were collected using bladder pumps following the United States Environmental Protection Agency (USEPA) micropurge and low-flow sampling methodologies. Field parameters measured during well purging included pH, specific conductance (S.C.), temperature, oxidation-reduction potential (ORP) and dissolved oxygen (DO). The results are summarized in **Table 5**. Copies of the field notes are presented in **Appendix C**. Following stabilization of field parameters, samples were collected from the pump discharge.

Groundwater samples collected were submitted to a National Environmental Laboratory Accreditation Conference (NELAC) accredited laboratory (Accutest Laboratories located in Dayton, NJ) for the analysis of Target Compound List (TCL) VOCs using USEPA Method 624, Mercury using USEPA Method SW846 7470A, and TSS using USEPA Method SM20 2540D. Validated analytical results of samples collected during the monitoring event are summarized in **Table 6** along with data collected by ARCADIS in 2005 and by Tetra Tech EC in 2009 and January of 2010. The data validation report is presented in **Appendix D**. Analytical data is presented on **Appendix E**.

3.3.2 Quality Assurance/Quality Control Sampling

Additionally, the following quality assurance/quality control (QA/QC) samples were also collected: blind field duplicate (collected from RW3-MW2), field blank (FB), trip blank (TB), and matrix spike/matrix spike duplicate (MS/MSD). The results of the FB and TB samples indicate that only TCE and cis-1,2-DCE at estimated concentrations of 0.85J µg/L and 0.30 J µg/L respectively in the FB was detected above laboratory method detection limits (MDL).

For duplicate (DUP) samples, the precision between the original sample and its duplicate is evaluated by calculating the relative percent difference (RPD). ECOR has evaluated DUP samples using an acceptance criterion of twenty percent (20%) for detected primary COC. **Table 7** presents the RPDs for the groundwater. If the sample results are below MDLs a RPD cannot be calculated for that sample. As shown on **Table 7**, none of the calculated RPDs were above the 20% criteria. The overall consistency between the samples indicates that proper sample collection methods were followed.

TABLES

Table 1
GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Discharge Monitoring Results
Fourth Quarter 2010

SPDES Parameters	Daily Maximum Limit	Units	October 2010				November 2010				December 2010			
			RW-1	RW-3	Influent	Effluent	RW-1	RW-3	Influent	Effluent	RW-1	RW-3	Influent	Effluent
Process Stream			RW-1	RW-3	Influent	Effluent	RW-1	RW-3	Influent	Effluent	RW-1	RW-3	Influent	Effluent
Well Depth		ft	500	500	N/A	N/A	500	500	N/A	N/A	500	500	N/A	N/A
Screened Interval		ft	470-500	470-500	N/A	N/A	470-500	470-500	N/A	N/A	470-500	470-500	N/A	N/A
Sampling Date			10/28/10				11/23/10				12/29/10			
Average Flowrate	1100	GPM	779	249	1028	1074	775	251	1026	1066	0	0	0	0
Total Flow		gallons	NR	NR	45,909,051	47,944,954	NR	NR	44,323,200	46,051,200	NR	NR	0	0
pH	5.5 - 8.5	SU	NR	NR	5.7	7.7	NR	NR	5.9	7.6	NR	NR	5.9	0.0
1,1-Dichloroethane	5	µg/l	2.8	1.7	2.5	ND	3.1	2	2.8	ND	3.0	1.7	5.3	ND
1,2-Dichloroethane	0.6	µg/l	ND	ND	ND	ND	0.54	ND	ND	ND	ND	ND	ND	ND
1,1-Dichloroethene	5	µg/l	6.3	1.4	5.1	ND	6.7	1.9	5.5	ND	7.3	1.5	9.3	ND
Carbon Tetrachloride	N/A	µg/l	0.63	ND	0	ND	0.65	0.18	1	ND	0.8 J	0.19 J	1.06 J	ND
cis 1,2-Dichloroethene	5	µg/l	68.3	2.3	52.3	2.5	68.2	2.2	52.1	ND	61.5	2.1	64.6	ND
trans 1,2-Dichloroethene	5	µg/l	1.4	ND	1	ND	1.2	ND	1	ND	0.93 J	ND	0.9	ND
Tetrachloroethene	5	µg/l	134	ND	102	ND	112	ND	85	ND	112	ND	113	ND
1,1,1-Trichloroethene	5	µg/l	8.3	0.72	6	ND	7.8	1.1	6	ND	8.9	1.3	10.7	ND
Trichloroethene	5	µg/l	423	321	398	0.49	430	328	405	ND	415	314	834	0.58 J
Vinyl Chloride	2	µg/l	7.1	ND	5.4	ND	8	ND	6.0	ND	7.2	ND	7.2	ND
Mercury	0.25	µg/l	< 0.20	<0.20	<0.20	<0.20	< 0.20	<0.20	<0.20	<0.20	< 0.20	<0.20	<0.20	<0.20

Notes:

J, B - Estimated result less than reporting limit

ND - Not Detected

NR - Not Recorded

SU - standard units

µg/l - micrograms per liter

gpm - gallons per minute

Table 2
GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Air Sampling Results
Fourth Quarter 2010

DAR Parameters	SGC	Units	October 2010		November 2010		December 2010	
			Influent	Effluent	Influent	Effluent	Influent	Effluent
Process Stream								
Sampling Date			10/20/10		11/23/10		12/15/10	
Average Flowrate		CFM		8855		9240		9415
Trichloroethene	14000	$\mu\text{g}/\text{m}^3$	21000	ND	7300	29	11000	12
Tetrachloroethene	1000	$\mu\text{g}/\text{m}^3$	11000	ND	4600	6.5	14000	6.4
Vinyl Chloride	180000	$\mu\text{g}/\text{m}^3$	63	44	74	ND	58	ND
trans 1,2-Dichloroethene	-	$\mu\text{g}/\text{m}^3$	ND	5.6	ND	ND	ND	ND
cis 1,2-Dichloroethene	-	$\mu\text{g}/\text{m}^3$	620	640	550	9.2	790	11
1,2-Dichloroethene (total)	-	$\mu\text{g}/\text{m}^3$	620	645.6	550	9.2	790	11
1,2-Dichloroethane	-	$\mu\text{g}/\text{m}^3$	ND	ND	ND	ND	ND	ND
Toluene	37000	$\mu\text{g}/\text{m}^3$	ND	ND	ND	ND	ND	ND
Xylene	4300	$\mu\text{g}/\text{m}^3$	ND	ND	ND	ND	ND	ND
1,1,2-Trichloroethane	-	$\mu\text{g}/\text{m}^3$	ND	ND	ND	ND	ND	ND

Notes:

ND - Not detected

NR - Not recorded

SGC - Short-term Guideline Concentration

$\mu\text{g}/\text{m}^3$ - micrograms per cubic meter

CFM - cubic feet per minute

DAR - Division of Air Resources

Table 3
GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Stack Emissions
Fourth Quarter 2010

DAR Parameters	Discharge Limit	Units	October 2010	November 2010	December 2010
Sampling Date			10/20/10	11/23/10	12/15/10
Average Flowrate		CFM	9401	9240	9415
Total Flow		ft ³	419,649,480	399,168,000	420,300,480
Total Flow		m ³	11,876,080	11,296,454	11,894,504
Trichloroethene	0.09	lb/hr	0.00	0.001	0.0004
Tetrachloroethene	0.02	lb/hr	0.00	0.00	0.0002
Vinyl Chloride	0.01	lb/hr	0.0015	0.00	0.00
1,2 Dichloroethene	0.03	lb/hr	0.0227	0.0003	0.0004
1,2-Dichloroethane	BRT	lb/hr	0.00	0.00	0.00
Toluene	BRT	lb/hr	0.00	0.00	0.00
Xylene	BRT	lb/hr	0.00	0.00	0.00
1,1,2-Trichloroethane	BRT	lb/hr	0.00	0.00	0.00

Notes:

BRT - Below reporting thresholds

lb/hr - pounds per hour

DAR - Division of Air Resources

CFM - Cubic feet per minute

Table 4
GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Groundwater Level Measurements
Fourth Quarter 2010

Monitoring Well ID	Date	Time	Total Depth (ft)	Screen Interval (ft)	Depth to Water (ft)
RW1-MW1	11/03/10	1300	435	395-435	33.42
RW1-MW2	11/03/10	1530	435	395-435	35.99
RW1-MW3	11/03/10	1330	435	395-435	33.53
RW2-MW1	11/03/10	0900	510	470-510	39.16
RW2-MW2	11/03/10	1605	510	470-510	39.80
RW2-MW3	11/03/10	1600	510	470-510	40.12
RW3-MW1	11/03/10	1000	350	330-350	34.08
RW3-MW2	11/03/10	0930	495	475-795	38.05
RW3-MW3	11/03/10	1145	340	320-340	40.14
RW3-MW4	11/03/10	1040	495	475-495	40.01
TP-1	11/03/10	1545	470	450-470	30.84
IW1-MW1	11/03/10	1535	NA	NA	33.92
GM38D	11/03/10	NA	340	320-340	NA
GM382D	11/03/10	NA	495	475-495	NA

Notes:

ft - Feet

NA - Not Available

Table 5
Summary of Final Groundwater Chemistry Data
GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Summary of Groundwater Chemistry Data
Fourth Quarter 2010

Location	pH (SU)	S.C. (mS/cm)	Turbidity (NTU)	DO (mg/L)	Temp (°C)	ORP (MV)	Color (Visual)
RW1-MW1	5.81	269	N/A	0.36	14.51	102	cloudy
RW1-MW3	6.90	179	N/A	0.62	13.19	120	clear
RW2-MW1	5.19	229	23.0	0.30	15.50	110	clear
RW3-MW1	5.41	157	N/A	0.44	12.22	157	clear
RW3-MW2	4.92	135	N/A	1.60	14.08	159	clear
RW3-MW3	5.86	155	2.30	0.55	13.59	136	clear
RW3-MW4	4.70	170	0.20	0.80	13.56	192	clear

Notes:

S.C. = Specific Conductance

mS/cm = milliSiemens per centimeter

NTU = nephelometric turbidity units

mg/L = milligrams per liter

°C = degrees celsius

MV = millivolts

SU = standard units

ORP = oxidation/reduction potential

NWIRP = Naval Weapons Industrial Reserve Plant

N/A = Not Available due to equipment failure

Table 6
GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Summary of Groundwater Data thru November 2010

Sample ID	RW1-MW1						
	5/4/2005	7/22/2005	5/27/2009	1/21/2010	4/21/2010	7/28/2010	11/10/2010
Sample Date							
Comments							
Well Depth (Ft)	435						
Screened Interval (Ft)	395-435						
TCL VOC (8260B/624) ug/L							
acetone	ND	ND	ND	NR	ND	ND	ND
benzene	ND	ND	ND	ND	ND	ND	ND
bromodichloromethane	ND	ND	ND	NR	ND	ND	ND
bromoform	ND	ND	ND	NR	ND	ND	ND
bromomethane	ND	ND	ND	NR	ND	ND	ND
2-butanone	R	R	ND	NR	ND	ND	ND
carbon disulfide	ND	ND	ND	NR	ND	ND	ND
carbon tetrachloride	ND	ND	0.32J	ND	ND	ND	0.17J
chlorobenzene	ND	ND	ND	ND	ND	ND	ND
chloroethane	ND	ND	ND	ND	ND	ND	ND
chloroform	ND	0.7J	1.1	ND	0.70J	0.65J	0.56J
chloromethane	ND	ND	ND	NR	ND	ND	ND
cyclohexane	NR	NR	ND	NR	NR	NR	NR
dibromochloromethane	NR	NR	ND	NR	ND	ND	ND
1,1-dichloroethane	0.74J	0.79J	3.3	2.9J	2.8	2.8	3.0
1,2-dichloroethane	ND	ND	0.29J	ND	ND	ND	ND
1,1-dichloroethene	1.3	2.8	3.1	1.7J	1.9	1.7	1.7
cis-1,2-dichloroethene	78.6	80.4	180D	130	121	118	108
trans-1,2-dichloroethene	2.0	1.3J	2.8	4J	2.9	2.1	1.3
1,2-dichloropropane	ND	ND	ND	NR	ND	ND	ND
cis-1,3-dichloropropene	ND	ND	ND	NR	ND	ND	ND
trans-1,3-dichloropropene	ND	ND	ND	NR	ND	ND	ND
1,4-dioxane	1.75J	NR	NR	NR	NR	NR	NR
ethylbenzene	ND	ND	ND	ND	ND	ND	ND
2-hexanone	ND	ND	ND	NR	ND	ND	ND
methylene chloride	ND	ND	ND	NR	ND	ND	ND
4-methyl-2-pentanone	ND	ND	ND	NR	ND	ND	ND
methyl-tert-butyl-ether	NR	NR	ND	ND	NR	NR	NR
styrene	ND	ND	ND	NR	ND	ND	ND
1,1,2,2-tetrachloroethane	ND	ND	ND	NR	ND	ND	ND
1,2,4-trichlorobenzene	NR	NR	ND	NR	NR	NR	NR
tetrachloroethene	ND	ND	0.72J	ND	0.42J	ND	ND
1,1,1-trichloroethane	ND	ND	0.71J	ND	0.52J	0.43J	0.53J
1,1,2-trichloroethane	ND	ND	0.58J	NR	ND	ND	ND
trichloroethene	53.6	52.7	140.0	79.0	116	95.4	84.2
trichlorofluoromethane	NR	NR	ND	NR	NR	NR	NR
toluene	ND	0.33J	0.68	ND	ND	ND	ND
vinyl chloride	ND	ND	1.6	ND	ND	ND	0.17J
xylenes (total)	ND	ND	ND	ND	ND	ND	ND
Mercury (SW846-7470A) ug/L	NR	NR	ND	0.20	<0.20	<0.20	<0.20
TSS (SM20 2540D) mg/L	NR	NR	2.8	2.8	6.0	4.0	4.0

Note:

VOC analysis changed to EPA Method 624 in January 2010

D-dilution

J-estimated value

ND-not detected

NR-not requested

R-Rejected

mg/L - milligrams per liter

µg/l - micrograms per liter

Table 6
GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Summary of Groundwater Data thru November 2010

Sample ID	RW1-MW2			RW1-MW3			
	5/4/2005	7/22/2005	5/28/2009	1/20/2010	4/21/2010	7/29/2010	11/10/2010
Sample Date	5/4/2005	7/22/2005	5/28/2009	1/20/2010	4/21/2010	7/29/2010	11/10/2010
Comments							
Well Depth (Ft)	435			435			
Screened Interval (Ft)	395-435			395-435			
TCL VOC (8260B/624) ug/L							
acetone	ND	ND	ND	NR	ND	ND	ND
benzene	ND	ND	ND	ND	ND	ND	ND
bromodichloromethane	ND	ND	ND	NR	ND	ND	ND
bromoform	ND	ND	ND	NR	ND	ND	ND
bromomethane	ND	ND	ND	NR	ND	ND	ND
2-butanone	R	R	ND	NR	ND	ND	ND
carbon disulfide	ND	ND	ND	NR	ND	ND	ND
carbon tetrachloride	ND	ND	ND	ND	ND	ND	ND
chlorobenzene	ND	ND	ND	ND	ND	ND	ND
chloroethane	ND	ND	ND	NR	ND	ND	ND
chloroform	ND	1.4	ND	0.67J	0.80J	0.47J	0.69J
chloromethane	ND	ND	ND	NR	ND	ND	ND
cyclohexane	NR	NR	ND	NR	NR	NR	NR
dibromochloromethane	NR	NR	ND	NR	NR	NR	NR
1,1-dichloroethane	4.6	5.5	3.4	2.4	4.6	1.5	2.3
1,2-dichloroethane	ND	ND	ND	ND	ND	ND	ND
1,1-dichloroethene	3.2	12.3	ND	0.42J	1.10	ND	0.28J
cis-1,2-dichloroethene	181.0	47.6	160.0	0.54J	0.48J	0.36J	0.55J
trans-1,2-dichloroethene	2.5	7.6	2.5	ND	ND	ND	ND
1,2-dichloropropane	ND	ND	ND	NR	ND	ND	ND
cis-1,3-dichloropropene	ND	ND	ND	NR	ND	ND	ND
trans-1,3-dichloropropene	ND	ND	ND	NR	ND	ND	ND
1,4-dioxane	4.01	NR	NR	NR	NR	NR	NR
ethylbenzene	ND	ND	ND	ND	ND	ND	ND
2-hexanone	ND	ND	ND	NR	ND	ND	ND
methylene chloride	1.0	ND	ND	NR	ND	ND	ND
4-methyl-2-pentanone	ND	ND	ND	NR	NR	NR	NR
methyl-tert-butyl-ether	NR	NR	ND	ND	NR	NR	NR
styrene	ND	ND	ND	NR	ND	ND	ND
1,1,2,2-tetrachloroethane	ND	ND	ND	NR	ND	ND	ND
1,2,4-trichlorobenzene	NR	NR	ND	NR	NR	NR	NR
tetrachloroethene	ND	134.0	19.0	ND	049J	ND	ND
1,1,1-trichloroethane	1.3	1.0	ND	0.41J	0.98J	ND	0.26J
1,1,2-trichloroethane	ND	0.65J	ND	0.62J	0.60J	0.36J	0.55J
trichloroethene	158.0	198.0	200.0	1.2	1.6	0.58J	0.91J
trichlorofluoromethane	NR	NR	ND	NR	NR	NR	NR
toluene	0.32J	ND	ND	ND	ND	ND	ND
vinyl chloride	12.9	187.0	4.1	ND	ND	ND	ND
xylenes (total)	ND	ND	ND	ND	ND	ND	ND
Mercury (SW846-7470A) ug/L	NR	NR	0.20	NR	<0.20	<0.20	<0.20
TSS (SM20 2540D) mg/L	NR	NR	4.0	NR	8.0	<4.0	<4.0

Note:

VOC analysis changed to EPA Method

D-dilution

J-estimated value

ND-not detected

NR-not requested

R-Rejected

mg/L - milligrams per liter

µg/l - micrograms per liter

Table 6
GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Summary of Groundwater Data thru November 2010

Sample ID	RW2-MW1						
	5/4/2005	7/20/2005	5/27/2009	1/18/2010	4/21/2010	7/28/2010	11/3/2010
Sample Date	5/4/2005	7/20/2005	5/27/2009	1/18/2010	4/21/2010	7/28/2010	11/3/2010
Comments	EPA 624						
Well Depth (Ft)	510						
Screened Interval (Ft)	470-510						
TCL VOC (8260B/624) ug/L							
acetone	ND	ND	ND	NR	ND	ND	ND
benzene	ND	ND	ND	ND	0.15J	0.69J	0.58J
bromodichloromethane	ND	ND	ND	NR	ND	ND	ND
bromoform	ND	ND	ND	NR	ND	ND	ND
bromomethane	ND	ND	ND	NR	ND	ND	ND
2-butanone	R	R	ND	NR	ND	ND	ND
carbon disulfide	ND	ND	ND	NR	ND	ND	ND
carbon tetrachloride	ND	ND	ND	ND	ND	ND	ND
chlorobenzene	ND	ND	ND	ND	ND	ND	ND
chloroethane	ND	ND	ND	NR	ND	ND	ND
chloroform	ND	ND	ND	ND	ND	ND	ND
chloromethane	ND	ND	ND	NR	ND	ND	ND
cyclohexane	NR	NR	ND	NR	NR	NR	NR
dibromochloromethane	NR	NR	ND	NR	ND	ND	ND
1,1-dichloroethane	0.53J	0.93J	1.2J	0.82J	0.60J	0.58J	0.42J
1,2-dichloroethane	ND	ND	ND	ND	ND	ND	ND
1,1-dichloroethene	ND	0.58J	0.55J	0.63J	ND	ND	ND
cis-1,2-dichloroethene	ND	0.55J	1.9	1.0	0.78J	0.80J	0.55J
trans-1,2-dichloroethene	ND	ND	ND	ND	ND	ND	ND
1,2-dichloropropane	ND	ND	ND	NR	ND	ND	ND
cis-1,3-dichloropropene	ND	ND	ND	NR	ND	ND	ND
trans-1,3-dichloropropene	ND	ND	ND	NR	ND	ND	ND
1,4-dioxane	5.34	NR	NR	NR	NR	NR	NR
ethylbenzene	ND	ND	ND	ND	ND	ND	ND
2-hexanone	ND	ND	ND	NR	ND	ND	ND
methylene chloride	ND	ND	ND	NR	ND	ND	ND
4-methyl-2-pentanone	ND	ND	ND	NR	ND	ND	ND
methyl-tert-butyl-ether	NR	NR	ND	ND	NR	NR	NR
styrene	ND	ND	ND	NR	ND	ND	ND
1,1,2,2-tetrachloroethane	ND	ND	ND	NR	ND	ND	ND
1,2,4-trichlorobenzene	NR	NR	ND	NR	ND	ND	ND
tetrachloroethene	ND	ND	ND	ND	ND	ND	ND
1,1,1-trichloroethane	ND	0.37J	ND	ND	ND	ND	ND
1,1,2-trichloroethane	ND	ND	ND	ND	ND	ND	ND
trichloroethene	37.6	34.6	12.0	15.0	0.42J	ND	ND
trichlorofluoromethane	NR	NR	ND	NR	NR	NR	NR
toluene	ND	0.85J	1.0	ND	0.52J	0.49J	0.50J
vinyl chloride	ND	ND	ND	ND	ND	ND	ND
xylenes (total)	ND	1.4J	ND	ND	ND	ND	ND
Mercury (SW846-7470A) ug/L	NR	NR	0.05J	NR	<0.20	<0.20	<0.20
TSS (SM20 2540D) mg/L	NR	NR	2260.0	NR	58.0	<4.0	<4.0

Note:

VOC analysis changed to EPA Method

D-dilution

J-estimated value

ND-not detected

NR-not requested

R-Rejected

mg/L - milligrams per liter

µg/l - micrograms per liter

Table 6
 GM-38 Area Groundwater Remediation
 Groundwater Treatment Plant
 Naval Weapons Industrial Reserve Plant - Bethpage, NY
 Summary of Groundwater Data thru November 2010

Sample ID	RW2-MW2		RW2-MW3			RW3-MW1			
	5/4/2005	7/21/2005	5/3/2005	7/20/2005	5/28/2009	1/19/2010	4/22/2010	7/29/2010	11/9/2010
Comments									
Well Depth (Ft)	510		510			350			
Screened Interval (Ft)	470-510		470-510			330-350			
TCL VOC (8260B/624) ug/L									
acetone	ND	ND	ND	ND	ND	NR	ND	ND	ND
benzene	ND	ND	ND	ND	ND	ND	ND	ND	ND
bromodichloromethane	ND	ND	ND	ND	ND	NR	ND	ND	ND
bromoform	ND	ND	ND	ND	ND	NR	ND	ND	ND
bromomethane	ND	ND	ND	ND	ND	NR	ND	ND	ND
2-butanone	R	R	R	R	ND	NR	ND	ND	ND
carbon disulfide	ND	ND	ND	ND	ND	NR	ND	ND	ND
carbon tetrachloride	ND	ND	ND	ND	ND	ND	ND	ND	0.19J
chlorobenzene	ND	ND	ND	ND	ND	ND	ND	ND	ND
chloroethane	ND	ND	ND	ND	ND	NR	ND	ND	ND
chloroform	ND	ND	ND	ND	ND	ND	ND	ND	0.20J
chloromethane	ND	ND	ND	ND	ND	NR	ND	ND	ND
cyclohexane	NR	NR	NR	NR	ND	NR	NR	NR	NR
dibromochloromethane	NR	NR	NR	NR	ND	NR	ND	ND	ND
1,1-dichloroethane	ND	0.78J	0.68J	0.31J	1.4	1.6	1.5	1.7	1.4
1,2-dichloroethane	ND	ND	ND	ND	ND	0.27J	ND	ND	ND
1,1-dichloroethene	ND	0.41J	ND	ND	0.42J	1.2	1.3	1.2	1.2
cis-1,2-dichloroethene	0.33J	0.41J	0.40J	0.66J	2.3	0.37J	ND	0.32J	0.45J
trans-1,2-dichloroethene	ND	ND	ND	ND	ND	ND	ND	ND	ND
1,2-dichloropropane	ND	ND	ND	ND	ND	NR	ND	ND	ND
cis-1,3-dichloropropene	ND	ND	ND	ND	ND	NR	ND	ND	ND
trans-1,3-dichloropropene	ND	ND	ND	ND	ND	NR	ND	ND	ND
1,4-dioxane	7.45J	NR	7.42J	NR	NR	NR	NR	NR	NR
ethylbenzene	ND	ND	ND	ND	ND	ND	ND	ND	ND
2-hexanone	ND	ND	ND	ND	ND	NR	ND	ND	ND
methylene chloride	ND	ND	ND	ND	ND	NR	ND	ND	ND
4-methyl-2-pentanone	ND	ND	ND	ND	ND	NR	ND	ND	ND
methyl-tert-butyl-ether	NR	NR	NR	NR	ND	ND	NR	NR	NR
styrene	ND	ND	ND	ND	ND	NR	ND	ND	ND
1,1,2,2-tetrachloroethane	ND	ND	ND	ND	ND	NR	ND	ND	ND
1,2,4-trichlorobenzene	NR	NR	NR	NR	ND	NR	NR	NR	NR
tetrachloroethene	ND	ND	ND	ND	ND	0.49J	0.81J	0.73J	1.5
1,1,1-trichloroethane	ND	ND	ND	ND	ND	ND	0.98J	0.84J	1.2
1,1,2-trichloroethane	D	ND	ND	ND	ND	ND	ND	ND	ND
trichloroethene	7.8	13.8	16.2	20.6	18.0	35.0	53.2	52.3	77.6
trichlorofluoromethane	NR	NR	NR	NR	ND	NR	NR	NR	NR
toluene	0.33J	0.53J	ND	0.50J	0.39J	ND	ND	ND	ND
vinyl chloride	ND	ND	ND	ND	ND	ND	ND	ND	ND
xylenes (total)	ND	ND	ND	ND	ND	ND	ND	ND	ND
Mercury (SW846-7470A) ug/L	NR	NR	NR	NR	NR	NR	<0.20	<0.20	<0.20
TSS (SM20 2540D) mg/L	NR	NR	NR	NR	14.8	NR	<4.0	<4.0	<4.0

Note:

VOC analysis changed to EPA Method
 D-dilution
 J-estimated value
 ND-not detected
 NR-not requested
 R-Rejected
 mg/L - milligrams per liter
 ug/l - micrograms per liter

Table 6
GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Summary of Groundwater Data thru November 2010

Sample ID	RW3-MW2					
	1/19/2010	1/19/2010	4/22/2010	7/29/2010	11/9/2010	11/9/2010
Sample Date		duplicate			duplicate	
Comments						
Well Depth (Ft)	495					
Screened Interval (Ft)	475-495					
TCL VOC (8260B/624) ug/L						
acetone	NR	NR	ND	ND	ND	ND
benzene	ND	ND	ND	ND	ND	ND
bromodichloromethane	NR	NR	ND	ND	ND	ND
bromoform	NR	NR	ND	ND	ND	ND
bromomethane	NR	NR	ND	ND	ND	ND
2-butanone	NR	NR	ND	ND	ND	ND
carbon disulfide	NR	NR	ND	ND	ND	ND
carbon tetrachloride	ND	ND	ND	ND	ND	ND
chlorobenzene	ND	ND	ND	ND	ND	ND
chloroethane	NR	NR	ND	ND	ND	ND
chloroform	ND	ND	ND	ND	ND	ND
chloromethane	NR	NR	ND	ND	ND	ND
cyclohexane	NR	NR	NR	NR	NR	NR
dibromochloromethane	NR	NR	ND	ND	ND	ND
1,1-dichloroethane	ND	ND	0.54J	ND	ND	ND
1,2-dichloroethane	ND	ND	ND	ND	ND	ND
1,1-dichloroethene	ND	ND	1.2	ND	ND	ND
cis-1,2-dichloroethene	1.5J	1.6J	2.4	1.1	0.92J	0.92J
trans-1,2-dichloroethene	ND	ND	0.43 J	ND	ND	ND
1,2-dichloropropane	NR	NR	ND	ND	ND	ND
cis-1,3-dichloropropene	NR	NR	ND	ND	ND	ND
trans-1,3-dichloropropene	NR	NR	ND	ND	ND	ND
1,4-dioxane	NR	NR	NR	NR	NR	NR
ethylbenzene	ND	ND	ND	ND	ND	ND
2-hexanone	NR	NR	ND	ND	ND	ND
methylene chloride	NR	NR	ND	ND	ND	ND
4-methyl-2-pentanone	NR	NR	ND	ND	ND	ND
methyl-tert-butyl-ether	ND	ND	NR	NR	NR	NR
styrene	NR	NR	ND	ND	ND	ND
1,1,2,2-tetrachloroethane	NR	NR	ND	ND	ND	ND
1,2,4-trichlorobenzene	NR	NR	NR	NR	NR	NR
tetrachloroethene	ND	ND	ND	ND	ND	ND
1,1,1-trichloroethane	ND	ND	0.58J	ND	ND	ND
1,1,2-trichloroethane	ND	ND	ND	ND	0.25 J	0.27J
trichloroethene	160	170	211	73	58.2	60.9
trichlorofluoromethane	NR	NR	NR	NR	NR	NR
toluene	ND	ND	ND	ND	ND	ND
vinyl chloride	ND	ND	ND	ND	ND	ND
xylenes (total)	ND	ND	ND	ND	ND	ND
Mercury (SW846-7470A) ug/L	NR	NR	<0.20	<0.20	<0.20	<0.20
TSS (SM20 2540D) mg/L	NR	NR	5.0	6.0	ND	10.0

Note:

VOC analysis changed to EPA Method

D-dilution

J-estimated value

ND-not detected

NR-not requested

R-Rejected

mg/L - milligrams per liter

µg/l - micrograms per liter

Table 6
GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Summary of Groundwater Data thru November 2010

Sample ID	RW3-MW3				
	1/20/2010	4/22/2010	4/22/2010	7/28/2010	11/3/2010
Sample Date					
Comments			duplicate		
Well Depth (Ft)	340				
Screened Interval (Ft)	320-340				
TCL VOC (8260B/624) ug/L					
acetone	NR	ND	ND	ND	ND
benzene	ND	ND	ND	ND	ND
bromodichloromethane	NR	ND	ND	ND	ND
bromoform	NR	ND	ND	ND	ND
bromomethane	NR	ND	ND	ND	ND
2-butanone	NR	ND	ND	ND	ND
carbon disulfide	NR	ND	ND	ND	ND
carbon tetrachloride	ND	ND	ND	ND	ND
chlorobenzene	ND	ND	ND	ND	ND
chloroethane	NR	NR	NR	NR	NR
chloroform	ND	ND	0.40J	0.46J	ND
chloromethane	NR	ND	ND	ND	ND
cyclohexane	NR	NR	NR	NR	NR
dibromochloromethane	NR	ND	ND	ND	ND
1,1-dichloroethane	ND	1.6	1.6	2.3	1.0
1,2-dichloroethane	ND	0.52J	0.54J	ND	ND
1,1-dichloroethene	ND	1.1	1.3	1.2	ND
cis-1,2-dichloroethene	ND	2.1	2.1	1.7	ND
trans-1,2-dichloroethene	ND	ND	ND	ND	ND
1,2-dichloropropane	NR	ND	ND	ND	ND
cis-1,3-dichloropropene	NR	ND	ND	ND	ND
trans-1,3-dichloropropene	NR	ND	ND	ND	ND
1,4-dioxane	NR	NR	NR	NR	NR
ethylbenzene	ND	ND	ND	ND	ND
2-hexanone	NR	ND	ND	ND	ND
methylene chloride	NR	ND	ND	ND	ND
4-methyl-2-pentanone	NR	ND	ND	ND	ND
methyl-tert-butyl-ether	ND	NR	NR	NR	NR
styrene	NR	ND	ND	ND	ND
1,1,2,2-tetrachloroethane	NR	ND	ND	ND	ND
1,2,4-trichlorobenzene	NR	NR	NR	NR	NR
tetrachloroethene	ND	0.45J	0.49J	ND	ND
1,1,1-trichloroethane	ND	0.95J	1.0J	0.72J	ND
1,1,2-trichloroethane	ND	ND	ND	ND	ND
trichloroethene	350	397	382	297	8.5
trichlorofluoromethane	NR	NR	NR	NR	NR
toluene	ND	ND	ND	ND	ND
vinyl chloride	ND	ND	ND	ND	ND
xylenes (total)	ND	ND	ND	ND	ND
Mercury (SW846-7470A) ug/L	NR	<0.20	<0.20	<0.20	<0.20
TSS (SM20 2540D) mg/L	NR	4.0	5.0	<4.0	<4.0

Note:

VOC analysis changed to EPA Method

D-dilution

J-estimated value

ND-not detected

NR-not requested

R-Rejected

mg/L - milligrams per liter

µg/l - micrograms per liter

Table 6
GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Summary of Groundwater Data thru November 2010

Sample ID	RW3-MW4					IW-1 MW-1	IW-1	TP-01
	1/20/2010	4/22/2010	7/28/2010	7/28/2010	11/3/2010	5/3/2005	5/27/2009	1/21/2010
Comments				duplicate				
Well Depth (Ft)	495					150	230	470
Screened Interval (Ft)	475-495					130-150	200-230	470-510
TCL VOC (8260B/624) ug/L								
acetone	NR	ND	ND	ND	ND	ND	ND	NR
benzene	ND	ND	ND	ND	ND	ND	ND	ND
bromodichloromethane	NR	ND	ND	ND	ND	ND	ND	NR
bromoform	NR	ND	ND	ND	ND	ND	ND	NR
bromomethane	NR	ND	ND	ND	ND	ND	ND	NR
2-butanone	NR	ND	ND	ND	ND	R	ND	NR
carbon disulfide	NR	ND	ND	ND	ND	ND	ND	NR
carbon tetrachloride	ND	ND	ND	ND	ND	ND	ND	ND
chlorobenzene	ND	ND	ND	ND	ND	ND	ND	ND
chloroethane	NR	NR	NR	NR	NR	ND	ND	NR
chloroform	ND	ND	ND	ND	0.32J	0.94J	0.98J	ND
chloromethane	NR	ND	ND	ND	ND	ND	ND	NR
cyclohexane	NR	NR	NR	NR	NR	NR	ND	NR
dibromochloromethane	NR	ND	ND	ND	ND	NR	ND	NR
1,1-dichloroethane	2.5	0.6	0.54J	0.50J	1.8	0.39J	0.22J	3.6J
1,2-dichloroethane	ND	ND	ND	ND	ND	ND	ND	ND
1,1-dichloroethene	1.0	ND	ND	ND	0.86J	ND	ND	ND
cis-1,2-dichloroethene	0.46J	ND	ND	ND	1.6	ND	ND	190
trans-1,2-dichloroethene	ND	ND	ND	ND	ND	ND	ND	3.0J
1,2-dichloropropane	NR	ND	ND	ND	ND	ND	ND	NR
cis-1,3-dichloropropene	NR	ND	ND	ND	ND	ND	ND	NR
trans-1,3-dichloropropene	NR	ND	ND	ND	ND	ND	ND	NR
1,4-dioxane	NR	NR	NR	NR	NR	NR	NR	NR
ethylbenzene	ND	ND	ND	ND	ND	ND	ND	ND
2-hexanone	NR	ND	ND	ND	ND	ND	ND	NR
methylene chloride	NR	ND	ND	ND	ND	ND	ND	NR
4-methyl-2-pentanone	NR	ND	ND	ND	ND	ND	ND	NR
methyl-tert-butyl-ether	ND	NR	NR	NR	NR	NR	0.46J	ND
styrene	NR	ND	ND	ND	ND	ND	ND	NR
1,1,2,2-tetrachloroethane	NR	ND	ND	ND	ND	ND	ND	NR
1,2,4-trichlorobenzene	NR	NR	NR	NR	NR	NR	ND	NR
tetrachloroethene	ND	ND	ND	ND	ND	ND	ND	3.4J
1,1,1-trichloroethane	ND	ND	ND	ND	0.67J	0.47	0.49J	ND
1,1,2-trichloroethane	ND	ND	ND	ND	ND	ND	ND	ND
trichloroethene	21	11	7.5	8.0	308	ND	0.17J	65
trichlorofluoromethane	NR	NR	NR	NR	NR	NR	ND	NR
toluene	ND	ND	ND	ND	ND	ND	0.19J	ND
vinyl chloride	ND	ND	ND	ND	ND	ND	ND	ND
xylenes (total)	ND	ND	ND	ND	ND	ND	ND	ND
Mercury (SW846-7470A) ug/L	NR	<0.20	<0.20	<0.20	<0.20	NR	0.20	NR
TSS (SM20 2540D) mg/L	NR	16.0	<4.0	<4.0	<4.0	NR	2.4	NR

Note:

VOC analysis changed to EPA Method

D-dilution

J-estimated value

ND-not detected

NR-not requested

R-Rejected

mg/L - milligrams per liter

ug/l - micrograms per liter

Table 7
GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Calculated Relative Percent Difference
Fourth Quarter 2010

Well ID RW3-MW2

Blind Duplicate Sample ID DUP

Constituent	Concentration (µg/L)		RPD
	Original	Duplicate	
Carbon Tetrachloride	ND	ND	NC
Chloroform	ND	ND	NC
1,1-Dichloroethane	ND	ND	NC
1,2-Dichloroethane	ND	ND	NC
1,1-Dichloroethene	ND	ND	NC
cis-1,2-Dichloroethene	0.92 J	0.92 J	0%
trans-1,2-Dichloroethene	ND	ND	NC
Tetrachloroethene	ND	ND	NC
1,1,1-Trichloroethane	ND	ND	NC
1,1,2-Trichloroethane	0.27 J	0.25 J	8%
Trichloroethene	60.9	58.2	5%
Toluene	ND	ND	NC
Vinyl Chloride	ND	ND	NC

Notes:

J = Estimated value

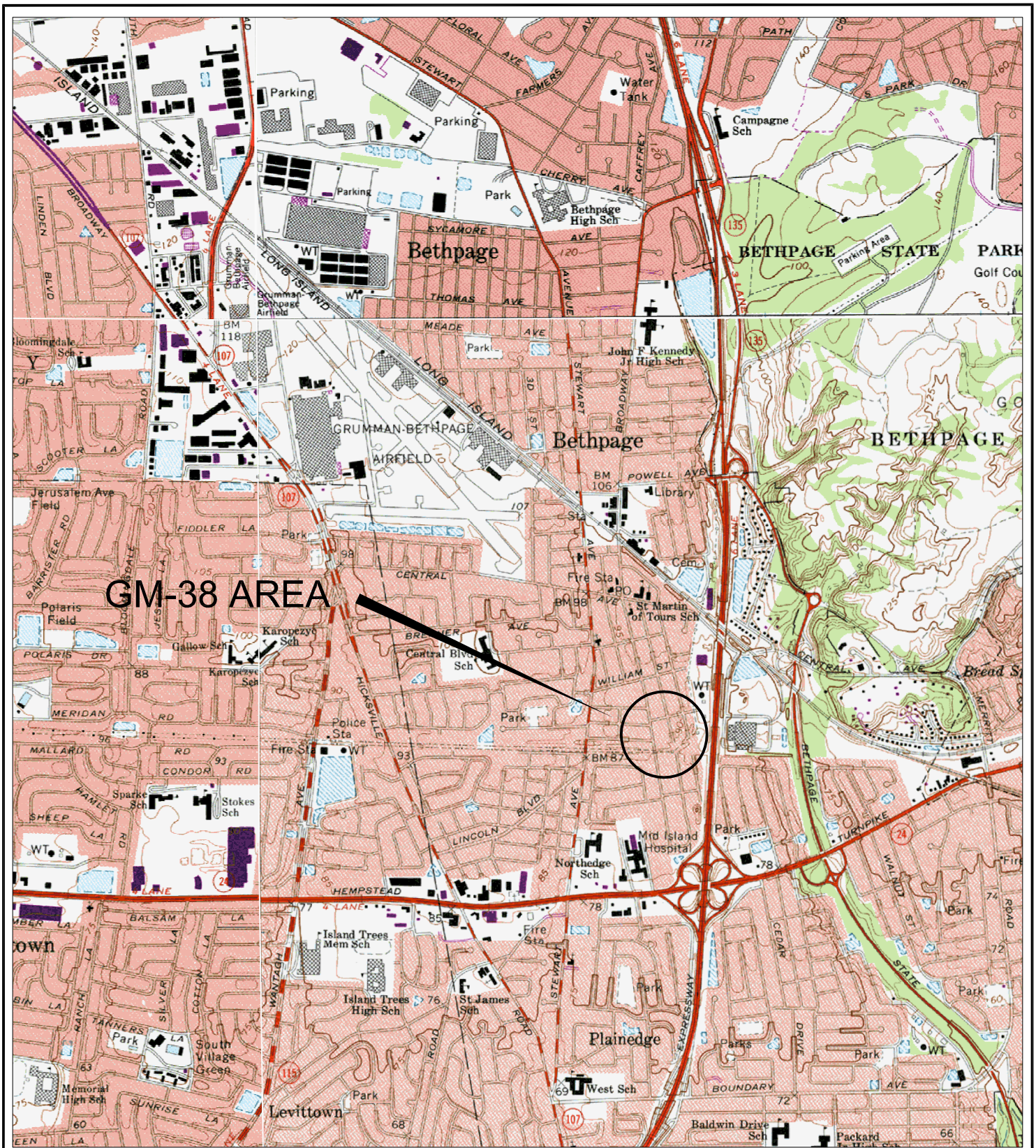
NC = not calculated

ND = not detected above laboratory detection limit

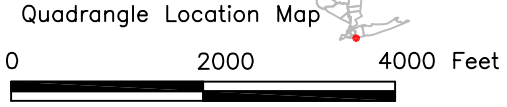
mg/L = micrograms per liter

$$\text{RPD} = \text{Relative Percent Difference} = \frac{(\text{Original Concentration} - \text{Duplicate Concentration})}{(\text{Original Concentration} + \text{Duplicate Concentration})/2} \times 100$$

FIGURES



GM-38 AREA



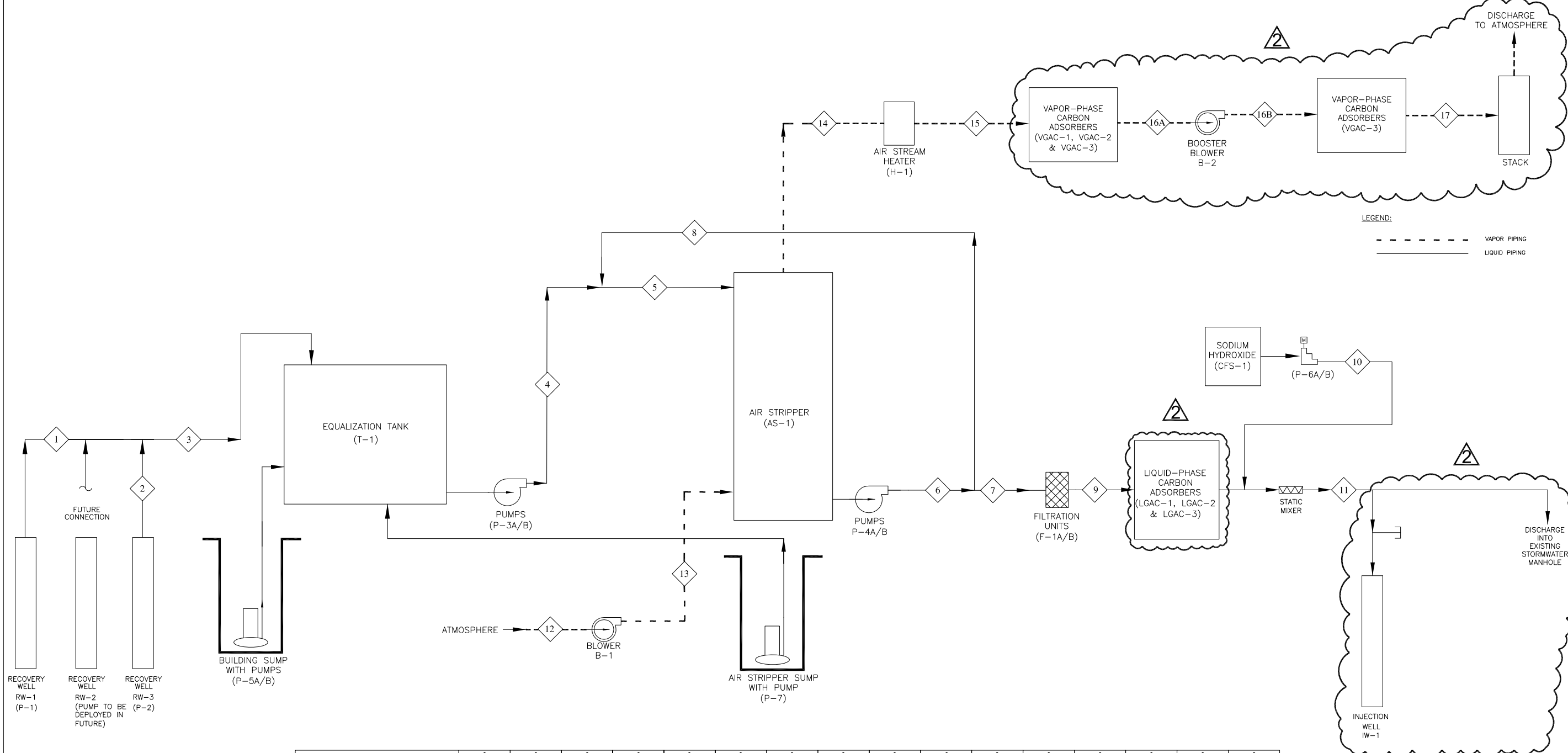
U.S. Navy RAC
 Engineering Field Activity, Northeast
 GM-38 Area (Offsite)
 NWIRP Bethpage
 Bethpage, NY

Figure 1
 Site Location Map

Source: U.S.G.S. Topographic Maps (7.5 Minute)
 Amityville, Freeport, Hicksville, Huntington, NY Quadrangles

P:\LantDiv\Bethpage\CAD - GIS\Dwg\O&M Manual\Site Location Map.dwg, 6/29/2009 3:33:52 PM

NOTES:
1. FOR SYMBOL AND ABBREVIATION LISTS SEE DRAWING P-2.



LEGEND:
- - - VAPOR PIPING
_____ LIQUID PIPING

RECOVERY WELL RW-1 (P-1)
RECOVERY WELL RW-2 (PUMP TO BE DEPLOYED IN FUTURE)
RECOVERY WELL RW-3 (P-2)

BUILDING SUMP WITH PUMPS (P-5A/B)

AIR STRIPPER SUMP WITH PUMP (P-7)

DISCHARGE INTO EXISTING STORMWATER MANHOLE
INJECTION WELL IW-1

STREAM NO.	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
COMPOSITION (UG/L, UNLESS OTHERWISE NOTED)																
BENZENE	4	4	4	4	3	-	-	-	-	-	-	-	-	-	-	-
TOLUENE	15	15	15	15	12	-	-	-	-	-	-	-	-	-	-	-
XYLENES, TOTAL	16	16	16	16	12	-	-	-	-	-	-	-	-	-	-	-
1,2-DICHLOROETHANE	3	3	3	3	2.8	-	-	-	-	-	-	2.7 E-07	-	-	-	-
cis 1,2-DICHLOROETHENE	1100	1100	1100	1100	1008	0.10	0.10	0.10	0.10	-	-	1.0 E-04	-	-	-	-
VINYL CHLORIDE	300	300	300	300	275	0.03	0.03	0.03	0.03	-	-	2.7 E-05	-	-	-	-
TETRACHLOROETHENE (PCE)	900	900	900	900	825	0.08	0.08	0.08	0.08	-	-	8.2 E-05	-	-	-	-
TRICHLOROETHENE (TCE)	3400	3400	3400	3400	3117	3.12	3.12	3.12	3.12	-	-	3.1 E-03	-	-	-	-
WATER FLOW RATE (GPM)	800	300	1100	1100	1200	1200	1100	100	1100	1.1 gpd	1100	-	-	-	-	-
TEMPERATURE (°F)	55	55	55	55	55	55	55	55	55	60	55	-	-	-	-	-
PRESSURE (PSIG)												-0.27	1.50	1.36	1.18	0.53
DENSITY (lb/ft³)										95.5		0.077	0.085	0.084	0.082	0.079
MASS FLOW RATE (lb/hr)	400364	150136	550500	550500	600545	600545	550500	50,045	550500	0.59	550500	36,960	40,800	40,320	39,360	37,920
RELATIVE HUMIDITY (%)												50	50	100	50	50
STATIC PRESSURE (PSIA)												0.214	0.214	0.214	0.275	0.275
pH (S.U.)	5.5	5.5	5.5	5.5	5.5	6.0	6.0	6.0	6.0	14	7.0					
VAPOR FLOW RATE (CFM)												8000	8000	8000	8000	8000
TOTAL VAPOR VOC (PPMV)												-	-	25.5	25.5	1.2
TOTAL VAPOR VOC (LBS/HR)												-	-	3.18	3.18	0.15

THIS DRAWING PRODUCED ON AUTOCAD DO NOT REVISE MANUALLY
THIS DOCUMENT IS THE PROPERTY OF NAVAL FACILITIES ENGINEERING COMMAND, PREPARED BY TETRA TECH EC, INC., AND IS PROVIDED UPON THE CONDITION THAT IT WILL NOT BE REPRODUCED, COPIED, OR ISSUED TO A THIRD PARTY, AND WILL BE USED SOLELY FOR THE ORIGINAL INTENDED PURPOSE AND SOLELY FOR THE EXECUTION OR REVIEW OF THE ENGINEERING CONSTRUCTION OF THE PROJECT.
IT IS A VIOLATION OF THE NEW YORK STATE EDUCATION LAW, ARTICLE 145, FOR ANY PERSON UNLESS UNDER THE DIRECTION OF A NEW YORK STATE LICENSED PROFESSIONAL ENGINEER, TO ALTER AN ITEM ON THIS DOCUMENT IN ANY WAY.

TETRA TECH ENGINEERING CORPORATION PC

REV	DESCRIPTION	DATE	APPROVED BY
0	FINAL DESIGN	05/05/06	BKB
1	ADD TO EXISTING WATER TREATMENT CONNECTION REVISED BASED ON VENDOR SUBMITTALS, DRAWING UPDATES FOR CONSTRUCTION.	03/31/08	BKB
2	REVISIONS FOR CONSTRUCTION.	02/24/09	BKB

DEPARTMENT OF THE NAVY
NAVAL WEAPONS INDUSTRIAL RESERVE PLANT
LESTER

ENGINEERING FIELD ACTIVITY - NORTHEAST
PENNSYLVANIA
BETHPAGE, NEW YORK

GM-38 AREA
GROUNDWATER TREATMENT PLANT
PROCESS FLOW DIAGRAM - GROUNDWATER AND OFF-GAS TREATMENT

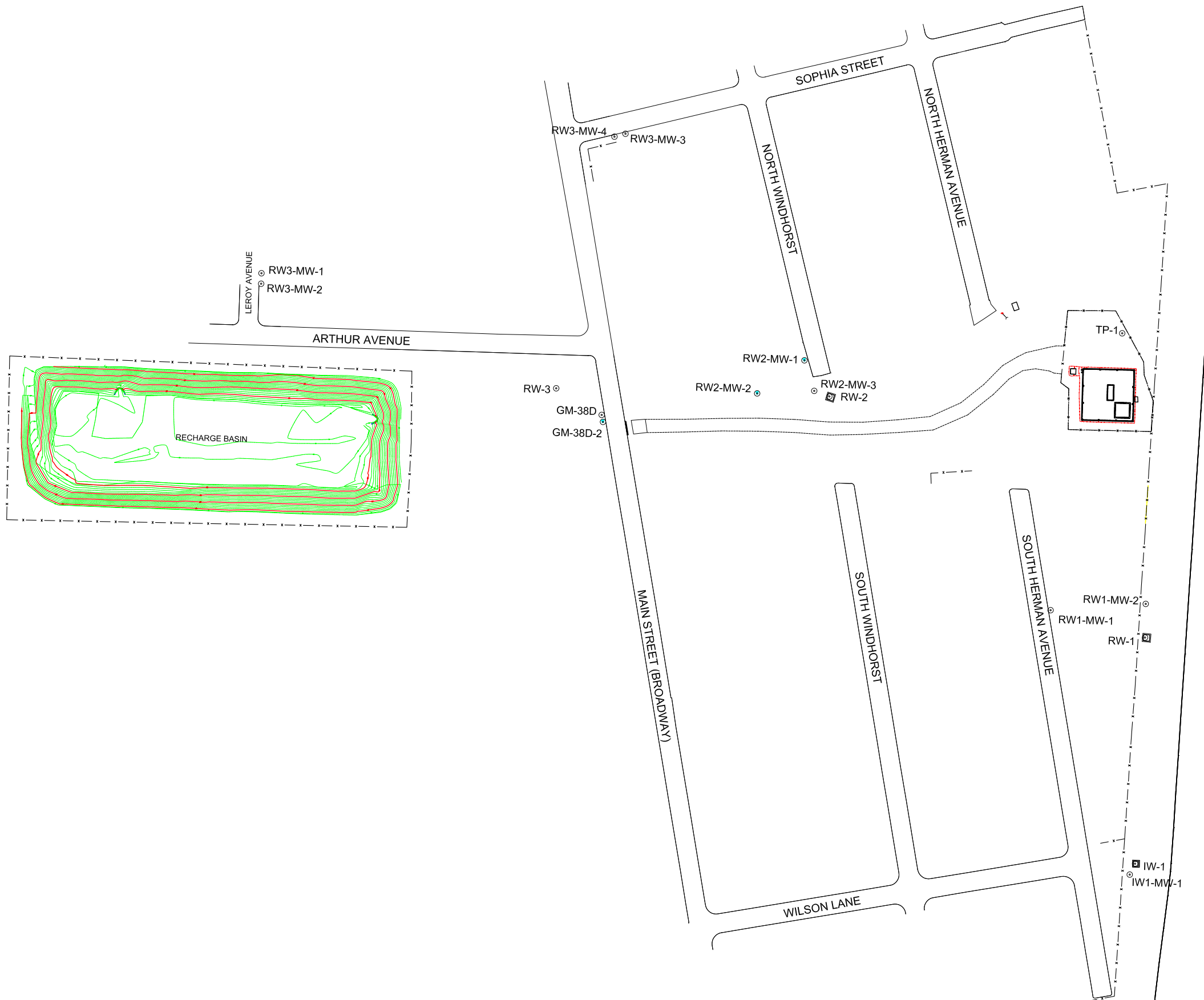
DATE: 05/05/06

SCALE: AS SHOWN

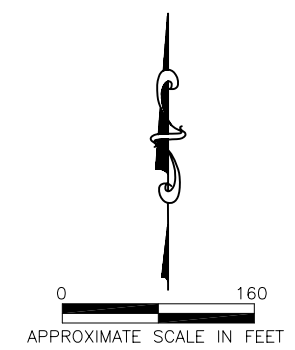
CONSTR. CONTR. NO. N62472-99-D-0032

NAVAFAC DRAWING NO. Figure 2

SHEET OF DIS. SH. NO. 1-4

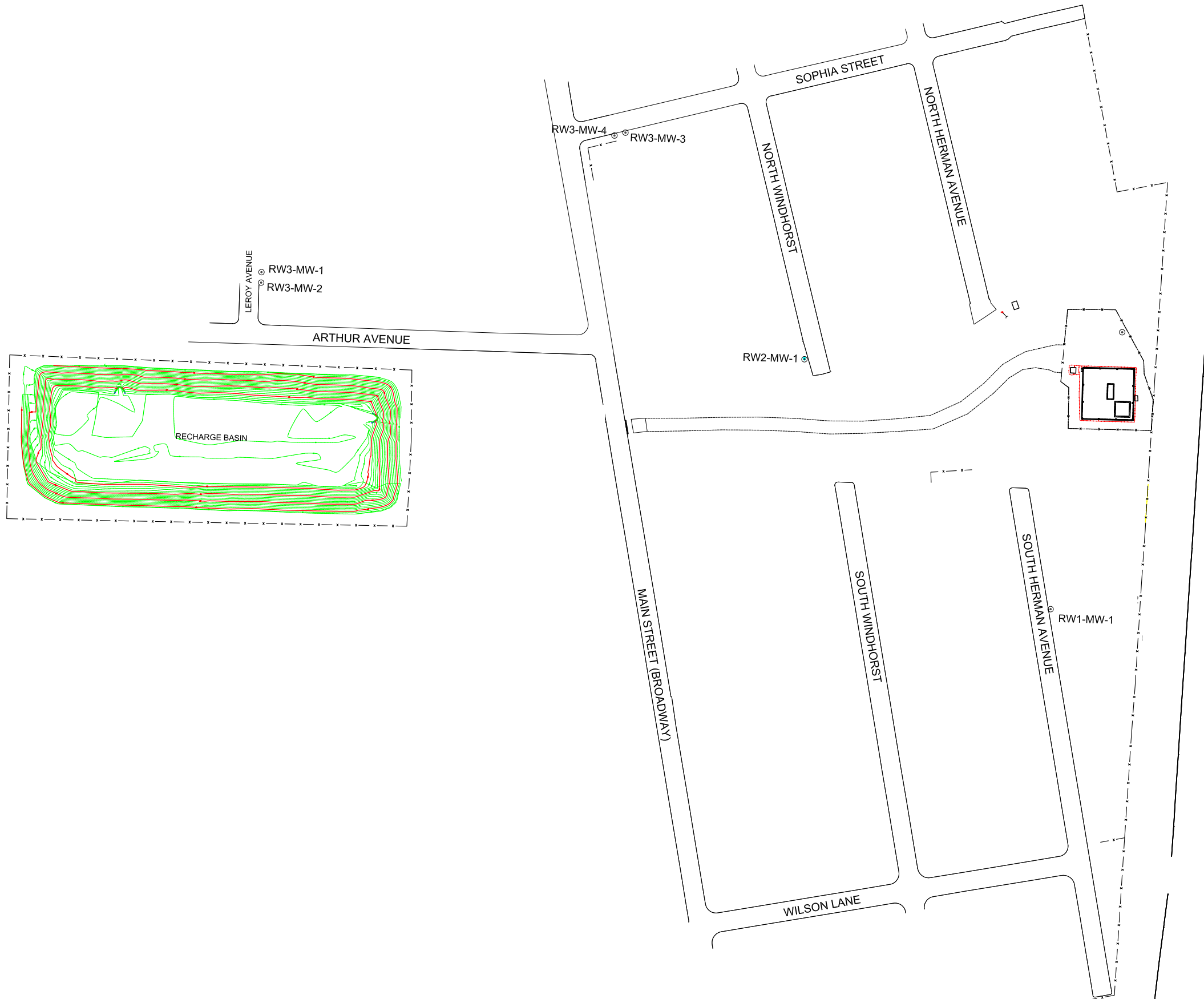


(SEAFORD-OYSTER BAY EXPRESSWAY - RTE 135)

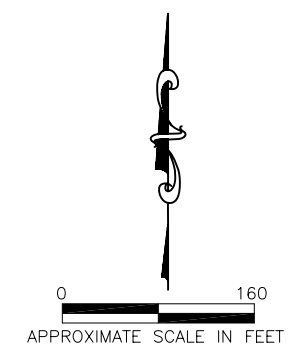


All Monitoring and Recovery Well Locations Part of the GM-38 Area Remedy		
NAVAL FACILITIES ENGINEERING COMMAND MID-ATLANTIC - NWIPR BETHPAGE, NEW YORK		
ECOR Solutions 21 South High Street, West Chester, PA 19380		
SCALE	DATE	FIGURE
SEE BARSCALE	11-22-2010	3



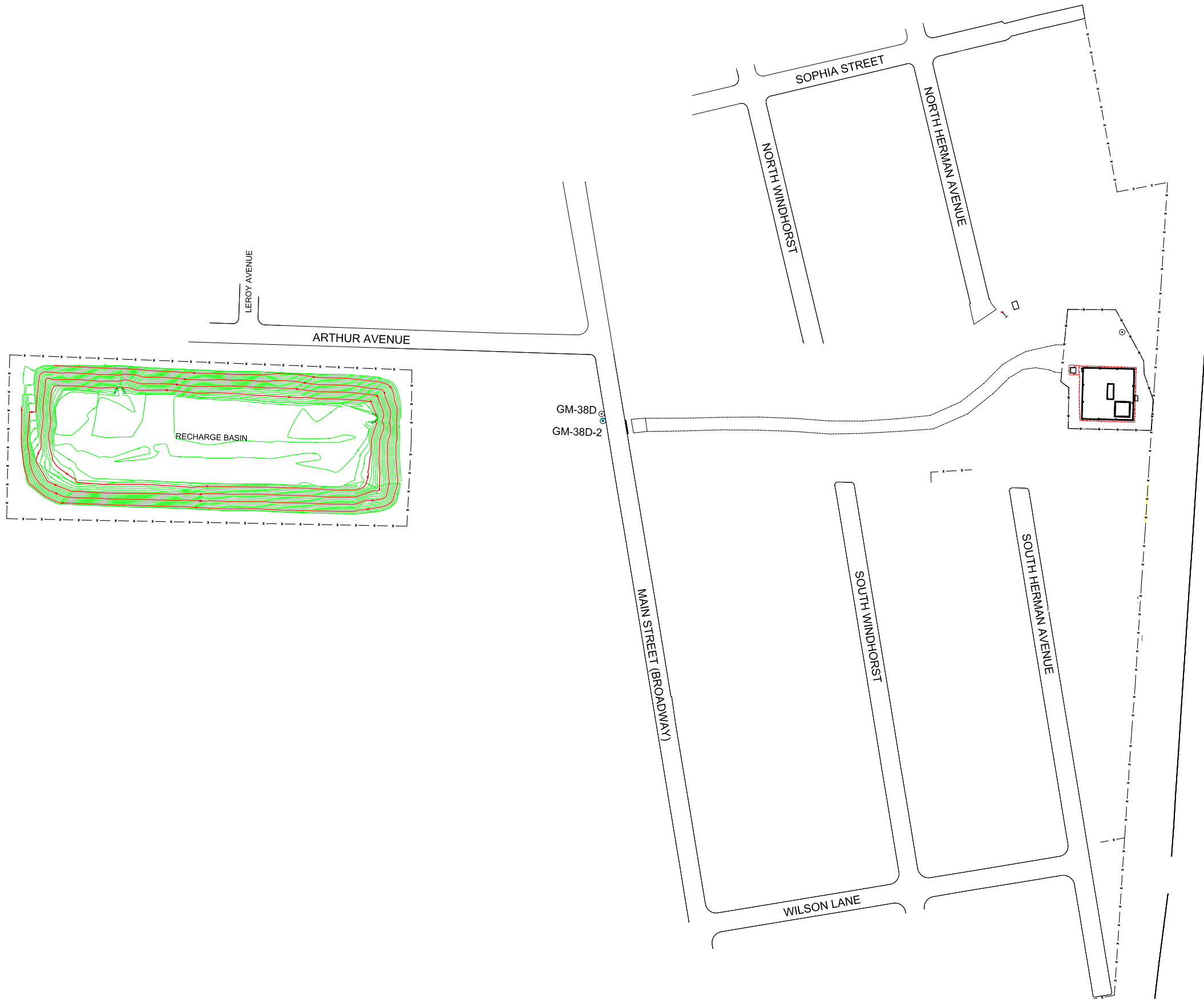


(SEAFORD-OYSTER BAY EXPRESSWAY - RTE 135)

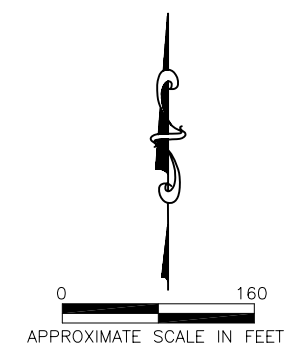


Monitoring Well Locations Sampled As Part Of Quarterly GM-38 OMM		
NAVAL FACILITIES ENGINEERING COMMAND MID-ATLANTIC - NWIPR BETHPAGE, NEW YORK		
ECOR Solutions 21 South High Street, West Chester, PA 19380		
SCALE SEE BARSCALE	DATE 11-22-2010	FIGURE 4





(SEAFORD-OYSTER BAY EXPRESSWAY - RTE 135)



Monitoring Well Locations Sampled By Northrop Grumman		
NAVAL FACILITIES ENGINEERING COMMAND MID-ATLANTIC - NWIPR BETHPAGE, NEW YORK		
ECOR Solutions 21 South High Street, West Chester, PA 19380		
SCALE SEE BARSCALE	DATE 11-22-2010	FIGURE 5



APPENDIX A
NYSDEC Effluent Limitations and Monitoring Requirements

November 18, 2010

ECOR Federal Services, LLC
21 S High St, 2nd Floor
West Chester, PA 19382
(484) 887-7510
(610) 431-2852 (fax)

Mr. Steven Scharf
New York State Department of Environmental Conservation
Division of Environmental Remediation
Remedial Action, Bureau A
625 Broadway
Albany, NY 12233-7015



**SUBJECT: GM-38 GROUNDWATER REMEDIATION AT NWIRP BETHPAGE, NY
MONTHLY REPORT ON GROUNDWATER AND AIR DISCHARGE
FOR DER SITE # 1-30-003B-OU 2**

Dear Mr. Scharf:

In accordance with groundwater treatment system operational requirements for DER Site # 1-30-003B-OU 2, ECOR Federal Services, LLC. (ECOR) on behalf of the United States Department of the Navy is submitting this monthly report of the groundwater and air discharge results for the GM-38 system. The enclosed data, presented as Attachment 1, is for treatment system operations from October 1 through October 31, 2010.

The SPDES discharge criteria and air permit equivalent permit are also included for your reference as Attachments 2 and 3, respectively. All constituents were within permit limitations.

Please do not hesitate contact me with any questions regarding this letter or report at office phone # 610-840-9200 or via email at lapp@ecor-solutions.com

Sincerely,
ECOR Federal Services, LLC.

A handwritten signature in black ink, appearing to read "Matthew Lapp", with a stylized flourish at the end.

Matthew Lapp
Project Engineer

Attachments:

- Attachment 1 – Groundwater and Air Sampling Results from October 1 - 31, 2010
- Attachment 2 - NYSDEC memorandum dated June 6, 2008 with Effluent Limitations and Monitoring Requirements
- Attachment 3 – NYSDEC letter dated July 24, 2009 for Air Permit Equivalent Approval

cc: Jean Occidental, NYSDEC Division of Water
William Spitz, NYSDEC – Region 1 Water Engineer
Gerard Ennis, Nassau County Department of Public Works
Richard Pfaender, Town of Oyster Bay
Lora Fly, Navy Mid-Atlantic RPM
Al Taormina, ECOR Solutions, Inc.
GM-38 Project Site File

**GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Discharge Monitoring Report
October 2010**

SPDES Parameters	Daily Maximum	Units	October 2010			
			RW-1	RW-3	Influent	Effluent
Process Stream						
Sampling Date			10/28/10			
Average Flowrate		GPM	779	249	1028	1074
Total Flow		gallons	NR	NR	45,909,051	47,944,954
pH (range)	5.5 - 8.5	SU	NR	NR	5.7	7.7
1,1-Dichloroethane	5	µg/l	2.8	1.7	2.5	ND
1,2-Dichloroethane	0.6	µg/l	ND	ND	ND	ND
1,1-Dichloroethene	5	µg/l	6.3	1.4	5.1	ND
Carbon Tetrachloride	N/A	µg/l	0.63	ND	0	ND
cis 1,2-Dichloroethene	5	µg/l	68.3	2.3	52.3	2.5
trans 1,2-Dichloroethene	5	µg/l	1.4	ND	1.1	ND
Tetrachloroethene	5	µg/l	134	ND	102	ND
1,1,1-Trichloroethene	5	µg/l	8.3	0.72	6	ND
Trichloroethene	5	µg/l	423	321	398	0.49
Vinyl Chloride	2	µg/l	7.1	ND	5.4	ND
Mercury	0.25	µg/l	< 0.20	<0.20	<0.20	<0.20

Notes:

J, B - Estimated result less than reporting limit

ND - Not Detected

NR - Not Recorded

N/A - Not Applicable

**GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Air Sampling Results
October 2010**

DAR Parameters	SGC	Units	October 2010	
			Influent	Effluent
Process Stream				
Sampling Date			10/20/10	
Average Flowrate		CFM		9401
Total Flow		ft ³	NR	419,649,480
Total Flow		m ³	NR	11,876,080
Trichloroethene	14000	µg/m ³	21000	ND
Tetrachloroethene	1000	µg/m ³	11000	ND
Vinyl Chloride	180000	µg/m ³	63	44
trans 1,2-Dichloroethene	-	µg/m ³	ND	5.6
cis 1,2-Dichloroethene	-	µg/m ³	620	640
1,2-Dichloroethane	-	µg/m ³	620	646
Toluene	37000	µg/m ³	ND	ND
Xylene	4300	µg/m ³	ND	ND
1,1,2-Trichloroethane	-	µg/m ³	ND	ND

Notes:

ND - Not detected

NR - Not recorded

SGC - Short-term Guideline Concentration

**GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Controlled Stack Emissions
October 2010**

DAR Parameters	Discharge Limit	Units	October 2010
Sampling Date			10/20/10
Average Flowrate		CFM	9401
Total Flow		ft ³	419,649,480
Total Flow		m ³	11,876,080
Trichloroethene	0.09	lb/hr	0.00
Tetrachloroethene	0.02	lb/hr	0.00
Vinyl Chloride	0.01	lb/hr	0.001547
1,2 Dichloroethene	0.03	lb/hr	0.022699
1,2-Dichloroethane	BRT	lb/hr	0.00
Toluene	BRT	lb/hr	0.00
Xylene	BRT	lb/hr	0.00
1,1,2-Trichloroethane	BRT	lb/hr	0.00

Notes:

BRT - Below reporting thresholds

December 17, 2010

ECOR Federal Services, LLC
21 S High St, 2nd Floor
West Chester, PA 19382
(484) 887-7510
(610) 431-2852 (fax)

Mr. Steven Scharf
New York State Department of Environmental Conservation
Division of Environmental Remediation
Remedial Action, Bureau A
625 Broadway
Albany, NY 12233-7015



**SUBJECT: GM-38 GROUNDWATER REMEDIATION AT NWIRP BETHPAGE, NY
MONTHLY REPORT ON GROUNDWATER AND AIR DISCHARGE
FOR DER SITE # 1-30-003B-OU 2**

Dear Mr. Scharf:

In accordance with groundwater treatment system operational requirements for DER Site # 1-30-003B-OU 2, ECOR Federal Services, LLC. (ECOR) on behalf of the United States Department of the Navy is submitting this monthly report of the groundwater and air discharge results for the GM-38 system. The enclosed data, presented as Attachment 1, is for treatment system operations from November 1 through November 30, 2010.

The SPDES discharge criteria and air permit equivalent permit are also included for your reference as Attachments 2 and 3, respectively. All constituents were within permit limitations.

Please do not hesitate contact me with any questions regarding this letter or report at office phone # 610-840-9200 or via email at lapp@ecor-solutions.com

Sincerely,
ECOR Federal Services, LLC.

A handwritten signature in black ink, appearing to read "Matthew Lapp", with a stylized flourish at the end.

Matthew Lapp
Project Engineer

Attachments:

- Attachment 1 – Groundwater and Air Sampling Results from November 1 - 30, 2010
- Attachment 2 - NYSDEC memorandum dated June 6, 2008 with Effluent Limitations and Monitoring Requirements
- Attachment 3 – NYSDEC letter dated July 24, 2009 for Air Permit Equivalent Approval

cc: Jean Occidental, NYSDEC Division of Water
William Spitz, NYSDEC – Region 1 Water Engineer
Gerard Ennis, Nassau County Department of Public Works
Richard Pfaender, Town of Oyster Bay
Lora Fly, Navy Mid-Atlantic RPM
Al Taormina, ECOR Solutions, Inc.
GM-38 Project Site File

**GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Discharge Monitoring Report
November 2010**

SPDES Parameters	Daily Maximum	Units	November 2010			
			RW-1	RW-3	Influent	Effluent
Process Stream			RW-1	RW-3	Influent	Effluent
Well Depth		ft	500	500	N/A	N/A
Screened Interval		ft	470-500	470-500	N/A	N/A
Sampling Date			11/23/10			
Average Flowrate		GPM	775	251	1026	1066
Total Flow		gallons	NR	NR	44,323,200	46,051,200
pH (range)	5.5 - 8.5	SU	NR	NR	5.9	7.6
1,1-Dichloroethane	5	µg/l	3.1	2.0	2.8	ND
1,2-Dichloroethane	0.6	µg/l	0.54	ND	ND	ND
1,1-Dichloroethene	5	µg/l	6.7	1.9	5.5	ND
Carbon Tetrachloride	N/A	µg/l	0.65	0.18	0.54	ND
cis 1,2-Dichloroethene	5	µg/l	68.2	2.2	52.1	ND
trans 1,2-Dichloroethene	5	µg/l	1.2	ND	0.9	ND
Tetrachloroethene	5	µg/l	112	ND	85	ND
1,1,1-Trichloroethene	5	µg/l	7.8	1.1	6.2	ND
Trichloroethene	5	µg/l	430	328	405	ND
Vinyl Chloride	2	µg/l	8.0	ND	6.0	ND
Mercury	0.25	µg/l	< 0.20	<0.20	<0.20	<0.20

Notes:

J, B - Estimated result less than reporting limit
 ND - Not Detected
 NR - Not Recorded
 N/A - Not Applicable

**GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Air Sampling Results
November 2010**

DAR Parameters	SGC	Units	November 2010	
			Influent	Effluent
Process Stream				
Sampling Date			11/23/10	
Average Flowrate		CFM		9240
Total Flow		ft ³	NR	399,168,000
Total Flow		m ³	NR	11,296,454
Trichloroethene	14000	µg/m ³	7300	29
Tetrachloroethene	1000	µg/m ³	4600	6.5
Vinyl Chloride	180000	µg/m ³	74	ND
trans 1,2-Dichloroethene	-	µg/m ³	ND	ND
cis 1,2-Dichloroethene	-	µg/m ³	550	9.2
1,2-Dichloroethene (total)	-	µg/m ³	550	9.2
1,2-Dichloroethane	-	µg/m ³	ND	ND
Toluene	37000	µg/m ³	ND	ND
Xylene	4300	µg/m ³	ND	ND
1,1,2-Trichloroethane	-	µg/m ³	ND	ND

Notes:

ND - Not detected

NR - Not recorded

SGC - Short-term Guideline Concentration

**GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Controlled Stack Emissions
November 2010**

DAR Parameters	Discharge Limit	Units	November 2010
Sampling Date			11/23/10
Average Flowrate		CFM	9240
Total Flow		ft ³	399,168,000
Total Flow		m ³	11,296,454
Trichloroethene	0.09	lb/hr	0.0010
Tetrachloroethene	0.02	lb/hr	0.0002
Vinyl Chloride	0.01	lb/hr	0.00
1,2 Dichloroethene	0.03	lb/hr	0.000318
1,2-Dichloroethane	BRT	lb/hr	0.00
Toluene	BRT	lb/hr	0.00
Xylene	BRT	lb/hr	0.00
1,1,2-Trichloroethane	BRT	lb/hr	0.00

Notes:

BRT - Below reporting thresholds

January 18, 2011

Mr. Steven Scharf
New York State Department of Environmental Conservation
Division of Environmental Remediation
Remedial Action, Bureau A
625 Broadway
Albany, NY 12233-7015

ECOR Federal Services, LLC
21 S High St, 2nd Floor
West Chester, PA 19382
(484) 887-7510
(610) 431-2852 (fax)



**SUBJECT: GM-38 GROUNDWATER REMEDIATION AT NWIRP BETHPAGE, NY
MONTHLY REPORT ON GROUNDWATER AND AIR DISCHARGE
FOR DER SITE # 1-30-003B-OU 2**

Dear Mr. Scharf:

In accordance with groundwater treatment system operational requirements for DER Site # 1-30-003B-OU 2, ECOR Federal Services, LLC. (ECOR) on behalf of the United States Department of the Navy is submitting this monthly report of the groundwater and air discharge results for the GM-38 system. The enclosed data, presented as Attachment 1, is for treatment system operations from December 1 through December 31, 2010.

The SPDES discharge criteria and air permit equivalent permit are also included for your reference as Attachments 2 and 3, respectively. All constituents were within permit limitations.

Please do not hesitate contact me with any questions regarding this letter or report at office phone # 610-840-9200 or via email at lapp@ecor-solutions.com

Sincerely,
ECOR Federal Services, LLC.

A handwritten signature in black ink, appearing to read "Matthew Lapp", written over a light blue horizontal line.

Matthew Lapp
Project Engineer

Attachments: Groundwater and Air Sampling Results from December 1 - 31, 2010

cc: Jean Occidental, NYSDEC Division of Water
William Spitz, NYSDEC – Region 1 Water Engineer
Gerard Ennis, Nassau County Department of Public Works
Richard Pfaender, Town of Oyster Bay
Lora Fly, Navy Mid-Atlantic RPM
Al Taormina, ECOR Solutions, Inc.
GM-38 Project Site File

**GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Discharge Monitoring Report
December 2010**

SPDES Parameters	Daily Maximum	Units	December 2010			
			RW-1	RW-3	Influent	Effluent
Process Stream						
Well Depth		ft	500	500	N/A	N/A
Screened Interval		ft	470-500	470-500	N/A	N/A
Sampling Date			12/29/10			
Average Flowrate		GPM	816	262	1078	1151
Total Flow		gallons	NR	NR	48,102,080	51,375,680
pH (range)	5.5 - 8.5	SU	NR	NR	5.9	7.1
1,1-Dichloroethane	5	µg/l	3.0	1.7	2.7	ND
1,2-Dichloroethane	0.6	µg/l	ND	ND	ND	ND
1,1-Dichloroethene	5	µg/l	7.3	1.5	5.9	ND
Carbon Tetrachloride	N/A	µg/l	0.8 J	0.19 J	0.65 J	ND
cis 1,2-Dichloroethene	5	µg/l	61.5	2.1	47.1	ND
trans 1,2-Dichloroethene	5	µg/l	0.93 J	ND	0.7	ND
Tetrachloroethene	5	µg/l	112	ND	85	ND
1,1,1-Trichloroethene	5	µg/l	8.9	1.3	7.1	ND
Trichloroethene	5	µg/l	415	314	390	0.58 J
Vinyl Chloride	2	µg/l	7.2	ND	5.5	ND
Mercury	0.25	µg/l	< 0.20	< 0.20	< 0.20	< 0.20

Notes:

J, B - Estimated result less than reporting limit

ND - Not Detected

NR - Not Recorded

N/A - Not Applicable

**GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Air Sampling Results
December 2010**

DAR Parameters	SGC	Units	December 2010	
			Influent	Effluent
Process Stream				
Sampling Date			12/15/10	
Average Flowrate		CFM		9415
Total Flow		ft ³	NR	420,300,480
Total Flow		m ³	NR	11,894,504
Trichloroethene	14000	µg/m ³	11000	12
Tetrachloroethene	1000	µg/m ³	14000	6.4
Vinyl Chloride	180000	µg/m ³	58	ND
trans 1,2-Dichloroethene	-	µg/m ³	ND	ND
cis 1,2-Dichloroethene	-	µg/m ³	790	11
1,2-Dichloroethene (total)	-	µg/m ³	790	11
1,2-Dichloroethane	-	µg/m ³	ND	ND
Toluene	37000	µg/m ³	ND	ND
Xylene	4300	µg/m ³	ND	ND
1,1,2-Trichloroethane	-	µg/m ³	ND	ND

Notes:

ND - Not detected

NR - Not recorded

SGC - Short-term Guideline Concentration

**GM-38 Area Groundwater Remediation
Groundwater Treatment Plant
Naval Weapons Industrial Reserve Plant - Bethpage, NY
Controlled Stack Emissions
December 2010**

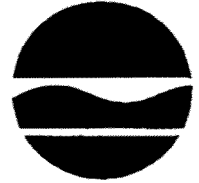
DAR Parameters	Discharge Limit	Units	December 2010
Sampling Date			12/15/10
Average Flowrate		CFM	9415
Total Flow		ft ³	420,300,480
Total Flow		m ³	11,894,504
Trichloroethene	0.09	lb/hr	0.0004
Tetrachloroethene	0.02	lb/hr	0.0002
Vinyl Chloride	0.01	lb/hr	0.00
1,2 Dichloroethene	0.03	lb/hr	0.0004
1,2-Dichloroethane	BRT	lb/hr	0.00
Toluene	BRT	lb/hr	0.00
Xylene	BRT	lb/hr	0.00
1,1,2-Trichloroethane	BRT	lb/hr	0.00

Notes:

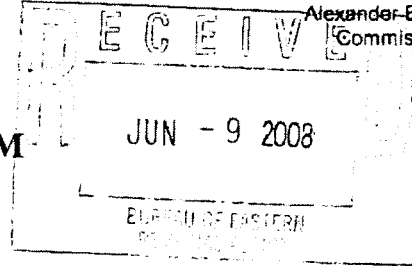
BRT - Below reporting thresholds

**New York State Department of Environmental Conservation
Division of Water**

Bureau of Water Permits, 4th Floor
625 Broadway, Albany, New York 12233-3505
Phone: (518) 402-8111 • FAX: (518) 402-9029
Website: www.dec.state.ny.us



Alexander-B. Grannis
Commissioner



MEMORANDUM

TO: Steven Scharf, DER
FROM: Jean Occidental, DOW, Bureau of Water Permits JO
SUBJECT: Naval Weapons Industrial Reserve Plant (NWIRP); DER Site # 1-01-001
DRAINAGE BASIN: na
DATE: June 6, 2008

In response to your request and the permittee's SPDES Permit Equivalent Application dated April 27, 2008, attached is the effluent criteria for the above noted groundwater remediation discharge.

The Division of Water does not have any regulatory authority over a discharge from a State, PRP, or Federal Superfund Site. The Division of Environmental Remediation will be responsible for ensuring compliance with the attached effluent criteria and approval of all engineering submissions. Additional Condition (1) identifies the contact to send all effluent results, engineering submissions, and modification requests. The Regional Water Engineer should be kept appraised of the status of these discharges and, in accordance with the attached criteria, receive a copy of the effluent results for informational purposes.

If you have any questions, please call me at (518) 402-8116.

Attachment

cc: (w/att) RWE, Region 1
C. Webber
BWP Permit Coordinator

Naval Weapons Industrial Reserve Plant

DER site # 1-01-001

Page 1 of 2

EFFLUENT LIMITATIONS AND MONITORING REQUIREMENTS

During the period beginning: April 1, 2009and lasting until: April 1, 2014

the discharges from the treatment facility to Groundwater shall be limited and monitored by the operator as specified below:

Outfall and Parameters	Limitations		Units	Minimum Monitoring Requirements	
	Daily Avg.	Daily Max.		Measurement Frequency	Sample Type
Treated Groundwater Remediation Discharge from: Recovery Wells 1, 2, and 3					
Flow	Monitor	1100	GPM	Continuous	Recorder
pH (range)	5.5 - 8.5		SU	Weekly	Grab
1,1-Dichloroethane	NA	5	µg/l	Monthly ¹	Grab
1,2-Dichloroethane	NA	0.6	µg/l	Monthly ¹	Grab
1,1-Dichloroethene	NA	5	µg/l	Monthly ¹	Grab
cis-1,2-Dichloroethene	NA	5	µg/l	Monthly ¹	Grab
trans-1,2-Dichloroethene	NA	5	µg/l	Monthly ¹	Grab
Tetrachloroethene	NA	5	µg/l	Monthly ¹	Grab
1,1,1-Trichloroethane	NA	5	µg/l	Monthly ¹	Grab
Trichloroethene	NA	5	µg/l	Monthly ¹	Grab
Vinyl chloride	NA	2	µg/l	Monthly ¹	Grab
Mercury	NA	0.25	µg/l	Monthly ¹	Grab

Footnotes:

- (1) The minimum measurement frequency shall be monthly following a period of 24 consecutive weekly sampling events showing no exceedances of the stated discharge limitations.

Naval Weapons Industrial Reserve Plant

DER site # 1-01-001

Page 1 of 2

Additional Conditions:

- (1) Discharge is not authorized until such time as an engineering submission showing the method of treatment is approved by the Department. The discharge rate may not exceed the effective or design treatment system capacity. All monitoring data, engineering submissions and modification requests must be submitted to:

Steven Scharf
Division of Environmental Remediation
NYSDEC, 625 Broadway
Albany, NY 12233-7015
Phone: (518) 402-9620

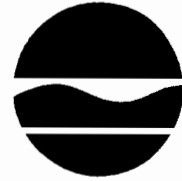
With a copy sent to:

Regional Water Engineer
NYSDEC - Region 1
Building 40, SUNY Campus
Stony Brook, New York 11790-2356
Phone: (631) 444-0354

- (2) Only site generated wastewater is authorized for treatment and discharge.
- (3) Authorization to discharge is valid only for the period noted above but may be renewed if appropriate. A request for renewal must be received 6 months prior to the expiration date to allow for a review of monitoring data and reassessment of monitoring requirements.
- (4) Any use of corrosion/scale inhibitors, biocidal-type compounds, or other water treatment chemicals used in the treatment process must be approved by the department prior to use.
- (5) This discharge and administration of this discharge must comply with the substantive requirements of 6NYCRR Part 750.

APPENDIX B
NYSDEC Air Permit Equivalent Approval

New York State Department of Environmental Conservation
Division of Environmental Remediation
Bureau of Remedial Action A
625 Broadway, 11th Floor
Albany, New York 12233-7015
Phone: (518) 402-9625 • Fax: (518) 402-9022
Website: www.dec.state.ny.us



Alexander P.
Grannis
Commissioner

July 24, 2009

Lora Fly, Project Manager
Naval Facilities Engineering Command-Midlant
9742 Maryland Avenue
Norfolk, VA 23511-3095

RE: Naval Weapons Industrial Research Plant(NWIRP)
Site-Bethpage, NYSDEC No. 1-30-003B.
Grumman Aerospace Site, NYSDEC Site No. 1-30-003A

Dear Ms. Fly:

Tetra Tech FW, on behalf of the Department of the Navy (Navy), has submitted the enclosed New York State Department of Environmental Conservation (NYSDEC) Division of Air Resources (DAR) Air Permit Application as a permit equivalent. This DAR Air permit equivalent is for the air stripper discharge at the GM 38 Area groundwater remediation system, Near Broadway and North Herman Avenue in Bethpage, NY. The NYSDEC Division of Environmental Remediation (DER) has reviewed the permit equivalent and, by means of this letter approves the GM 38 Area remedy air discharge for immediate operation.

The GM 38 Area remedial system utilizes the best available control technology (BACT) with activated carbon followed by potassium permanganate impregnated zeolite resin. The air discharge will be periodically monitored at start up and will be added for routine monitoring in the operation, maintenance and monitoring (OMM) plan, to be submitted shortly for Departmental review.

If you have any questions, please contact me at your earliest convenience at (518)402-9620.

Sincerely,

Steven M. Scharf, P.E.
Project Engineer
Division of Environmental Remediation
Bureau of Remedial Action A

Enclosure
ec/w/enc:

J. Swartwout/S. Scharf/File
W. Parish, Region 1 NYSDEC
A. J. Shah, region 1 NYSDEC
S. Patselos, Tetra Tech FW
J. Cofman, Northrop Grumman]

docs: Region 1, Nassau, Oyster Bay (T): Grumman Aerospace 130003A-OU2-OMM and NWIRP Bethpage 130003B-OU2-OMM

New York State Department of Environmental Conservation Air Permit Application



DEC ID									
-									

APPLICATION ID									
-							/		

OFFICE USE ONLY									

Section I - Certification

Title V Certification	
I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons directly responsible for gathering the information [required pursuant to 6 NYCRR 201-6.3(d)] I believe the information is, true, accurate and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fines and imprisonment for knowing violations.	
Responsible Official	Title
Signature	Date ____ / ____ / ____

State Facility Certification	
I certify that this facility will be operated in conformance with all provisions of existing regulations.	
Responsible Official	Title
Signature	Date ____ / ____ / ____

Section II - Identification Information

Title V Facility Permit <u>N/A</u>	<input type="checkbox"/> New	<input type="checkbox"/> Significant Modification	<input type="checkbox"/> Administrative Amendment	State Facility Permit <u>N/A</u>	<input type="checkbox"/> New	<input type="checkbox"/> Modification
<input type="checkbox"/> Renewal	<input type="checkbox"/> Minor Modification	General Permit Title: _____		General Permit Title: _____		
<input checked="" type="checkbox"/> Application involves construction of new facility			<input type="checkbox"/> Application involves construction of new emission unit(s)			

Owner/Firm			
Name <u>US Navy/NAVFAC Midlant</u>			
Street Address <u>9742 Maryland Ave, Bldg Z-144</u>			
City <u>Norfolk</u>	State <u>VA</u>	Country <u>US</u>	Zip <u>23511-3095</u>
Owner Classification <input checked="" type="checkbox"/> Federal		<input type="checkbox"/> State	<input type="checkbox"/> Municipal
<input type="checkbox"/> Corporation/Partnership		<input type="checkbox"/> Individual	Taxpayer ID
Facility <input type="checkbox"/> Confidential			
Name <u>Naval Weapons Industrial Reserve Plant (NWIRP) GM-38 Area</u>			
Location Address <u>Bethpage</u>			
<input type="checkbox"/> City / <input checked="" type="checkbox"/> Town / <input type="checkbox"/> Village <u>Oyster Bay, New York</u>			Zip <u>11714</u>
Project Description <input type="checkbox"/> Continuation Sheet(s)			
<u>Air stripping of groundwater to remove VOCs</u>			

Owner/Firm Contact Mailing Address			
Name (Last, First, Middle Initial) <u>Fly, Lora</u>		Phone No. (757)444-0781	
Affiliation <u>Department of the Navy</u>		Title <u>Remedial PM</u>	Fax No. ()
Street Address <u>9742 Maryland Ave. Bldg Z-144</u>			
City <u>Norfolk</u>	State <u>VA</u>	Country <u>US</u>	Zip <u>23511-3095</u>
Facility Contact Mailing Address			
Name (Last, First, Middle Initial) <u>Same</u>		Phone No. ()	
Affiliation		Title	Fax No. ()
Street Address			
City	State	Country	Zip

New York State Department of Environmental Conservation
Air Permit Application



DEC ID									
-									

Section III - Facility Information

Classification					
<input type="checkbox"/> Hospital	<input type="checkbox"/> Residential	<input type="checkbox"/> Educational/Institutional	<input type="checkbox"/> Commercial	<input checked="" type="checkbox"/> Industrial	<input type="checkbox"/> Utility

Affected States (Title V Only) N/A					
<input type="checkbox"/> Vermont	<input type="checkbox"/> Massachusetts	<input type="checkbox"/> Rhode Island	<input type="checkbox"/> Pennsylvania	Tribal Land: _____	
<input type="checkbox"/> New Hampshire	<input type="checkbox"/> Connecticut	<input type="checkbox"/> New Jersey	<input type="checkbox"/> Ohio	Tribal Land: _____	

SIC Codes									
9999									

Facility Description		<input type="checkbox"/> Continuation Sheet(s)
Groundwater Remediation by Air Stripping followed by Vapor-Phase GAC for emission control		

Compliance Statements (Title V Only) N/A	
<p>I certify that as of the date of this application the facility is in compliance with all applicable requirements: <input type="checkbox"/> YES <input type="checkbox"/> NO</p> <p>If one or more emission units at the facility are not in compliance with all applicable requirements at the time of signing this application (the 'NO' box must be checked), the noncomplying units must be identified in the "Compliance Plan" block on page 8 of this form along with the compliance plan information required. For all emission units at this facility that are operating <u>in compliance</u> with all applicable requirements complete the following:</p> <ul style="list-style-type: none"> <input type="checkbox"/> This facility will continue to be operated and maintained in such a manner as to assure compliance for the duration of the permit, except those units referenced in the compliance plan portion of Section IV of this application. <input type="checkbox"/> For all emission units, subject to any applicable requirements that will become effective during the term of the permit, this facility will meet all such requirements on a timely basis. <input type="checkbox"/> Compliance certification reports will be submitted at least once a year. Each report will certify compliance status with respect to each requirement, and the method used to determine the status. 	

Facility Applicable Federal Requirements N/A										<input type="checkbox"/> Continuation Sheet(s)
Title	Type	Part	Sub Part	Section	Sub Division	Paragraph	Sub Paragraph	Clause	Sub Clause	
	CERCLA	all substantive requirements								

Facility State Only Requirements										<input type="checkbox"/> Continuation Sheet(s)
Title	Type	Part	Sub Part	Section	Sub Division	Paragraph	Sub Paragraph	Clause	Sub Clause	

New York State Department of Environmental Conservation
Air Permit Application



DEC ID									
-									

Section III - Facility Information (continued)

Facility Compliance Certification		N/A		<input type="checkbox"/> Continuation Sheet(s)					
Rule Citation									
Title	Type	Part	Sub Part	Section	Sub Division	Paragraph	Sub Paragraph	Clause	Sub Clause
<input type="checkbox"/> Applicable Federal Requirement	<input type="checkbox"/> State Only Requirement	<input type="checkbox"/> Capping	CAS No.			Contaminant Name			
Monitoring Information									
<input type="checkbox"/> Ambient Air Monitoring <input type="checkbox"/> Work Practice Involving Specific Operations <input type="checkbox"/> Record Keeping/Maintenance Procedures									
Description									
Work Practice		Process Material				Reference Test Method			
Type	Code	Description							
Code		Parameter				Manufacturer Name/Model No.			
		Description							
Limit				Limit Units					
Upper		Lower		Code		Description			
Averaging Method			Monitoring Frequency			Reporting Requirements			
Code		Description	Code	Description		Code		Description	

Facility Emissions Summary				<input type="checkbox"/> Continuation Sheet(s)	
CAS No.	Contaminant Name	PTE		Actual (lbs/yr)	
		(lbs/yr)	Range Code		
NY075 - 00 - 5	PM-10				
NY075 - 00 - 0	PARTICULATES				
7446 - 09 - 5	SULFUR DIOXIDE				
NY210 - 00 - 0	OXIDES OF NITROGEN				
630 - 08 - 0	CARBON MONOXIDE				
7439 - 92 - 1	LEAD				
NY998 - 00 - 0	VOC	117			
NY100 - 00 - 0	HAP	110			
0079 - 01 - 6	Trichloroethylene	99			
00075 - 01 - 4	Vinyl Chloride	3.7			
00540 - 59 - 0	1,2-Dichloroethylene	7.3			
- - -					
- - -					

New York State Department of Environmental Conservation
Air Permit Application



DEC ID									
-									

Section IV - Emission Unit Information

Emission Unit Description										<input type="checkbox"/> Continuation Sheet(s)
EMISSION UNIT	0	-	0	0	E	U	1			
Air Stripper AS-1 for groundwater remediation, provided with activated carbon for emission control.										
The emission point is stack 00ST-1. The 2-stage VGAC is followed by a 3rd vessel containing a potassium permanganate zeolite media for increased VC capacity.										

Building					<input type="checkbox"/> Continuation Sheet(s)	
Building	Building Name			Length (ft)	Width (ft)	Orientation
BLDG-1	Treatment Plant			75	75	0

Emission Point							<input type="checkbox"/> Continuation Sheet(s)
EMISSION PT.	00ST1						
Ground Elev. (ft)	Height (ft)	Height Above Structure (ft)	Inside Diameter (in)	Exit Temp. (°F)	Cross Section		
90	40	15	36	80	Length (in)	Width (in)	
Exit Velocity (FPS)	Exit Flow (ACFM)	NYTM (E) (KM)	NYTM (N) (KM)	Building	Distance to Property Line (ft)	Date of Removal	
19	8020			BLDG-1	50		
EMISSION PT.							
Ground Elev. (ft)	Height (ft)	Height Above Structure (ft)	Inside Diameter (in)	Exit Temp. (°F)	Cross Section		
					Length (in)	Width (in)	
Exit Velocity (FPS)	Exit Flow (ACFM)	NYTM (E) (KM)	NYTM (N) (KM)	Building	Distance to Property Line (ft)	Date of Removal	

Emission Source/Control								<input type="checkbox"/> Continuation Sheet(s)
Emission Source		Date of Construction	Date of Operation	Date of Removal	Control Type		Manufacturer's Name/Model No.	
ID	Type				Code	Description		
AS-1	I				048	Granular Act. Carbon	Air Stripping Column	
Design Capacity	Design Capacity Units			Waste Feed		Waste Type		
	Code	Description		Code	Description	Code	Description	
Emission Source		Date of Construction	Date of Operation	Date of Removal	Control Type		Manufacturer's Name/Model No.	
ID	Type				Code	Description		
Design Capacity	Design Capacity Units			Waste Feed		Waste Type		
	Code	Description		Code	Description	Code	Description	

New York State Department of Environmental Conservation
Air Permit Application



DEC ID									
-									

Section IV - Emission Unit Information (continued)

Process Information										<input type="checkbox"/> Continuation Sheet(s)	
EMISSION UNIT 0 - 00 E U 1								PROCESS		PR 1	
Description											
The remedial system is air stripping, using a packed column at a groundwater flow rate of 1,100 gpm (plus 100 gpm recycle, for a total of 1,200 gpm). Vapor phase treatment includes the use of 3 vessels, a 2-stage GAC unit, followed by a 3rd vessel containing a potassium permanganate impregnated zeolite for increased VC capacity. Prior to entering the vapor-phase GAC adsorption system, the humidity of the air stripper exhaust is reduced to approximately 50 percent or less to optimize the efficiency of the vapor-phase GAC.											
Air Stripper AS-1: Existing. Type: Vertical, Cylindrical Construction: Aluminum											
Packing: 25-foot Jaeger Tripack. Dimensions: 10.0 ft. Dia x 47 ft. H											
Source Classification Code (SCC)		Total Thruput		Thruput Quantity Units							
		Quantity/Hr	Quantity/Yr	Code	Description						
<input type="checkbox"/> Confidential <input checked="" type="checkbox"/> Operating at Maximum Capacity <input type="checkbox"/> Activity with Insignificant Emissions		Operating Schedule		Building		Floor/Location					
		Hrs/Day	Days/Yr								
		24	365	BLDG-1		Main					
Emission Source/Control Identifier(s)											
AS-1											
EMISSION UNIT -								PROCESS			
Description											
Source Classification Code (SCC)		Total Thruput		Thruput Quantity Units							
		Quantity/Hr	Quantity/Yr	Code	Description						
<input type="checkbox"/> Confidential <input type="checkbox"/> Operating at Maximum Capacity <input type="checkbox"/> Activity with Insignificant Emissions		Operating Schedule		Building		Floor/Location					
		Hrs/Day	Days/Yr								
Emission Source/Control Identifier(s)											

New York State Department of Environmental Conservation
Air Permit Application



DEC ID									
-									

Section IV - Emission Unit Information (continued)

Emission Unit	Emission Point	Process	Emission Source	Emission Unit Applicable Federal Requirements										<input type="checkbox"/> Continuation Sheet(s)	
				Title	Type	Part	Sub Part	Section	Sub Division	Parag.	Sub Parag.	Clause	Sub Clause		
-															
-															
-															
-															

Emission Unit	Emission Point	Process	Emission Source	Emission Unit State Only Requirements										<input type="checkbox"/> Continuation Sheet(s)	
				Title	Type	Part	Sub Part	Section	Sub Division	Parag.	Sub Parag.	Clause	Sub Clause		
-															
-															
-															
-															

Emission Unit Compliance Certification											<input type="checkbox"/> Continuation Sheet(s)
Rule Citation											
Title	Type	Part	Sub Part	Section	Sub Division	Paragraph	Sub Paragraph	Clause	Sub Clause		
6	NYCRR	212									
<input checked="" type="checkbox"/> Applicable Federal Requirement				<input type="checkbox"/> State Only Requirement				<input type="checkbox"/> Capping			
Emission Unit	Emission Point	Process	Emission Source	CAS No.			Contaminant Name				
0-00EU1	00ST1	PR1	AS-1	00079 - 01 - 6			Trichloroethylene				
Monitoring Information											
<input type="checkbox"/> Continuous Emission Monitoring				<input type="checkbox"/> Monitoring of Process or Control Device Parameters as Surrogate							
<input checked="" type="checkbox"/> Intermittent Emission Testing				<input type="checkbox"/> Work Practice Involving Specific Operations							
<input type="checkbox"/> Ambient Air Monitoring				<input type="checkbox"/> Record Keeping/Maintenance Procedures							
Description											
Monthly grab samples analyzed for VOCs from the vapor phase treatment system influent, effluent and two intermediate locations.											
Work Practice		Process Material					Reference Test Method				
Type	Code	Description									
Parameter		Manufacturer Name/Model No.									
Code	Description										
23	Concentration										
Limit			Limit Units								
Upper	Lower	Code	Description								
3,125		255	micrograms per cubic meter								
Averaging Method			Monitoring Frequency			Reporting Requirements					
Code	Description	Code	Description	Code	Description						
01	Instantaneous	05	Monthly	10	Upon Request						

New York State Department of Environmental Conservation
Air Permit Application



DEC ID									
-									

Section IV - Emission Unit Information (continued)

Determination of Non-Applicability (Title V Only) N/A <input type="checkbox"/> Continuation Sheet(s)										
Rule Citation										
Title	Type	Part	Sub Part	Section	Sub Division	Paragraph	Sub Paragraph	Clause	Sub Clause	
Emission Unit		Emission Point		Process	Emission Source		<input type="checkbox"/> Applicable Federal Requirement <input type="checkbox"/> State Only Requirement			
Description										
Rule Citation										
Title	Type	Part	Sub Part	Section	Sub Division	Paragraph	Sub Paragraph	Clause	Sub Clause	
Emission Unit		Emission Point		Process	Emission Source		<input type="checkbox"/> Applicable Federal Requirement <input type="checkbox"/> State Only Requirement			
Description										
Process Emissions Summary <input type="checkbox"/> Continuation Sheet(s)										
EMISSION UNIT	0 - 0 0 E U 1						PROCESS	P	R	1
CAS No.	Contaminant Name			% Thruput	% Capture	% Control	ERP (lbs/hr)	ERP How Determined		
0079 - 01 - 6	Trichloroethylene					95	1.87	02		
PTE			Standard Units	PTE How Determined		Actual				
(lbs/hr)	(lbs/yr)	(standard units)				(lbs/hr)	(lbs/yr)			
0.09	99					02				
EMISSION UNIT	0 - 0 0 E U 1						PROCESS	P	R	1
CAS No.	Contaminant Name			% Thruput	% Capture	% Control	ERP (lbs/hr)	ERP How Determined		
00075 - 01 - 4	Vinyl Chloride					95	0.17	03		
PTE			Standard Units	PTE How Determined		Actual				
(lbs/hr)	(lbs/yr)	(standard units)				(lbs/hr)	(lbs/yr)			
0.01	3.7					02				
EMISSION UNIT	0 - 0 0 E U 1						PROCESS	P	R	1
CAS No.	Contaminant Name			% Thruput	% Capture	% Control	ERP (lbs/hr)	ERP How Determined		
000540 - 59 - 0	1,2-Dichloroethylene					95	0.6	02		
PTE			Standard Units	PTE How Determined		Actual				
(lbs/hr)	(lbs/yr)	(standard units)				(lbs/hr)	(lbs/yr)			
0.03	7.3					02				

New York State Department of Environmental Conservation
Air Permit Application



DEC ID									
-									

Section IV - Emission Unit Information (continued)

EMISSION UNIT		Emission Unit Emissions Summary				<input type="checkbox"/> Continuation Sheet(s)
0	-	0	0	E	U	1
CAS No.		Contaminant Name				
00107- 06 - 2		1,2-Dichloroethane				
ERP (lbs/yr)	PTE Emissions		Actual			
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)		
13.4	Below Reporting Threshold BRT					
CAS No.		Contaminant Name				
00108 - 88 - 3		Toluene				
ERP (lbs/yr)	PTE Emissions		Actual			
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)		
72.7	BRT		BRT			
CAS No.		Contaminant Name				
01330- 20 - 7		Xylene				
ERP (lbs/yr)	PTE Emissions		Actual			
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)		
77.1	BRT		BRT			
CAS No.		Contaminant Name				
-		1,1,2-Trichloroethane				
ERP (lbs/yr)	PTE Emissions		Actual			
	(lbs/hr)	(lbs/yr)	(lbs/hr)	(lbs/yr)		
	BRT		BRT			

Compliance Plan													<input type="checkbox"/> Continuation Sheet(s)
For any emission units which are <u>not in compliance</u> at the time of permit application, the applicant shall complete the following													
Consent Order			Certified progress reports are to be submitted every 6 months beginning ____ / ____ / ____										
Emission Unit	Process	Emission Source	Applicable Federal Requirement										
			Title	Type	Part	Sub Part	Section	Sub Division	Parag.	Sub Parag.	Clause	Sub Clause	
Remedial Measure / Intermediate Milestones										R/I	Date Scheduled		

New York State Department of Environmental Conservation
Air Permit Application



DEC ID											
-											

Section IV - Emission Unit Information (continued)

Request for Emission Reduction Credits										<input type="checkbox"/> Continuation Sheet(s)	
EMISSION UNIT -											
Emission Reduction Description											
Contaminant Emission Reduction Data											
Baseline Period ____ / ____ / ____ to ____ / ____ / ____						Reduction					
						Date		Method			
						/ /					
CAS No.			Contaminant Name			ERC (lbs/yr)					
-			-			Netting		Offset			
-			-								
-			-								
Facility to Use Future Reduction											
Name						APPLICATION ID					
						- / -					
Location Address											
<input type="checkbox"/> City / <input type="checkbox"/> Town / <input type="checkbox"/> Village						State		Zip			

Use of Emission Reduction Credits										<input type="checkbox"/> Continuation Sheet(s)	
EMISSION UNIT -											
Proposed Project Description											
Contaminant Emissions Increase Data											
CAS No.			Contaminant Name			PEP (lbs/yr)					
-			-								
Statement of Compliance											
<input type="checkbox"/> All facilities under the ownership of this "ownership/firm" are operating in compliance with all applicable requirements and state regulations including any compliance certification requirements under Section 114(a)(3) of the Clean Air Act Amendments of 1990, or are meeting the schedule of a consent order.											
Source of Emission Reduction Credit - Facility											
Name						PERMIT ID					
						- / -					
Location Address											
<input type="checkbox"/> City / <input type="checkbox"/> Town / <input type="checkbox"/> Village						State		Zip			
Emission Unit		CAS No.		Contaminant Name		ERC (lbs/yr)					
-		-		-		Netting		Offset			
-		-		-							
-		-		-							



DEC ID									
-									

Supporting Documentation

- P.E. Certification (form attached)
- List of Exempt Activities (form attached)
- Plot Plan
- Methods Used to Determine Compliance (form attached)
- Calculations
- Air Quality Model (____ / ____ / ____)
- Confidentiality Justification
- Ambient Air Monitoring Plan (____ / ____ / ____)
- Stack Test Protocols/Reports (____ / ____ / ____)
- Continuous Emissions Monitoring Plans/QA/QC (____ / ____ / ____)
- MACT Demonstration (____ / ____ / ____)
- Operational Flexibility: Description of Alternative Operating Scenarios and Protocols
- Title IV: Application/Registration
- ERC Quantification (form attached)
- Use of ERC(s) (form attached)
- Baseline Period Demonstration
- Analysis of Contemporaneous Emission Increase/Decrease
- LAER Demonstration (____ / ____ / ____)
- BACT Demonstration (____ / ____ / ____)
- Other Document(s): _____ (____ / ____ / ____)
 _____ (____ / ____ / ____)
 _____ (____ / ____ / ____)
 _____ (____ / ____ / ____)
 _____ (____ / ____ / ____)
 _____ (____ / ____ / ____)
 _____ (____ / ____ / ____)
 _____ (____ / ____ / ____)
 _____ (____ / ____ / ____)
 _____ (____ / ____ / ____)
 _____ (____ / ____ / ____)
 _____ (____ / ____ / ____)

**ATTACHMENT 1
Emission Estimate**

Feed Water Flow 1,100 gpm: max or normal
250 m³/hr
Water Flow Including Recycle 1,200 gpm: max or normal
273 m³/hr
Air Flow 8,000 cfm
13,592 m³/hr
A/W vol ratio 50

EXAMPLE EMISSION CALC: Vinyl Chloride
4.8 ug/L x 1000 L/m³ x 250 m³ water/13,623 m³ air = 88 ug/m³

Name	CAS Number	Toxicity: H/M/L ²	VOC ³	HAP ⁴	GW Conc. ¹		Effluent Conc ¹		Uncontrolled Stripper Exhaust							
					Max ug/L	Avg ug/L	Max ug/L	Avg ug/L	Max lb/day	Avg lb/day	Max lb/hr	Avg lb/hr	Max gm/sec	Avg gm/sec	Max ug/m ³	Avg ug/m ³
1,1,1-Trichloroethane (Methyl Chloroform)	00071-55-6	L	No	Yes	3	3.0			0.04	0.04	0.00	0.00	2.08E-04	2.08E-04	55	55
1,1,2-Trichloroethane	00079-00-5	M	Yes	Yes	3.5	0.3			0.05	0.00	0.00	0.00	2.43E-04	2.08E-05	64	6
1,1-Dichloroethane	00075-34-3	L	Yes	Yes	4	0.7			0.05	0.01	0.00	0.00	2.77E-04	4.85E-05	74	13
1,2-Dichloroethane	00107-06-2	M	Yes	Yes	3	1.0	0.3	0.1	0.04	0.01	0.00	0.00	1.87E-04	6.24E-05	55	18
1,1-Dichloroethylene (Vinylidene Chloride)	00075-35-4	M	Yes	Yes	9	1.6			0.12	0.02	0.00	0.00	6.24E-04	1.11E-04	165	29
1,2-Dichloroethylene	00540-59-0	M	Yes	No	1,100	31.5	1.3	0.0	14.51	0.42	0.60	0.02	7.62E-02	2.18E-03	20,219	579
Benzene	00071-43-2	H	Yes	Yes	4	0.1			0.05	0.00	0.00	0.00	2.77E-04	6.94E-06	74	2
Carbon Tetrachloride	00056-23-5	H	Yes	Yes	4	0.1			0.05	0.00	0.00	0.00	2.77E-04	6.94E-06	74	2
Chlorobenzene (Monochlorobenzene)	00108-90-7	M	Yes	Yes	1	0.1			0.01	0.00	0.00	0.00	6.94E-05	6.94E-06	18	2
Chloroform	00067-66-3	M	Yes	Yes	2	0.8			0.03	0.01	0.00	0.00	1.39E-04	5.55E-05	37	15
Methyl Tert Butyl Ether	01634-04-4	M	Yes	Yes	2	0.1			0.03	0.00	0.00	0.00	1.39E-04	6.94E-06	37	2
Tetrachloroethylene	00127-18-4	M	Yes	Yes	900	33.8	0.9	0.0	11.88	0.45	0.49	0.02	6.24E-02	2.34E-03	16,543	621
Toluene	00108-88-3	L	Yes	Yes	15	0.7			0.20	0.01	0.01	0.00	1.04E-03	4.85E-05	276	13
Trichloroethylene	00079-01-6	M	Yes	Yes	3,400	411.5	4.5	0.5	44.86	5.43	1.87	0.23	2.35E-01	2.85E-02	62,494	7,564
Vinyl chloride	00075-01-4	H	Yes	Yes	300	4.8	0.0	0.0	3.96	0.06	0.17	0.00	2.08E-02	3.33E-04	5,514	88
Xylenes	01330-20-7	M	Yes	Yes	16	0.2			0.21	0.00	0.01	0.00	1.11E-03	1.39E-05	294	4
Total VOCs					5,764	487.3	7.0	0.6	76.05	6.43	3.17	0.27				
Total HAPs					4,667	458.8	5.7	0.6	61.57	6.05	2.57	0.25				
									Total Uncontrolled VOC		2,347 lb/yr					
									Total Uncontrolled HAP		2,209 lb/yr					

1. Source: "GM-38 Groundwater Remedy Analysis Report", February 2003
2. Source: DAR-1 AGC/SGC Tables, NYSDEC Division of Air Resources, Air Toxics Section, September 10, 2007.
3. Source: 6 NYCRR Part 200 1(cg)
4. Source: 6 NYCRR Part 200.1(ag)

**ATTACHMENT 1
Emission Estimate**

Feed Water Flow 1,100 gpm: max or normal
250 m³/hr
Water Flow Including Recycle 1,200 gpm: max or normal
273 m³/hr
Air Flow 8,000 cfm
13,592 m³/hr
A/W vol ratio 50

Name	CAS Number	Toxicity: H/M/L ²	VOC ³	HAP ⁴	Control by GAC	Max lb/day	Avg lb/day	Controlled Stripper Exhat	
								Max gm/sec	Avg gm/sec
1,1,1-Trichloroethane (Methyl Chloroform)	00071-55-6	L	No	Yes	95%	0.00	0.00	1.04E-05	1.04E-05
1,1,2-Trichloroethane	00079-00-5	M	Yes	Yes	95%	0.00	0.00	1.21E-05	1.04E-06
1,1-Dichloroethane	00075-34-3	L	Yes	Yes	95%	0.00	0.00	1.39E-05	2.43E-06
1,2-Dichloroethane	00107-06-2	M	Yes	Yes	95%	0.00	0.00	9.36E-06	3.12E-06
1,1-Dichloroethylene (Vinylidene Chloride)	00075-35-4	M	Yes	Yes	95%	0.01	0.00	3.12E-05	5.55E-06
1,2-Dichloroethylene	00540-59-0	M	Yes	No	95%	0.73	0.02	3.81E-03	1.09E-04
Benzene	00071-43-2	H	Yes	Yes	95%	0.00	0.00	1.39E-05	3.47E-07
Carbon Tetrachloride	00056-23-5	H	Yes	Yes	95%	0.00	0.00	1.39E-05	3.47E-07
Chlorobenzene (Monochlorobenzene)	00108-90-7	M	Yes	Yes	95%	0.00	0.00	3.47E-06	3.47E-07
Chloroform	00067-66-3	M	Yes	Yes	95%	0.00	0.00	6.94E-06	2.77E-06
Methyl Tert Butyl Ether	01634-04-4	M	Yes	Yes	95%	0.00	0.00	6.94E-06	3.47E-07
Tetrachloroethylene	00127-18-4	M	Yes	Yes	95%	0.59	0.02	3.12E-03	1.17E-04
Toluene	00108-88-3	L	Yes	Yes	95%	0.01	0.00	5.20E-05	2.43E-06
Trichloroethylene	00079-01-6	M	Yes	Yes	95%	2.24	0.27	1.18E-02	1.43E-03
Vinyl chloride	00075-01-4	H	Yes	Yes	95%	0.20	0.00	1.04E-03	1.66E-05
Xylenes	01330-20-7	M	Yes	Yes	95%	0.01	0.00	5.55E-05	6.94E-07
Total VOCs						3.80	0.32		
Total HAPs						3.08	0.30		
						Total Controlled VOC		117 lb/yr	
						Total Controlled HAP		110 lb/yr	

1. Source: "GM-38 Groundwater Remedy Analysis Report", February 2003
2. Source: DAR-1 AGC/SGC Tables, NYSDEC Division of Air Resources, Air Tox
3. Source: 6 NYCRR Part 200.1(cg)
4. Source: 6 NYCRR Part 200.1(ag)

ATTACHMENT 2
AIR SCREENING ANALYSIS:
Annual

BETHPAGE SCREENING ANALYSIS					1-Hour Impact	405.7	(ug/m ³)		
ANNUAL IMPACTS COMPARED TO ANNUAL GUIDELINE CONCENTRATIONS (AGCs)					Annual Impact	32.456	(ug/m ³)		
			NYSDEC	Estimated Emissions		Predicted Annual Impact		Maximum Percent of AGC	
			Guideline	Uncontrolled	Controlled	Uncontrolled	Controlled	Uncontrolled	Controlled
			AGC	(g/s)	(g/s)	(ug/m ³)	(ug/m ³)	Pct	Pct
Pollutant	CAS Number	(ug/m ³)							
1,1,1-Trichloroethane (Methyl Chloroform)	00071-55-6	1000.00	2.08E-04	1.04E-05	0.0068	0.0003	0.0%	0.0%	
1,1,2-Trichloroethane	00079-00-5	1.40	2.08E-05	1.04E-06	0.0007	0.0000	0.0%	0.0%	
1,1-Dichloroethane	00075-34-3	0.63	4.85E-05	2.43E-06	0.0016	0.0001	0.3%	0.0%	
1,2-Dichloroethane	00107-06-2	0.04	6.24E-05	3.12E-06	0.0020	0.0001	5.3%	0.3%	
1,1-Dichloroethylene (Vinylidene Chloride)	00075-35-4	70.00	1.11E-04	5.55E-06	0.0036	0.0002	0.0%	0.0%	
1,2-Dichloroethylene	00540-59-0	63.00	2.18E-03	1.09E-04	0.0709	0.0035	0.1%	0.0%	
Benzene	00071-43-2	0.13	6.94E-06	3.47E-07	0.0002	0.0000	0.2%	0.0%	
Carbon Tetrachloride	00056-23-5	0.07	6.94E-06	3.47E-07	0.0002	0.0000	0.3%	0.0%	
Chlorobenzene (Monochlorobenzene)	00108-90-7	110.00	6.94E-06	3.47E-07	0.0002	0.0000	0.0%	0.0%	
Chloroform	00067-66-3	0.04	5.55E-05	2.77E-06	0.0018	0.0001	4.2%	0.2%	
Methyl tert-Butyl Ether	01634-04-4	3000.00	6.94E-06	3.47E-07	0.0002	0.0000	0.0%	0.0%	
Tetrachloroethylene	00127-18-4	1.00	2.34E-03	1.17E-04	0.0761	0.0038	7.6%	0.4%	
Toluene	00108-88-3	5000.00	4.85E-05	2.43E-06	0.0016	0.0001	0.0%	0.0%	
Trichloroethylene	00079-01-6	0.50	2.85E-02	1.43E-03	0.9252	0.0463	185.0%	9.3%	
Vinyl Chloride	00075-01-4	0.11	3.33E-04	1.66E-05	0.0108	0.0005	9.8%	0.5%	
Xylenes	01330-20-7	100.00	1.39E-05	6.94E-07	0.0005	0.0000	0.0%	0.0%	

**ATTACHMENT 2
AIR SCREENING ANALYSIS:
Short term**

BETHPAGE SCREENING ANALYSIS					1-Hour Impact	405.7	(ug/m ³)	
SHORT-TERM IMPACTS COMPARED TO SHORT-TERM GUIDELINE CONCENTRATIONS (SGCs)					Annual Impact	32.456	(ug/m ³)	
Pollutant	CAS Number	NYSDEC Guideline SGC (ug/m³)	Estimated Emissions		Predicted Short-term Impact		Maximum Percent of SGC	
			Uncontrolled (g/s)	Controlled (g/s)	Uncontrolled (ug/m³)	Controlled (ug/m³)	Uncontrolled Pct	Controlled Pct
1,1,1-Trichloroethane (Methyl Chloroform)	00071-55-6	68000.00	2.08E-04	1.04E-05	0.084	0.004	0.0%	0.0%
1,1,2-Trichloroethane	00079-00-5	-	2.43E-04	1.21E-05	0.098	0.005	-	-
1,1-Dichloroethane	00075-34-3	-	2.77E-04	1.39E-05	0.113	0.006	-	-
1,2-Dichloroethane	00107-06-2	-	1.87E-04	9.36E-06	0.076	0.004	-	-
1,1-Dichloroethylene (Vinylidene Chloride)	00075-35-4	-	6.24E-04	3.12E-05	0.253	0.013	-	-
1,2-Dichloroethylene	00540-59-0	-	7.62E-02	3.81E-03	30.915	1.546	-	-
Benzene	00071-43-2	1300.00	2.77E-04	1.39E-05	0.113	0.006	0.0%	0.0%
Carbon Tetrachloride	00056-23-5	1900.00	2.77E-04	1.39E-05	0.113	0.006	0.0%	0.0%
Chlorobenzene (Monochlorobenzene)	00108-90-7	-	6.94E-05	3.47E-06	0.028	0.001	-	-
Chloroform	00067-66-3	150.00	1.39E-04	6.94E-06	0.056	0.003	0.0%	0.0%
Methyl tert-Butyl Ether	01634-04-4	-	1.39E-04	6.94E-06	0.056	0.003	-	-
Tetrachloroethylene	00127-18-4	1000.00	6.24E-02	3.12E-03	25.298	1.265	2.5%	0.1%
Toluene	00108-88-3	37000.00	1.04E-03	5.20E-05	0.422	0.021	0.0%	0.0%
Trichloroethylene	00079-01-6	14000.00	2.35E-01	1.18E-02	95.541	4.777	0.7%	0.0%
Vinyl Chloride	00075-01-4	180000.00	2.08E-02	1.04E-03	8.441	0.422	0.0%	0.0%
Xylenes	01330-20-7	4300.00	1.11E-03	5.55E-05	0.450	0.023	0.0%	0.0%

**ATTACHMENT 2
AIR SCREENING ANALYSIS:
Short term**

BETHPAGE SCREENING ANALYSIS					1-Hour Impact	405.7	(ug/m ³)	
SHORT-TERM IMPACTS COMPARED TO SHORT-TERM GUIDELINE CONCENTRATIONS (SGCs)					Annual Impact	32.456	(ug/m ³)	
Pollutant	CAS Number	NYSDEC Guideline SGC (ug/m ³)	Estimated Emissions		Predicted Short-term Impact		Maximum Percent of SGC	
			Uncontrolled (g/s)	Controlled (g/s)	Uncontrolled (ug/m ³)	Controlled (ug/m ³)	Uncontrolled Pct	Controlled Pct
1,1,1-Trichloroethane (Methyl Chloroform)	00071-55-6	68000.00	2.08E-04	1.04E-05	0.084	0.004	0.0%	0.0%
1,1,2-Trichloroethane	00079-00-5	-	2.43E-04	1.21E-05	0.098	0.005	-	-
1,1-Dichloroethane	00075-34-3	-	2.77E-04	1.39E-05	0.113	0.006	-	-
1,2-Dichloroethane	00107-06-2	-	1.87E-04	9.36E-06	0.076	0.004	-	-
1,1-Dichloroethylene (Vinylidene Chloride)	00075-35-4	-	6.24E-04	3.12E-05	0.253	0.013	-	-
1,2-Dichloroethylene	00540-59-0	-	7.62E-02	3.81E-03	30.915	1.546	-	-
Benzene	00071-43-2	1300.00	2.77E-04	1.39E-05	0.113	0.006	0.0%	0.0%
Carbon Tetrachloride	00056-23-5	1900.00	2.77E-04	1.39E-05	0.113	0.006	0.0%	0.0%
Chlorobenzene (Monochlorobenzene)	00108-90-7	-	6.94E-05	3.47E-06	0.028	0.001	-	-
Chloroform	00067-66-3	150.00	1.39E-04	6.94E-06	0.056	0.003	0.0%	0.0%
Methyl tert-Butyl Ether	01634-04-4	-	1.39E-04	6.94E-06	0.056	0.003	-	-
Tetrachloroethylene	00127-18-4	1000.00	6.24E-02	3.12E-03	25.298	1.265	2.5%	0.1%
Toluene	00108-88-3	37000.00	1.04E-03	5.20E-05	0.422	0.021	0.0%	0.0%
Trichloroethylene	00079-01-6	14000.00	2.35E-01	1.18E-02	95.541	4.777	0.7%	0.0%
Vinyl Chloride	00075-01-4	180000.00	2.08E-02	1.04E-03	8.441	0.422	0.0%	0.0%
Xylenes	01330-20-7	4300.00	1.11E-03	5.55E-05	0.450	0.023	0.0%	0.0%

03/16/09
11:26:15

*** SCREEN3 MODEL RUN ***
*** VERSION DATED 96043 ***

Bethpage GM-38 Air Stripper Uncontrolled

SIMPLE TERRAIN INPUTS:

SOURCE TYPE = POINT
EMISSION RATE (G/S) = 1.00000
STACK HEIGHT (M) = 12.2000
STK INSIDE DIAM (M) = .9100
STK EXIT VELOCITY (M/S) = 5.7700
STK GAS EXIT TEMP (K) = 294.0000
AMBIENT AIR TEMP (K) = 293.0000
RECEPTOR HEIGHT (M) = .0000
URBAN/RURAL OPTION = URBAN
BUILDING HEIGHT (M) = 7.6000
MIN HORIZ BLDG DIM (M) = 22.9000
MAX HORIZ BLDG DIM (M) = 22.9000

THE REGULATORY (DEFAULT) MIXING HEIGHT OPTION WAS SELECTED.
THE REGULATORY (DEFAULT) ANEMOMETER HEIGHT OF 10.0 METERS WAS ENTERED.

BUOY. FLUX = .040 M**4/S**3; MOM. FLUX = 6.869 M**4/S**2.

*** FULL METEOROLOGY ***

*** SCREEN AUTOMATED DISTANCES ***

*** TERRAIN HEIGHT OF 0. M ABOVE STACK BASE USED FOR FOLLOWING DISTANCES ***

DIST (M)	CONC (UG/M**3)	STAB	U10M (M/S)	USTK (M/S)	MIX HT (M)	PLUME HT (M)	SIGMA Y (M)	SIGMA Z (M)	DWASH
10.	.1323E-07	1	1.5	1.5	480.0	22.39	3.65	2.99	NO
100.	278.3	3	1.0	1.0	320.0	27.34	22.00	20.46	NO
200.	339.9	6	1.0	1.1	10000.0	20.81	21.31	14.25	NO

MAXIMUM 1-HR CONCENTRATION AT OR BEYOND 10. M:

201.	339.9	6	1.0	1.1	10000.0	20.81	21.51	14.37	NO
------	-------	---	-----	-----	---------	-------	-------	-------	----

*** SCREEN AUTOMATED DISTANCES ***

*** TERRAIN HEIGHT OF 2. M ABOVE STACK BASE USED FOR FOLLOWING DISTANCES ***

DIST (M)	CONC (UG/M**3)	STAB	U10M (M/S)	USTK (M/S)	MIX HT (M)	PLUME HT (M)	SIGMA Y (M)	SIGMA Z (M)	DWASH
210.	405.7	6	1.0	1.1	10000.0	18.81	22.32	14.86	NO
300.	307.9	6	1.0	1.1	10000.0	18.81	31.28	20.08	NO
400.	219.2	6	1.0	1.1	10000.0	18.81	40.93	25.42	NO

500.	162.3	6	1.0	1.1	10000.0	18.81	50.27	30.34	NO
600.	125.2	6	1.0	1.1	10000.0	18.81	59.32	34.91	NO

MAXIMUM 1-HR CONCENTRATION AT OR BEYOND 210. M:

210.	405.7	6	1.0	1.1	10000.0	18.81	22.32	14.86	NO
------	-------	---	-----	-----	---------	-------	-------	-------	----

 *** SCREEN AUTOMATED DISTANCES ***

*** TERRAIN HEIGHT OF 9. M ABOVE STACK BASE USED FOR FOLLOWING DISTANCES ***

DIST (M)	CONC (UG/M**3)	STAB	U10M (M/S)	USTK (M/S)	MIX HT (M)	PLUME HT (M)	SIGMA Y (M)	SIGMA Z (M)	DWASH
610.	133.2	6	1.0	1.1	10000.0	11.81	60.21	35.35	NO
700.	107.4	6	1.0	1.1	10000.0	11.81	68.10	39.19	NO
800.	87.22	6	1.0	1.1	10000.0	11.81	76.63	43.22	NO
900.	72.75	6	1.0	1.1	10000.0	11.81	84.93	47.03	NO

MAXIMUM 1-HR CONCENTRATION AT OR BEYOND 610. M:

610.	133.2	6	1.0	1.1	10000.0	11.81	60.21	35.35	NO
------	-------	---	-----	-----	---------	-------	-------	-------	----

 *** SCREEN AUTOMATED DISTANCES ***

*** TERRAIN HEIGHT OF 11. M ABOVE STACK BASE USED FOR FOLLOWING DISTANCES ***

DIST (M)	CONC (UG/M**3)	STAB	U10M (M/S)	USTK (M/S)	MIX HT (M)	PLUME HT (M)	SIGMA Y (M)	SIGMA Z (M)	DWASH
1000.	62.47	6	1.0	1.1	10000.0	9.81	93.00	50.66	NO
1100.	54.05	6	1.0	1.1	10000.0	9.81	100.86	54.11	NO
1200.	47.42	6	1.0	1.1	10000.0	9.81	108.53	57.42	NO
1300.	42.10	6	1.0	1.1	10000.0	9.81	116.01	60.60	NO

MAXIMUM 1-HR CONCENTRATION AT OR BEYOND 1000. M:

1000.	62.47	6	1.0	1.1	10000.0	9.81	93.00	50.66	NO
-------	-------	---	-----	-----	---------	------	-------	-------	----

DWASH= MEANS NO CALC MADE (CONC = 0.0)
 DWASH=NO MEANS NO BUILDING DOWNWASH USED
 DWASH=HS MEANS HUBER-SNYDER DOWNWASH USED
 DWASH=SS MEANS SCHULMAN-SCIRE DOWNWASH USED
 DWASH=NA MEANS DOWNWASH NOT APPLICABLE, X<3*LB

 * SUMMARY OF TERRAIN HEIGHTS ENTERED FOR *
 * SIMPLE ELEVATED TERRAIN PROCEDURE *

TERRAIN HT (M)	DISTANCE RANGE (M)	
	MINIMUM	MAXIMUM
0.	10.	200.
2.	210.	600.
9.	610.	920.

11. 1000. 1300.

*** REGULATORY (Default) ***
PERFORMING CAVITY CALCULATIONS
WITH ORIGINAL SCREEN CAVITY MODEL
(BRODE, 1988)

*** CAVITY CALCULATION - 1 ***

CONC (UG/M**3) = .0000
CRIT WS @10M (M/S) = 99.99
CRIT WS @ HS (M/S) = 99.99
DILUTION WS (M/S) = 99.99
CAVITY HT (M) = 7.84
CAVITY LENGTH (M) = 22.86
ALONGWIND DIM (M) = 22.90

*** CAVITY CALCULATION - 2 ***

CONC (UG/M**3) = .0000
CRIT WS @10M (M/S) = 99.99
CRIT WS @ HS (M/S) = 99.99
DILUTION WS (M/S) = 99.99
CAVITY HT (M) = 7.84
CAVITY LENGTH (M) = 22.86

APPENDIX C
Field Data Sheets



GROUNDWATER LEVEL MEASUREMENT SHEET

Project Name: NWIRP Bethpage GM-38
 Location: Bethpage, NY
 Weather Conditions: Cool Sunny
 Tidally Influenced: Yes No

Project No.: EF032.300
 Personnel: GL
 Measuring Device: Heron Dipper T
 Remarks: _____

Monitoring Well ID	Date	Time	Total Well Depth (feet)*	Depth to Water (feet)*	Thickness of Water Column (feet)*	PID (ppm)	Comments
RW1-MW1	11/10	1020	435	33.42			
RW1-MW2	11/10	1030	435	35.99			
RW1-MW3	11/10	1140	435	33.53			
RW2-MW1	11/03	0940	510	39.16			
RW2-MW2	11/3	0930	510	39.80			
RW2-MW3	11/3	0920	510	40.12			
RW3-MW1	11/9	1620	350	34.08			
RW3-MW2	11/9	1535	495	38.05			
RW3-MW3	11/3	1048	340	40.14			
RW3-MW4	11/3	1150	495	40.01			
TP-1	11/3	0845	470	30.84			
IW-1-MW-1	11/3	0825	150	33.92			
GM38D	---	---	---	---	---	---	Not accessible
GM38D2	---	---	---	---	---	---	Not accessible

*All measurements to the nearest 0.01 foot



GROUNDWATER SAMPLE LOG SHEET

page ___ of ___

Project Site Name: NWIRP Bethpage GM-38 Sample ID No.: NWIRP-GM38-GW-RW2-MW1-110310
 Project No.: EF032.300 Sample Location: Bethpage, NY
 Sampled By: GG

SAMPLING DATA:	FINAL VALUES:						
<u>11-03-10</u>	Color	Ph	S.C.	Turbidity	DO	Temp	ORP
Time: <u>0935</u>	(Visual)	(Standard)	(mS/cm)	(NTU)	(mg/l)	(°C)	(MV)
Purge Method: <u>Low Flow</u>	<u>clear</u>	<u>5.19</u>	<u>229</u>	<u>23</u>	<u>0.50</u>	<u>10.50</u>	<u>110</u>

PURGE DATA:

Date: <u>11/3/10</u>	Purge Calculations:	
Purge Method: <u>Low Flow - bladder pump</u>	1": 0.04080	6": 1.46869
PID Reading (ppm): <u>0</u>	2": 0.16319	8": 2.61101
Well Casing Diameter & Material: <u>4"</u>	3": 0.36717	10": 4.07970
Total Well Depth (TD): _____	4": 0.65275	12": 5.87477
Static Water Level (DTW): <u>39.1</u>		
Start Purge (hrs): <u>0910</u>		
End Purge (hrs): <u>0940</u>		
Total Purge Time (min): <u>30</u>		
Total Vol. Purged (gal/L): <u>5</u>		

SAMPLE COLLECTION INFORMATION:

Analysis	Preservative	Container Requirements	Collected
TCL VOCs	HCl	40 mL CG	3
TSS	HNO ₃	500 mL PL	1
Mercury	---	250 mL PL	1

OBSERVATIONS/NOTES:

Circle if Applicable: Signature(s):

<input type="checkbox"/> MS/MSD	Duplicate ID No.:	
---------------------------------	-------------------	--



PURGE DATA SHEET

page ____ of ____

Date: 1/13/10
 Sample ID No.: RW2-MW1

Time (hrs)	Water Level (ft. below TOC)	Flow (mL/min)	pH (SU)	Cond. (mS/cm)	Turb. (NTU)	DO (mg/L)	Temp. (°C)	ORP (mV)	Comments
	Target drawdown $\leq 0.3'$	200-500	± 0.1 unit	$\pm 3\%$	$\pm 10\%$, > 1 NTU	$\pm 10\%$	$\pm 3\%$	± 10 mV	
910		200	5.55	216	23	1.26	11.74	131.2	
915		200	5.84	224	35	0.70	12.15	126	
920		200	4.82	217	35	1.00	11.92	131	
0925		200	5.29	219	30	0.68	12.13	123	
0930		200	5.30	227	23	0.35	12.42	115	
0935		200	5.26	229	22	0.37	12.28	112	
		200	5.19	229	23	0.30	12.50	110	

Signature(s): _____



GROUNDWATER SAMPLE LOG SHEET

page ___ of ___

Project Site Name: NWIRP Bethpage GM-38 Sample ID No.: NWIRP-GM38-GW-RW3-MW-3-110310
Project No.: EF032.300 Sample Location: RW3 - MW 3
Sampled By: Bethpage, NY

SAMPLING DATA:	FINAL VALUES:						
	Color (Visual)	Ph (Standard)	S.C. (mS/cm)	Turbidity (NTU)	DO (mg/l)	Temp (°C)	ORP (MV)
Time: <u>1049</u>							
Purge Method: Low Flow	<u>Clear</u>	<u>5.86</u>	<u>155</u>	<u>2.3</u>	<u>.55</u>	<u>13.54</u>	<u>1363</u>

PURGE DATA:	
Date: <u>11-03-10</u>	Purge Calculations:
Purge Method: <u>Low Flow - bladder pump</u>	1": 0.04080 6": 1.46869
PID Reading (ppm): <u>--</u>	2": 0.16319 8": 2.61101
Well Casing Diameter & Material: <u>4"</u>	3": 0.36717 10": 4.07970
Total Well Depth (TD): <u>340</u>	4": 0.65275 12": 5.87477
Static Water Level (DTW): <u>40.1</u>	
Start Purge (hrs): <u>1018</u>	
End Purge (hrs): <u>1048</u>	
Total Purge Time (min): <u>30</u>	
Total Vol. Purged (gal/L): <u>45</u>	

SAMPLE COLLECTION INFORMATION:			
Analysis	Preservative	Container Requirements	Collected
TCL VOCs	HCl	40 mL CG	3
TSS	HNO ₃	500 mL PL	1
Mercury	--	250 mL PL	1

OBSERVATIONS/NOTES:

Circle if Applicable: MS/MSD Duplicate ID No.: Signature(s): [Signature]



PURGE DATA SHEET

page ___ of ___

Date: 11/3/18

Sample ID No.: RW3 - MW3

Time (hrs)	Water Level (ft. below TOC)	Flow (mL/min)	pH (SU)	Cond. (mS/cm)	Turb. (NTU)	DO (mg/L)	Temp. °C	ORP (mV)	Comments
	Target drawdown $\leq 0.3'$	200-500	± 0.1 unit	$\pm 3\%$	$\pm 10\%$, > 1 NTU	$\pm 10\%$	$\pm 3\%$	± 10 mV	Stability reached when 3 consecutive readings are within this range
1019		200-300	5.68	155	1.0	1.85	13.52	114.7	
1023		200-300	5.31	155	1.20	0.47	13.57	121.4	
1028		200-300	5.12	155	2.5	0.55	13.57	127.3	
1033		200-300	5.08	155	2.2	0.47	13.61	130.0	
1034		200-300	5.80	155	2.3	0.40	13.46	139.0	
1043		200-300	5.55	155	2.3	0.50	13.06	136.0	
1048		200-300	5.86	155	2.3	0.55	13.54	130.3	

Signature(s): _____



GROUNDWATER SAMPLE LOG SHEET

page ___ of ___

Project Site Name: NWIRP Bethpage GM-38
Project No.: EF032.300

Sample ID No.: RW 2-MW 4
Sample Location: Bethpage, NY
Sampled By: _____

*NWIRP-GM38-EW-RW3-MW4
110310*

SAMPLING DATA:		FINAL VALUES:						
		Color (Visual)	Ph (Standard)	S.C. (mS/cm)	Turbidity (NTU)	DO (mg/l)	Temp (°C)	ORP (MV)
Time: <u>11:50</u>		<u>clear</u>	<u>4.7</u>	<u>170</u>	<u>20</u>	<u>1.80</u>	<u>13.56</u>	<u>197</u>
Purge Method: <u>Low Flow</u>								

PURGE DATA:		Purge Calculations:	
Date: <u>11-03-10</u>	Purge Method: <u>Low Flow - bladder pump</u>	1": 0.04080	6": 1.46869
PID Reading (ppm): _____	Well Casing Diameter & Material: <u>4"</u>	2": 0.16319	8": 2.61101
Total Well Depth (TD): <u>495</u>	Static Water Level (DTW): <u>40.1</u>	3": 0.36717	10": 4.07970
Start Purge (hrs): <u>11:15</u>	Total Purge Time (min): <u>35 min</u>	4": 0.65275	12": 5.87477
End Purge (hrs): <u>11:50</u>	Total Vol. Purged (gal/L): _____		

SAMPLE COLLECTION INFORMATION:			
Analysis	Preservative	Container Requirements	Collected
TCL VOCs	HCl	40 mL CG	3
TSS	HNO ₃	500 mL PL	1
Mercury	—	250 mL PL	1

OBSERVATIONS/NOTES:

Circle if Applicable:		Signature(s):
MS/MSD	Duplicate ID No.:	



PURGE DATA SHEET

page ____ of ____

Date: 11/03/10

Sample ID No.: RW3 - MW 4

Time	Water Level	Flow	pH	Cond.	Turb.	DO	Temp.	ORP	Comments
(hrs)	(ft. below TOC)	(mL/min)	(SU)	(mS/cm)	(NTU)	(mg/L)	°C	(mV)	
	Target drawdown $\leq 0.3'$	200-500	± 0.1 unit	$\pm 3\%$	$\pm 10\%$, > 1 NTU	$\pm 10\%$	$\pm 3\%$	± 10 mV	Stability reached when 3 consecutive readings are within this range
1115	300	200	4.35	169	.25	1.33	13.56	192	
1120		200-300	4.69	170	.25	.92	13.64	176	
1125		200-300	4.70	170	.22	.92	13.64	179	
1130		200-300	4.70	170	.30	.84	13.64	176	
1135		200-300	4.73	170	.15	.84	13.64	176	
1140		200-300	4.73	170	.20	.80	13.69	172.3	
1145		200-300	4.70	170	.22	.85	13.70	172.2	
1150		200-300	4.70	170	.22	.80	13.70	171.8	

35
min

Signature(s): _____



GROUNDWATER SAMPLE LOG SHEET

page ___ of ___

Project Site Name: NWIRP Bethpage GM-38
Project No.: EF032.300

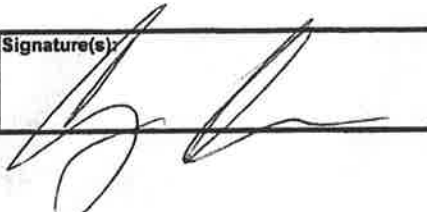
Sample ID No.: RW3 - MW 2
Sample Location: Bethpage, NY
Sampled By: GL

SAMPLING DATA:	FINAL VALUES:						
	Color (Visual)	Ph (Standard)	S.C. (mS/cm)	Turbidity (NTU)	DO (mg/l)	Temp (°C)	ORP (MV)
Time: <u>1500</u>							
Purge Method: Low Flow	<u>Clear</u>	<u>4.42</u>	<u>135</u>	<u>N/A</u>	<u>1.60</u>	<u>14.08</u>	<u>159</u>

PURGE DATA:		Purge Calculations:	
Date:	<u>11-09-2010</u>	1":	0.04080
Purge Method:	<u>Low Flow - bladder pump</u>	6":	1.46869
PID Reading (ppm):	<u>—</u>	2":	0.16319
Well Casing Diameter & Material:	<u>4"</u>	3":	0.36717
Total Well Depth (TD):	<u>495</u>	4":	0.65275
Static Water Level (DTW):	<u>38.05</u>	12":	5.87477
Start Purge (hrs):	<u>1500</u>	DUP Collected	
End Purge (hrs):	<u>1533</u>		
Total Purge Time (min):	<u>35 min</u>		
Total Vol. Purged (gal/L):			

SAMPLE COLLECTION INFORMATION:			
Analysis	Preservative	Container Requirements	Collected
TCL VOCs	HCl	40 mL CG	3
TSS	HNO ₃	500 mL PL	1
Mercury	—	250 mL PL	1

OBSERVATIONS/NOTES:

Circle if Applicable:	Signature(s):
MS/MSD	
Duplicate ID No.:	



PURGE DATA SHEET

Date: 11-9-2010

Sample ID No.: RW3-MW7

Time (hrs)	Water Level (ft. below TOC)	Flow (mL/min)	pH (SU)	Cond. (mS/cm)	Turb. (NTU)	DO (mg/L)	Temp. (°C)	ORP (mV)	Comments
	Target drawdown $\leq 0.3'$	200-500	± 0.1 unit	$\pm 3\%$	$\pm 10\%$, > 1 NTU	$\pm 10\%$	$\pm 3\%$	± 10 mV	Stability reached when 3 consecutive readings are within this range
1600	$200-300$	$200-300$	5.0	135	Min	2.80	1414	154.7	
1510/1605	\downarrow	\downarrow	4.8	137	\downarrow	2.80	1410	154.5	
1525/1610	\downarrow	\downarrow	4.58	135	\downarrow	2.79	1410	154.1	
1530	\downarrow	\downarrow	4.58	136	\downarrow	2.60	1410	154.2	
1535	\downarrow	\downarrow	4.45	136	\downarrow	1.60	1408	153.7	
1530	\downarrow	\downarrow	4.43	135	\downarrow	1.59	1408	153.6	
1535	\downarrow	\downarrow	4.42	135	\downarrow	1.60	1408	153.7	
									DUP Collected

35
11/10

Signature(s): 



GROUNDWATER SAMPLE LOG SHEET

page ___ of ___

Project Site Name: NWIRP Bethpage GM-38
 Project No.: EF032.300

Sample ID No.: RW3-MW 1
 Sample Location: Bethpage, NY
 Sampled By: GL

SAMPLING DATA:	FINAL VALUES:						
	Color (Visual)	Ph (Standard)	S.C. (mS/cm)	Turbidity (NTU)	DO (mg/l)	Temp (°C)	ORP (MV)
Time: <u>1350</u>							
Purge Method: Low Flow	<u>clear</u>	<u>5.41</u>	<u>157</u>	<u>N/A</u>	<u>0.44</u>	<u>17.22</u>	<u>157</u>

PURGE DATA:		Purge Calculations:	
Date:	<u>11-09-2010</u>	1":	0.04080
Purge Method:	<u>Low Flow - bladder pump</u>	6":	1.46869
PID Reading (ppm):	<u>---</u>	2":	0.16319
Well Casing Diameter & Material:	<u>4"</u>	8":	2.61101
Total Well Depth (TD):	<u>350</u>	3":	0.36717
Static Water Level (DTW):	<u>355-34.0'</u>	4":	0.65275
Start Purge (hrs):	<u>1550</u>	10":	4.07970
End Purge (hrs):	<u>1620</u>	12":	5.87477
Total Purge Time (min):	<u>30</u>		
Total Vol. Purged (gal/L):	<u>65/5</u>		

SAMPLE COLLECTION INFORMATION:			
Analysis	Preservative	Container Requirements	Collected
TCL VOCs	HCl	40 mL CG	3
TSS	HNO ₃	500 mL PL	1
Mercury	---	250 mL PL	1

OBSERVATIONS/NOTES:

Circle if Applicable:	Signature(s):		
<table style="width: 100%;"> <tr> <td style="width: 50%;">MS/MSD</td> <td>Duplicate ID No.:</td> </tr> </table>	MS/MSD	Duplicate ID No.:	
MS/MSD	Duplicate ID No.:		



PURGE DATA SHEET

Date: 11-9-2010
Sample ID No.: RW3 - MW 1

Time (hrs)	Water Level (ft. below TOC)	Flow (mL/min)	pH (SU)	Cond. (mS/cm)	Turb. (NTU)	DO (mg/L)	Temp. °C	ORP (mV)	Comments
	Target drawdown ≤0.3'	200-500	±0.1 unit	±3%	±10%, >1 NTU	±10%	±3%	±10 mV	Stability reached when 3 consecutive readings are within this range
1550		200-300	4.54	151	N/A	1.22	12.57	203	
1555		↓	4.53	150	N/A	0.92	12.41	182	
1600		↓	4.70	151	N/A	0.55	12.38	162	
1605		↓	5.31	151	N/A	0.57	12.29	163	
1610		↓	5.40	151	N/A	0.50	12.25	158	
1615		↓	5.47	151	N/A	0.47	12.23	157	
1620		↓	5.41	151	N/A	0.44	12.24	157	

30
min

Signature(s): _____



GROUNDWATER SAMPLE LOG SHEET

page ___ of ___

Project Site Name: NWIRP Bethpage GM-38
 Project No.: EF032.300

Sample ID No.: RW 1 - MW 1
 Sample Location: Bethpage, NY
 Sampled By: GG

SAMPLING DATA:	FINAL VALUES:						
	Color (Visual)	Ph (Standard)	S.C. (mS/cm)	Turbidity (NTU)	DO (mg/l)	Temp (°C)	ORP (MV)
Time: <u>1020</u>							
Purge Method: Low Flow	<u>TURBID</u>	<u>5.81</u>	<u>269</u>	<u>N/A</u>	<u>0.30</u>	<u>14.57</u>	<u>1020</u>

PURGE DATA:

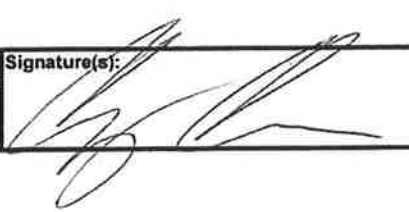
Date:	<u>11-10-10</u>	Purge Calculations:	
Purge Method:	<u>Low Flow - bladder pump</u>	1": 0.04080	6": 1.46869
PID Reading (ppm):	<u>---</u>	2": 0.16319	8": 2.61101
Well Casing Diameter & Material:	<u>4"</u>	3": 0.36717	10": 4.07970
Total Well Depth (TD):	<u>---</u>	4": 0.65275	12": 5.87477
Static Water Level (DTW):	<u>33.4</u>		
Start Purge (hrs):	<u>0940</u>		
End Purge (hrs):	<u>1020</u>		
Total Purge Time (min):	<u>40</u>		
Total Vol. Purged (gal/L):	<u>---</u>		

SAMPLE COLLECTION INFORMATION:

Analysis	Preservative	Container Requirements	Collected
TCL VOCs	HCl	40 mL CG	3
TSS	HNO ₃	500 mL PL	1
Mercury	---	250 mL PL	1

OBSERVATIONS/NOTES:

Circle if Applicable: MS/MSD Duplicate ID No.: _____

Signature(s): 



PURGE DATA SHEET

Date: 11-10-10

Sample ID No.: RW | - MW |

Time	Water Level	Flow	pH	Cond.	Turb.	DO	Temp.	ORP	Comments
(hrs)	(ft. below TOC)	(mL/min)	(SU)	(mS/cm)	(NTU)	(mg/L)	°C	(mV)	
	Target drawdown ≤0.3'	200-500	±0.1 unkl	±3%	±10%, >1 NTU	±10%	±3%	±10 mV	Stability reached when 3 consecutive readings are within this range
0940		200-300	6.46	253	N/A	1.36	14.19	92	
0945			6.51	249	N/A	1.17	14.26	91.1	
0950			6.51	250	N/A	1.09	14.28	90.6	
0955			6.10	263	N/A	0.85	14.47	98.2	
1000			5.95	264	N/A	0.90	14.48	99.1	
1005			5.90	264	N/A	0.39	14.50	100.0	
1010			5.89	264	N/A	0.38	14.49	101.2	
1015			5.80	264	N/A	0.36	14.50	102.0	
1020			5.81	264	N/A	0.36	14.51	102.0	

70 MIN

Signature(s):



GROUNDWATER SAMPLE LOG SHEET

page ___ of ___

Project Site Name: NWIRP Bethpage GM-38
Project No.: EF032.300

Sample ID No.: RW 1 - MW 3
Sample Location: Bethpage, NY
Sampled By: Greg G

SAMPLING DATA:	FINAL VALUES:						
	Color (Visual)	Ph (Standard)	S.C. (mS/cm)	Turbidity (NTU)	DO (mg/l)	Temp (°C)	ORP (MV)
Time:							
Purge Method: Low Flow	<u>Clear</u>	<u>6.90</u>	<u>129</u>	<u>N/A</u>	<u>0.62</u>	<u>13.14</u>	<u>120</u>

PURGE DATA:		Purge Calculations:	
Date:	<u>11-10-10</u>	1":	0.04080
Purge Method:	<u>Low Flow - bladder pump</u>	6":	1.46869
PID Reading (ppm):	<u>---</u>	2":	0.16319
Well Casing Diameter & Material:	<u>4"</u>	8":	2.61101
Total Well Depth (TD):	<u>43.5</u>	3":	0.36717
Static Water Level (DTW):	<u>33.5</u>	4":	0.65275
Start Purge (hrs):	<u>11:10</u>	10":	4.07970
End Purge (hrs):	<u>11:40</u>	12":	5.87477
Total Purge Time (min):	<u>30 min</u>		
Total Vol. Purged (gal/L):	<u>6 gal</u>		

SAMPLE COLLECTION INFORMATION:			
Analysis	Preservative	Container Requirements	Collected
TCL VOCs	HCl	40 mL CG	3
TSS	HNO ₃	500 mL PL	1
Mercury	--	250 mL PL	1

OBSERVATIONS/NOTES:

Circle if Applicable: MS/MSD Duplicate ID No.: _____ Signature(s): [Signature]



PURGE DATA SHEET

Date: 11-10-10
Sample ID No.: RW 1 - MW 3

Time (hrs)	Water Level (ft. below TOC)	Flow (mL/min)	pH (Std)	Cond. (mS/cm)	Turb. (NTU)	DO (mg/L)	Temp. °C	ORP (mV)	Comments
	Target drawdown $\leq 0.3'$	200-500	± 0.1 unit	$\pm 3\%$	$\pm 10\%$, > 1 NTU	$\pm 10\%$	$\pm 3\%$	± 10 mV	Stability reached when 3 consecutive readings are within this range
1110		200-300	6.11	180	N/A	4.60	13.23	110	
1115			6.13	179	N/A	2.15	13.10	119	
1120			6.19	179	N/A	1.40	13.15	120	
1125			6.43	179	N/A	0.80	13.12	119	
1130			6.40	179	N/A	0.65	13.12	120	
1135			6.39	179	N/A	0.64	13.13	120	
1140		X	6.40	179	N/A	0.36	13.14	120	

30 MIN

Signature(s):

APPENDIX D
Validation Report

VOLATILE ORGANIC COMPOUNDS
USEPA Region II – Tier II Data Validation

Project Name: Naval Weapons Industrial Reserve Plant, GM-38 Area-LTM
Location: 100 Broadway, Bethpage, NY
Project Number: EF032.300
SDG #: JA61273
Client: ECOR Solutions, Inc.
Date: 12/08/2010
Laboratory: Accutest Laboratories, Dayton, NJ
Reviewer: Samir A. Naguib

Summary:

1. Tier II data validation was performed on the data for five (5) water samples, one (1) trip blank and one (1) field blank analyzed for Volatiles by EPA Method 624.
2. The samples were collected on 11/09 and 10/2010. The samples were submitted to Accutest Laboratories, Dayton, NJ on 11/11/2010 for analysis.
3. The USEPA Region II SOP HW-24, Revision No.: 2, August 2008: Validating Volatile Organic Compounds by SW-846 Method 8260B; USEPA National Functional Guidelines for Organic Data Review, EPA 540/R-99/008, October 1999; EPA Method 624 and Quality Assurance Project Plan for GM-38 Area, Naval Weapons Industrial Reserve Plant, Bethpage, NY; September 3, 2009 were used in evaluating the Volatiles data in this summary report.
4. In general, the data are valid as reported and may be used for decision making purposes. Selected data points were qualified due to nonconformance of certain Quality Control criteria (See discussion below).

Samples:

The samples included in this review are listed below:

Client Sample ID	Laboratory Sample ID	Collection Date	Matrix	Sample Status
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	11/09/10	Water	
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	11/09/10	Water	Field Duplicate of sample NWIRP-GM38-GW-RW3-MW2-110910
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	11/09/10	Water	
NWIRP-GM38-GW-FB-110910	JA61273-4	11/09/10	Water	Field Blank
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	11/10/10	Water	
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	11/10/10	Water	
NWIRP-GM38-GW-TB-111010	JA61273-7	11/10/10	Water	Trip Blank

Sample Conditions/Problems:

1. The Traffic Reports/Chain-of-Custody Records, Sampling Report and/or Laboratory Case Narrative did not indicate any problems with sample receipt, condition of samples, analytical problems or special circumstances affecting the quality of the data. No qualifications were required.

Holding Times:

1. All water samples were analyzed within 14days from sample collection. No qualifications were required.
2. All water samples were properly preserved (pH<2.0). No qualifications were required.

GC/MS Tuning:

1. All of the BFB tunes in the initial and continuing calibrations met the percent relative abundance criteria. No qualifications were required.

Initial Calibration:

1. Initial calibration curve analyzed on 10/19/2010 (GCMST) exhibited acceptable %RSD and average RRF values for all compounds. No qualifications were required.

Initial Calibration Verification (ICV):

1. Initial calibration verification analyzed on 10/19/2010 (GCMST) exhibited acceptable %Ds ($\leq 25.0\%$). No qualifications were required.

Continuing Calibration Verification (CCV):

1. CCV analyzed on 11/19/2010 @10:54AM (GCMST) exhibited acceptable %Ds ($\leq 15.0\%$) for all compounds. No qualifications were required.

Surrogates:

1. All surrogates %REC's values for all water samples and associated QC were within the laboratory control limits. No qualifications were required.

Internal Standard (IS) Area Performance:

1. All samples exhibited acceptable area count for all five internal standards. No qualifications were required.

Method Blank (MB), Storage Blank (SB), Trip Blank (TB), Field Blank (FB), Rinsate Blank (RB) and Equipment Blank (EB):

1. Method Blank (VT6088-MB1) analyzed on 11/19/2010 was free of contamination. No qualifications were required.

Method Blank (MB), Storage Blank (SB), Trip Blank (TB), Field Blank (FB), Rinsate Blank (RB) and Equipment Blank (EB) (cont.):

2. Field Blank (NWIRP-GM38-GW-FB-110910) (JA61273-4) was analyzed on 11/19/2010.

Compound	Result (µg/l)	Action Level (CRQL)* (µg/l)	Sample Affected	Action
Cis-1,2-Dichloroethene	0.30	1.0	NWIRP-GM38-GW-RW3-MW2-110910	U
			NWIRP-GM38-GW-RW3-MW2-DUP	U
			NWIRP-GM38-GW-RW3-MW1-110910	U
			NWIRP-GM38-GW-RW1-MW3-111010	U
1,2-Dichloroethene (total)	0.30	1.0	NWIRP-GM38-GW-RW3-MW2-110910	U
			NWIRP-GM38-GW-RW3-MW2-DUP	U
			NWIRP-GM38-GW-RW3-MW1-110910	U
			NWIRP-GM38-GW-RW1-MW3-111010	U
Trichloroethene	0.85	1.0	None	None

*= If sample concentration less than the Action Level (AL), then sample result qualified as non-detect (U). If sample concentration greater than the Action Level (AL) or sample result was not detected, no qualifications/action required

3. Trip Blank (NWIRP-GM38-GW-TB-111010) (JA61273-7) analyzed on 11/19/2010 was free of contamination. No qualifications were required.

Laboratory Control Sample (LCS)/ Laboratory Control Sample Duplicate (LCSD):

1. Laboratory Control Sample (VT6088-BS) was analyzed on 11/19/2010. All %REC's were within the laboratory control limits. No qualifications were required.

Field Duplicate:

1. Sample NWIRP-GM38-GW-RW3-MW2-DUP (JA61273-2) was collected as field duplicate for sample NWIRP-GM38-GW-RW3-MW2-110910 (JA61273-1). Trichloroethene RPD was <50%. No qualifications were required.

Field Sample	Analyte	Analytical Method	Result	Units	Field Duplicate	Result	Units	RPD	Qualifier
NWIRP-GM38-GW-RW3-MW2-110910	Trichloroethene	EPA 624	60.9	µg/l	NWIRP-GM38-GW-RW3-MW2-DUP	58.2	µg/l	4.5	None

Matrix Spike (MS)/ Matrix Spike Duplicate (MSD):

1. Matrix Spike (MS) and Matrix Spike Duplicate (MSD) were performed on sample NWIRP-GM38-GW-RW3-MW1-110910 (JA61273-3). All %RECs and RPDs were within the laboratory control limits. No qualifications were required.

Compound Quantitation and Reported Contract Required Quantitation Limits (CRQLs):

1. All results were within the linear calibration range. No qualifications were required.

Target Compound Identification:

1. All Relative Retention Times (RRTs) of the reported compounds were within ± 0.06 RRT units of the standard (opening CCV).
2. Sample compound spectra were compared against the laboratory standard spectra.
3. No QC deviations were observed.

Comments:

1. Validation qualifiers (if required) were entered into the EDD for SDG: JA61273.

TRACE METALS
USEPA Region II – Tier II Data Validation

Project Name: Naval Weapons Industrial Reserve Plant, GM-38 Area-LTM
Location: 100 Broadway, Bethpage, NY
Project Number: EF032.300
SDG #: JA61273
Client: ECOR Solutions, Inc.
Date: 12/08/2010
Laboratory: Accutest Laboratories, Dayton, NJ
Reviewer: Samir A. Naguib

Summary:

1. Tier II data validation was performed on the data for five (5) water samples and one (1) field blank analyzed for Mercury by SW-846 Method 7470A.
2. The samples were collected on 11/09 and 10/2010. The samples were submitted to Accutest Laboratories, Dayton, NJ on 11/11/2010 for analysis.
3. The USEPA Region II SOP No. HW-2, Revision 13, September 2006, for Evaluation of Metals Data for Contract Laboratory Program (CLP), based on SOW-ILM05.3 (SOP Revision 13) and Quality Assurance Project Plan for GM-38 Area, Naval Weapons Industrial Reserve Plant, Bethpage, NY; September 3, 2009 were used in evaluating the Mercury data in this summary report.
4. In general, the data are valid as reported and may be used for decision making purposes. Selected data points were qualified due to nonconformance of certain Quality Control criteria (See discussion below).

Samples:

The samples included in this review are listed below:

Client Sample ID	Laboratory Sample ID	Collection Date	Matrix	Sample Status
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	11/09/10	Water	
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	11/09/10	Water	Field Duplicate of sample NWIRP-GM38-GW-RW3-MW2-110910
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	11/09/10	Water	
NWIRP-GM38-GW-FB-110910	JA61273-4	11/09/10	Water	Field Blank
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	11/10/10	Water	
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	11/10/10	Water	

Sample Conditions/Problems:

1. The Traffic Reports/Chain-of-Custody Records, Sampling Report and/or Laboratory Case Narrative did not indicate any problems with sample receipt, condition of samples, analytical problems or special circumstances affecting the quality of the data. No qualifications were required.

Holding Times:

1. All water samples were digested and analyzed within the 28days holding times for Mercury. No qualifications were required.

Initial and Continuing Calibration Verification (ICV and CCV):

Mercury:

1. The correlation coefficient for the calibration curve for mercury was ≥ 0.995 . No qualifications were required.
2. ICV and CCVs were analyzed at the appropriate frequency. All ICVs and CCVs %REC values were within the QC limits (80-120%). No qualifications were required.

CRQL Check Standard (CRI):

1. The CRI %REC analyzed on 12/01/2010 was within the control limits (50-150%). No qualifications were required.

Blanks (Method Blank, ICB and CCB):

1. All ICB and CCBs were free of contamination. No qualifications were required.
2. Method Blank (MP55939) digested on 12/01/2010 was free of contamination. No qualifications were required.

Field Blank (FB) and Equipment Blank (EB):

1. Field Blank (NWIRP-GM38-GW-FB-110910) (JA61273-4) analyzed on 12/01/2010 was free of contamination. No qualifications were required.

Laboratory Control Sample (LCS)/ Laboratory Control Sample Duplicate (LCSD):

1. Mercury %REC in Laboratory Control Sample (MP55939) was within the laboratory control limits. No qualifications were required.

Field Duplicate:

1. Sample NWIRP-GM38-GW-RW3-MW2-DUP (JA61273-2) was collected as field duplicate for sample NWIRP-GM38-GW-RW3-MW2-110910 (JA61273-1). Both samples were reported as non-detects. No qualifications were required.

Matrix Spike (MS)/ Matrix Spike Duplicate (MSD):

1. Matrix Spike (MS) and Matrix Spike Duplicate (MSD) were performed on sample NWIRP-GM38-GW-RW3-MW1-110910 (JA61273-3). All %RECs and RPD were within the laboratory control limits. No qualifications were required.

Laboratory Duplicate:

1. MS and MSD were performed instead to calculate RPD.

Compound Quantitation and Reported Detection Limits:

1. All sample results were reported within the linear calibration range.

Comments:

1. Validation qualifiers (if required) were entered into the EDD for SDG: JA61273.

GENERAL CHEMISTRY
USEPA Region II – Tier II Data Validation

Project Name: Naval Weapons Industrial Reserve Plant, GM-38 Area-LTM
Location: 100 Broadway, Bethpage, NY
Project Number: EF032.300
SDG #: JA61273
Client: ECOR Solutions, Inc.
Date: 12/08/2010
Laboratory: Accutest Laboratories, Dayton, NJ
Reviewer: Samir A. Naguib

Summary:

1. Tier II data validation was performed on the data for five (5) water samples and one (1) field blank analyzed for Solids, Total Suspended (TSS) by SM20th 2540D.
2. The samples were collected on 11/09 and 10/2010. The samples were submitted to Accutest Laboratories, Dayton, NJ on 11/11/2010 for analysis.
3. The USEPA Region II SOP No. HW-2, Revision 13, September 2006, for Evaluation of Metals Data for Contract Laboratory Program (CLP), based on SOW-ILM05.3 (SOP Revision 13) was used in evaluating the Solids, Total Suspended data in this summary report.
4. In general, the data are valid as reported and may be used for decision making purposes. Selected data points were qualified due to nonconformance of certain Quality Control criteria (See discussion below).

Samples:

The samples included in this review are listed below:

Client Sample ID	Laboratory Sample ID	Collection Date	Matrix	Sample Status
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	11/09/10	Water	
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	11/09/10	Water	Field Duplicate of sample NWIRP-GM38-GW-RW3-MW2-110910
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	11/09/10	Water	
NWIRP-GM38-GW-FB-110910	JA61273-4	11/09/10	Water	Field Blank
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	11/10/10	Water	
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	11/10/10	Water	

Sample Conditions/Problems:

1. The Traffic Reports/Chain-of-Custody Records, Sampling Report and/or Laboratory Case Narrative did not indicate any problems with sample receipt, condition of samples, analytical problems or special circumstances affecting the quality of the data. No qualifications were required.

Holding Times:

1. All water samples were analyzed within the 7days holding times for Solids, Total Suspended. No qualifications were required.

Method Blank (MB), Storage Blank (SB), Field Blank (FB), Rinsate Blank (RB) and Equipment Blank (EB):

1. Method Blanks associated with Batch ID: GN44590 and GN44684 were free of contamination. No qualifications were required.
2. Field Blank (NWIRP-GM38-GW-FB-110910) (JA61273-4) analyzed on 11/12/2010 was free of contamination. No qualifications were required.

Field Duplicate:

1. Sample NWIRP-GM38-GW-RW3-MW2-DUP (JA61273-2) was collected as field duplicate for sample NWIRP-GM38-GW-RW3-MW2-110910 (JA61273-1).

Field Sample	Analyte	Analytical Method	Result	Units	Field Duplicate	Result	Units	RPD	Qualifier
NWIRP-GM38-GW-RW3-MW2-110910	TSS	SM20 th 2540	10.0	mg/l	NWIRP-GM38-GW-RW3-MW2-DUP	<4.0	mg/l	N/A	J/UJ

N/A= Not Applicable

Laboratory Duplicate:

1. Laboratory duplicate was performed on sample NWIRP-GM38-GW-RW3-MW2-DUP (JA61273-2). Both samples were reported as non-detects. No qualifications were required.
2. Laboratory duplicate was performed on sample NWIRP-GM38-GW-RW3-MW1-110910 (JA61273-3). Both samples were reported as non-detects. No qualifications were required.

Compound Quantitation and Reported Detection Limits:

1. All sample results were reported within the linear calibration range.

Comments:

1. Validation qualifiers (if required) were entered into the EDD for SDG: JA61273.



NAVAL WEAPONS INDUSTRIAL RESERVE PLANT
BETHPAGE-GM-38 AREA-LTM
100 BROADWAY, BETHPAGE, NY
DATA SUMMARY TABLE
AQUEOUS
SDG: JA61273

Sample Name	Lab ID	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	1,1,1-Trichloroethane		ug/l	U	0.21	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	1,1,2,2-Tetrachloroethane		ug/l	U	0.16	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	1,1,2-Trichloroethane	0.27	ug/l	J	0.21	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	1,1-Dichloroethane		ug/l	U	0.30	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	1,1-Dichloroethene		ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	1,2-Dichloroethane		ug/l	U	0.53	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	1,2-Dichloroethene (total)	0.92	ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	1,2-Dichloropropane		ug/l	U	0.12	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	2-Butanone (MEK)		ug/l	U	1.7	5.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	2-Hexanone		ug/l	U	1.7	5.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	4-Methyl-2-pentanone(MIBK)		ug/l	U	1.4	5.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Acetone		ug/l	U	3.9	5.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Benzene		ug/l	U	0.27	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Bromodichloromethane		ug/l	U	0.29	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Bromoform		ug/l	U	0.19	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Bromomethane		ug/l	U	0.23	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Carbon disulfide		ug/l	U	0.25	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Carbon tetrachloride		ug/l	U	0.14	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Chlorobenzene		ug/l	U	0.26	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Chloroethane		ug/l	U	0.47	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Chloroform		ug/l	U	0.17	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Chloromethane		ug/l	U	0.16	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	cis-1,2-Dichloroethene	0.92	ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	cis-1,3-Dichloropropene		ug/l	U	0.19	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Dibromochloromethane		ug/l	U	0.23	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Ethylbenzene		ug/l	U	0.22	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Methylene chloride		ug/l	U	0.17	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Styrene		ug/l	U	1.0	2.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Tetrachloroethene		ug/l	U	0.51	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Toluene		ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	trans-1,2-Dichloroethene		ug/l	U	0.35	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	trans-1,3-Dichloropropene		ug/l	U	0.20	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Trichloroethene	60.9	ug/l		0.25	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Vinyl chloride		ug/l	U	0.16	1.0



NAVAL WEAPONS INDUSTRIAL RESERVE PLANT
BETHPAGE-GM-38 AREA-LTM
100 BROADWAY, BETHPAGE, NY
DATA SUMMARY TABLE
AQUEOUS
SDG: JA61273

Sample Name	Lab ID	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	EPA624	11/09/10	1	Xylenes (total)		ug/l	U	0.35	1.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	SM202540D	11/09/10	1	Solids, Total Suspended	10.0	mg/l	J	4.0	4.0
NWIRP-GM38-GW-RW3-MW2-110910	JA61273-1	SW8467470A	11/09/10	1	Mercury		ug/l	U	0.20	0.20
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	1,1,1-Trichloroethane		ug/l	U	0.21	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	1,1,2,2-Tetrachloroethane		ug/l	U	0.16	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	1,1,2-Trichloroethane	0.25	ug/l	J	0.21	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	1,1-Dichloroethane		ug/l	U	0.30	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	1,1-Dichloroethene		ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	1,2-Dichloroethane		ug/l	U	0.53	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	1,2-Dichloroethene (total)	0.92	ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	1,2-Dichloropropane		ug/l	U	0.12	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	2-Butanone (MEK)		ug/l	U	1.7	5.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	2-Hexanone		ug/l	U	1.7	5.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	4-Methyl-2-pentanone(MIBK)		ug/l	U	1.4	5.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Acetone		ug/l	U	3.9	5.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Benzene		ug/l	U	0.27	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Bromodichloromethane		ug/l	U	0.29	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Bromoform		ug/l	U	0.19	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Bromomethane		ug/l	U	0.23	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Carbon disulfide		ug/l	U	0.25	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Carbon tetrachloride		ug/l	U	0.14	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Chlorobenzene		ug/l	U	0.26	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Chloroethane		ug/l	U	0.47	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Chloroform		ug/l	U	0.17	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Chloromethane		ug/l	U	0.16	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	cis-1,2-Dichloroethene	0.92	ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	cis-1,3-Dichloropropene		ug/l	U	0.19	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Dibromochloromethane		ug/l	U	0.23	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Ethylbenzene		ug/l	U	0.22	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Methylene chloride		ug/l	U	0.17	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Styrene		ug/l	U	1.0	2.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Tetrachloroethene		ug/l	U	0.51	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Toluene		ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	trans-1,2-Dichloroethene		ug/l	U	0.35	1.0



NAVAL WEAPONS INDUSTRIAL RESERVE PLANT
BETHPAGE-GM-38 AREA-LTM
100 BROADWAY, BETHPAGE, NY
DATA SUMMARY TABLE
AQUEOUS
SDG: JA61273

Sample Name	Lab ID	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	trans-1,3-Dichloropropene		ug/l	U	0.20	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Trichloroethene	58.2	ug/l		0.25	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Vinyl chloride		ug/l	U	0.16	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	EPA624	11/09/10	1	Xylenes (total)		ug/l	U	0.35	1.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	SM202540D	11/09/10	1	Solids, Total Suspended		mg/l	UJ	4.0	4.0
NWIRP-GM38-GW-RW3-MW2-DUP	JA61273-2	SW8467470A	11/09/10	1	Mercury		ug/l	U	0.20	0.20
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	1,1,1-Trichloroethane	1.2	ug/l		0.21	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	1,1,2,2-Tetrachloroethane		ug/l	U	0.16	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	1,1,2-Trichloroethane		ug/l	U	0.21	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	1,1-Dichloroethane	1.4	ug/l		0.30	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	1,1-Dichloroethene	1.2	ug/l		0.24	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	1,2-Dichloroethane		ug/l	U	0.53	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	1,2-Dichloroethene (total)	0.45	ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	1,2-Dichloropropane		ug/l	U	0.12	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	2-Butanone (MEK)		ug/l	U	1.7	5.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	2-Hexanone		ug/l	U	1.7	5.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	4-Methyl-2-pentanone(MIBK)		ug/l	U	1.4	5.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Acetone		ug/l	U	3.9	5.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Benzene		ug/l	U	0.27	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Bromodichloromethane		ug/l	U	0.29	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Bromoform		ug/l	U	0.19	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Bromomethane		ug/l	U	0.23	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Carbon disulfide		ug/l	U	0.25	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Carbon tetrachloride	0.19	ug/l	J	0.14	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Chlorobenzene		ug/l	U	0.26	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Chloroethane		ug/l	U	0.47	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Chloroform	0.20	ug/l	J	0.17	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Chloromethane		ug/l	U	0.16	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	cis-1,2-Dichloroethene	0.45	ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	cis-1,3-Dichloropropene		ug/l	U	0.19	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Dibromochloromethane		ug/l	U	0.23	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Ethylbenzene		ug/l	U	0.22	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Methylene chloride		ug/l	U	0.17	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Styrene		ug/l	U	1.0	2.0



NAVAL WEAPONS INDUSTRIAL RESERVE PLANT
BETHPAGE-GM-38 AREA-LTM
100 BROADWAY, BETHPAGE, NY
DATA SUMMARY TABLE
AQUEOUS
SDG: JA61273

Sample Name	Lab ID	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Tetrachloroethene	1.5	ug/l		0.51	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Toluene		ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	trans-1,2-Dichloroethene		ug/l	U	0.35	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	trans-1,3-Dichloropropene		ug/l	U	0.20	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Trichloroethene	77.6	ug/l		0.25	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Vinyl chloride		ug/l	U	0.16	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	EPA624	11/09/10	1	Xylenes (total)		ug/l	U	0.35	1.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	SM202540D	11/09/10	1	Solids, Total Suspended		mg/l	U	4.0	4.0
NWIRP-GM38-GW-RW3-MW1-110910	JA61273-3	SW8467470A	11/09/10	1	Mercury		ug/l	U	0.20	0.20
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	1,1,1-Trichloroethane		ug/l	U	0.21	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	1,1,2,2-Tetrachloroethane		ug/l	U	0.16	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	1,1,2-Trichloroethane		ug/l	U	0.21	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	1,1-Dichloroethane		ug/l	U	0.30	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	1,1-Dichloroethene		ug/l	U	0.24	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	1,2-Dichloroethane		ug/l	U	0.53	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	1,2-Dichloroethene (total)	0.30	ug/l		0.24	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	1,2-Dichloropropane		ug/l	U	0.12	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	2-Butanone (MEK)		ug/l	U	1.7	5.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	2-Hexanone		ug/l	U	1.7	5.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	4-Methyl-2-pentanone(MIBK)		ug/l	U	1.4	5.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Acetone		ug/l	U	3.9	5.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Benzene		ug/l	U	0.27	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Bromodichloromethane		ug/l	U	0.29	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Bromoform		ug/l	U	0.19	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Bromomethane		ug/l	U	0.23	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Carbon disulfide		ug/l	U	0.25	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Carbon tetrachloride		ug/l	U	0.14	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Chlorobenzene		ug/l	U	0.26	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Chloroethane		ug/l	U	0.47	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Chloroform		ug/l	U	0.17	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Chloromethane		ug/l	U	0.16	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	cis-1,2-Dichloroethene	0.30	ug/l	J	0.24	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	cis-1,3-Dichloropropene		ug/l	U	0.19	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Dibromochloromethane		ug/l	U	0.23	1.0



**NAVAL WEAPONS INDUSTRIAL RESERVE PLANT
BETHPAGE-GM-38 AREA-LTM
100 BROADWAY, BETHPAGE, NY
DATA SUMMARY TABLE
AQUEOUS
SDG: JA61273**

Sample Name	Lab ID	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Ethylbenzene		ug/l	U	0.22	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Methylene chloride		ug/l	U	0.17	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Styrene		ug/l	U	1.0	2.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Tetrachloroethene		ug/l	U	0.51	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Toluene		ug/l	U	0.24	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	trans-1,2-Dichloroethene		ug/l	U	0.35	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	trans-1,3-Dichloropropene		ug/l	U	0.20	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Trichloroethene	0.85	ug/l	J	0.25	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Vinyl chloride		ug/l	U	0.16	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	EPA624	11/09/10	1	Xylenes (total)		ug/l	U	0.35	1.0
NWIRP-GM38-GW-FB-110910	JA61273-4	SM202540D	11/09/10	1	Solids, Total Suspended		mg/l	U	4.0	4.0
NWIRP-GM38-GW-FB-110910	JA61273-4	SW8467470A	11/09/10	1	Mercury		ug/l	U	0.20	0.20
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	1,1,1-Trichloroethane	0.53	ug/l	J	0.21	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	1,1,2,2-Tetrachloroethane		ug/l	U	0.16	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	1,1,2-Trichloroethane		ug/l	U	0.21	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	1,1-Dichloroethane	3.0	ug/l		0.30	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	1,1-Dichloroethene	1.7	ug/l		0.24	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	1,2-Dichloroethane		ug/l	U	0.53	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	1,2-Dichloroethene (total)	108	ug/l		0.24	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	1,2-Dichloropropane		ug/l	U	0.12	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	2-Butanone (MEK)		ug/l	U	1.7	5.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	2-Hexanone		ug/l	U	1.7	5.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	4-Methyl-2-pentanone(MIBK)		ug/l	U	1.4	5.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Acetone		ug/l	U	3.9	5.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Benzene		ug/l	U	0.27	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Bromodichloromethane		ug/l	U	0.29	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Bromoform		ug/l	U	0.19	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Bromomethane		ug/l	U	0.23	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Carbon disulfide		ug/l	U	0.25	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Carbon tetrachloride	0.17	ug/l	J	0.14	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Chlorobenzene		ug/l	U	0.26	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Chloroethane		ug/l	U	0.47	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Chloroform	0.56	ug/l	J	0.17	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Chloromethane		ug/l	U	0.16	1.0



**NAVAL WEAPONS INDUSTRIAL RESERVE PLANT
BETHPAGE-GM-38 AREA-LTM
100 BROADWAY, BETHPAGE, NY
DATA SUMMARY TABLE
AQUEOUS
SDG: JA61273**

Sample Name	Lab ID	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	cis-1,2-Dichloroethene	107	ug/l		0.24	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	cis-1,3-Dichloropropene		ug/l	U	0.19	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Dibromochloromethane		ug/l	U	0.23	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Ethylbenzene		ug/l	U	0.22	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Methylene chloride		ug/l	U	0.17	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Styrene		ug/l	U	1.0	2.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Tetrachloroethene		ug/l	U	0.51	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Toluene		ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	trans-1,2-Dichloroethene	1.3	ug/l		0.35	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	trans-1,3-Dichloropropene		ug/l	U	0.20	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Trichloroethene	84.2	ug/l		0.25	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Vinyl chloride	0.17	ug/l	J	0.16	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	EPA624	11/10/10	1	Xylenes (total)		ug/l	U	0.35	1.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	SM202540D	11/10/10	1	Solids, Total Suspended		mg/l	U	4.0	4.0
NWIRP-GM38-GW-RW1-MW1-111010	JA61273-5	SW8467470A	11/10/10	1	Mercury		ug/l	U	0.20	0.20
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	1,1,1-Trichloroethane	0.26	ug/l	J	0.21	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	1,1,2,2-Tetrachloroethane		ug/l	U	0.16	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	1,1,2-Trichloroethane	0.55	ug/l	J	0.21	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	1,1-Dichloroethane	2.3	ug/l		0.30	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	1,1-Dichloroethene	0.28	ug/l	J	0.24	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	1,2-Dichloroethane		ug/l	U	0.53	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	1,2-Dichloroethene (total)	0.55	ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	1,2-Dichloropropane		ug/l	U	0.12	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	2-Butanone (MEK)		ug/l	U	1.7	5.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	2-Hexanone		ug/l	U	1.7	5.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	4-Methyl-2-pentanone(MIBK)		ug/l	U	1.4	5.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Acetone		ug/l	U	3.9	5.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Benzene		ug/l	U	0.27	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Bromodichloromethane		ug/l	U	0.29	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Bromoform		ug/l	U	0.19	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Bromomethane		ug/l	U	0.23	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Carbon disulfide		ug/l	U	0.25	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Carbon tetrachloride		ug/l	U	0.14	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Chlorobenzene		ug/l	U	0.26	1.0



NAVAL WEAPONS INDUSTRIAL RESERVE PLANT
BETHPAGE-GM-38 AREA-LTM
100 BROADWAY, BETHPAGE, NY
DATA SUMMARY TABLE
AQUEOUS
SDG: JA61273

Sample Name	Lab ID	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Chloroethane		ug/l	U	0.47	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Chloroform	0.69	ug/l	J	0.17	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Chloromethane		ug/l	U	0.16	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	cis-1,2-Dichloroethene	0.55	ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	cis-1,3-Dichloropropene		ug/l	U	0.19	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Dibromochloromethane		ug/l	U	0.23	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Ethylbenzene		ug/l	U	0.22	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Methylene chloride		ug/l	U	0.17	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Styrene		ug/l	U	1.0	2.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Tetrachloroethene		ug/l	U	0.51	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Toluene		ug/l	U	0.24	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	trans-1,2-Dichloroethene		ug/l	U	0.35	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	trans-1,3-Dichloropropene		ug/l	U	0.20	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Trichloroethene	0.91	ug/l	J	0.25	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Vinyl chloride		ug/l	U	0.16	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	EPA624	11/10/10	1	Xylenes (total)		ug/l	U	0.35	1.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	SM202540D	11/10/10	1	Solids, Total Suspended		mg/l	U	4.0	4.0
NWIRP-GM38-GW-RW1-MW3-111010	JA61273-6	SW8467470A	11/10/10	1	Mercury		ug/l	U	0.20	0.20
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	1,1,1-Trichloroethane		ug/l	U	0.21	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	1,1,2,2-Tetrachloroethane		ug/l	U	0.16	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	1,1,2-Trichloroethane		ug/l	U	0.21	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	1,1-Dichloroethane		ug/l	U	0.30	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	1,1-Dichloroethene		ug/l	U	0.24	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	1,2-Dichloroethane		ug/l	U	0.53	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	1,2-Dichloroethene (total)		ug/l	U	0.24	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	1,2-Dichloropropane		ug/l	U	0.12	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	2-Butanone (MEK)		ug/l	U	1.7	5.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	2-Hexanone		ug/l	U	1.7	5.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	4-Methyl-2-pentanone(MIBK)		ug/l	U	1.4	5.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Acetone		ug/l	U	3.9	5.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Benzene		ug/l	U	0.27	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Bromodichloromethane		ug/l	U	0.29	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Bromoform		ug/l	U	0.19	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Bromomethane		ug/l	U	0.23	1.0



NAVAL WEAPONS INDUSTRIAL RESERVE PLANT
BETHPAGE-GM-38 AREA-LTM
100 BROADWAY, BETHPAGE, NY
DATA SUMMARY TABLE
AQUEOUS
SDG: JA61273

Sample Name	Lab ID	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Carbon disulfide		ug/l	U	0.25	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Carbon tetrachloride		ug/l	U	0.14	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Chlorobenzene		ug/l	U	0.26	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Chloroethane		ug/l	U	0.47	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Chloroform		ug/l	U	0.17	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Chloromethane		ug/l	U	0.16	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	cis-1,2-Dichloroethene		ug/l	U	0.24	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	cis-1,3-Dichloropropene		ug/l	U	0.19	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Dibromochloromethane		ug/l	U	0.23	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Ethylbenzene		ug/l	U	0.22	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Methylene chloride		ug/l	U	0.17	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Styrene		ug/l	U	1.0	2.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Tetrachloroethene		ug/l	U	0.51	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Toluene		ug/l	U	0.24	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	trans-1,2-Dichloroethene		ug/l	U	0.35	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	trans-1,3-Dichloropropene		ug/l	U	0.20	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Trichloroethene		ug/l	U	0.25	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Vinyl chloride		ug/l	U	0.16	1.0
NWIRP-GM38-GW-TB-111010	JA61273-7	EPA624	11/10/10	1	Xylenes (total)		ug/l	U	0.35	1.0

APPENDIX E
GW Laboratory Analytical Data Package

Sample Summary

Ecor Solutions

Job No: JA60709

GM-38, 100 Broadway, Bethpage, NY
Project No: EF032-300

Sample Number	Collected Date	Time By	Received	Matrix Code	Type	Client Sample ID
JA60709-1	11/03/10	10:48 GG	11/04/10	AQ	Ground Water	NW1RP-GM-38-GW-RW3-MW3-110310
JA60709-2	11/03/10	09:40 GG	11/04/10	AQ	Ground Water	NW1RP-GM-38-GW-RW2-MW1-110310
JA60709-3	11/03/10	11:50 GG	11/04/10	AQ	Ground Water	NW1RP-GM-38-GW-RW3-MW4-110310
JA60709-4	11/03/10	11:50 GG	11/04/10	AQ	Trip Blank Water	NW1RP-GM-38-GW-TB-110310

Report of Analysis

Client Sample ID:	NW1RP-GM-38-GW-RW3-MW3-110310		
Lab Sample ID:	JA60709-1	Date Sampled:	11/03/10
Matrix:	AQ - Ground Water	Date Received:	11/04/10
Method:	EPA 624	Percent Solids:	n/a
Project:	GM-38, 100 Broadway, Bethpage, NY		

Run #	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	T152919.D	1	11/12/10	JNW	n/a	n/a	VT6075
Run #2							

Run #	Purge Volume
Run #1	5.0 ml
Run #2	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	5.0	3.9	ug/l	
71-43-2	Benzene	ND	1.0	0.27	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.29	ug/l	
75-25-2	Bromoform	ND	1.0	0.19	ug/l	
74-83-9	Bromomethane	ND	1.0	0.23	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	1.7	ug/l	
75-15-0	Carbon disulfide	ND	1.0	0.25	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.14	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.26	ug/l	
75-00-3	Chloroethane	ND	1.0	0.47	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	1.0	0.16	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.23	ug/l	
75-34-3	1,1-Dichloroethane	1.0	1.0	0.30	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.53	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.24	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.24	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.35	ug/l	
540-59-0	1,2-Dichloroethene (total)	ND	1.0	0.24	ug/l	
78-87-5	1,2-Dichloropropane	ND	1.0	0.12	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	0.19	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	0.20	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.22	ug/l	
591-78-6	2-Hexanone	ND	5.0	1.7	ug/l	
108-10-1	4-Methyl-2-pentanone(MIBK)	ND	5.0	1.4	ug/l	
75-09-2	Methylene chloride	ND	1.0	0.17	ug/l	
100-42-5	Styrene	ND	2.0	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	0.16	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.51	ug/l	
108-88-3	Toluene	ND	1.0	0.24	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.21	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.21	ug/l	

ND = Not detected MDL - Method Detection Limit

RL = Reporting Limit

E = Indicates value exceeds calibration range

J = Indicates an estimated value

B = Indicates analyte found in associated method blank

N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	NW1RP-GM-38-GW-RW3-MW3-110310	
Lab Sample ID:	JA60709-1	Date Sampled: 11/03/10
Matrix:	AQ - Ground Water	Date Received: 11/04/10
Method:	EPA 624	Percent Solids: n/a
Project:	GM-38, 100 Broadway, Bethpage, NY	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
79-01-6	Trichloroethene	8.5	1.0	0.25	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.16	ug/l	
1330-20-7	Xylenes (total)	ND	1.0	0.35	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
17060-07-0	1,2-Dichloroethane-D4 (SUR)	109%		64-135%
2037-26-5	Toluene-D8 (SUR)	100%		76-117%
460-00-4	4-Bromofluorobenzene (SUR)	100%		72-122%
1868-53-7	Dibromofluoromethane (S)	102%		76-120%

ND = Not detected MDL - Method Detection Limit
 RL = Reporting Limit
 E = Indicates value exceeds calibration range

J = Indicates an estimated value
 B = Indicates analyte found in associated method blank
 N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID: NW1RP-GM-38-GW-RW3-MW3-110310	
Lab Sample ID: JA60709-1	Date Sampled: 11/03/10
Matrix: AQ - Ground Water	Date Received: 11/04/10
	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

Total Metals Analysis

Analyte	Result	RL	Units	DF	Prep	Analyzed By	Method	Prep Method
Mercury	< 0.20	0.20	ug/l	1	11/23/10	11/23/10 VK	EPA 245.1 ¹	EPA 245.1 ²

(1) Instrument QC Batch: MA25411

(2) Prep QC Batch: MP55761

Report of Analysis

Client Sample ID: NW1RP-GM-38-GW-RW3-MW3-110310	Date Sampled: 11/03/10
Lab Sample ID: JA60709-1	Date Received: 11/04/10
Matrix: AQ - Ground Water	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

General Chemistry

Analyte	Result	RL	Units	DF	Analyzed	By	Method
Solids, Total Suspended	< 4.0	4.0	mg/l	1	11/08/10	DD	SM20 2540D

RL = Reporting Limit

Report of Analysis

Client Sample ID:	NW1RP-GM-38-GW-RW2-MW1-110310		
Lab Sample ID:	JA60709-2	Date Sampled:	11/03/10
Matrix:	AQ - Ground Water	Date Received:	11/04/10
Method:	EPA 624	Percent Solids:	n/a
Project:	GM-38, 100 Broadway, Bethpage, NY		

Run #	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	T152920.D	1	11/12/10	JNW	n/a	n/a	VT6075
Run #2							

Run #	Purge Volume
Run #1	5.0 ml
Run #2	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	5.0	3.9	ug/l	
71-43-2	Benzene	0.58	1.0	0.27	ug/l	J
75-27-4	Bromodichloromethane	ND	1.0	0.29	ug/l	
75-25-2	Bromoform	ND	1.0	0.19	ug/l	
74-83-9	Bromomethane	ND	1.0	0.23	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	1.7	ug/l	
75-15-0	Carbon disulfide	ND	1.0	0.25	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.14	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.26	ug/l	
75-00-3	Chloroethane	ND	1.0	0.47	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	1.0	0.16	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.23	ug/l	
75-34-3	1,1-Dichloroethane	0.42	1.0	0.30	ug/l	J
107-06-2	1,2-Dichloroethane	ND	1.0	0.53	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.24	ug/l	
156-59-2	cis-1,2-Dichloroethene	0.55	1.0	0.24	ug/l	J
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.35	ug/l	
540-59-0	1,2-Dichloroethene (total)	0.55	1.0	0.24	ug/l	J
78-87-5	1,2-Dichloropropane	ND	1.0	0.12	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	0.19	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	0.20	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.22	ug/l	
591-78-6	2-Hexanone	ND	5.0	1.7	ug/l	
108-10-1	4-Methyl-2-pentanone(MIBK)	ND	5.0	1.4	ug/l	
75-09-2	Methylene chloride	ND	1.0	0.17	ug/l	
100-42-5	Styrene	ND	2.0	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	0.16	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.51	ug/l	
108-88-3	Toluene	0.50	1.0	0.24	ug/l	J
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.21	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.21	ug/l	

ND = Not detected MDL - Method Detection Limit

RL = Reporting Limit

E = Indicates value exceeds calibration range

J = Indicates an estimated value

B = Indicates analyte found in associated method blank

N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID: NW1RP-GM-38-GW-RW2-MW1-110310	
Lab Sample ID: JA60709-2	Date Sampled: 11/03/10
Matrix: AQ - Ground Water	Date Received: 11/04/10
Method: EPA 624	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.16	ug/l	
1330-20-7	Xylenes (total)	ND	1.0	0.35	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
17060-07-0	1,2-Dichloroethane-D4 (SUR)	105%		64-135%
2037-26-5	Toluene-D8 (SUR)	98%		76-117%
460-00-4	4-Bromofluorobenzene (SUR)	100%		72-122%
1868-53-7	Dibromofluoromethane (S)	99%		76-120%

ND = Not detected MDL - Method Detection Limit
 RL = Reporting Limit
 E = Indicates value exceeds calibration range

J = Indicates an estimated value
 B = Indicates analyte found in associated method blank
 N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID: NW1RP-GM-38-GW-RW2-MW1-110310	Date Sampled: 11/03/10
Lab Sample ID: JA60709-2	Date Received: 11/04/10
Matrix: AQ - Ground Water	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

Total Metals Analysis

Analyte	Result	RL	Units	DF	Prep	Analyzed By	Method	Prep Method
Mercury	< 0.20	0.20	ug/l	1	11/23/10	11/23/10 VK	EPA 245.1 ¹	EPA 245.1 ²

(1) Instrument QC Batch: MA25411

(2) Prep QC Batch: MP55761

RL = Reporting Limit

Report of Analysis

Client Sample ID: NW1RP-GM-38-GW-RW2-MW1-110310	Date Sampled: 11/03/10
Lab Sample ID: JA60709-2	Date Received: 11/04/10
Matrix: AQ - Ground Water	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

General Chemistry

Analyte	Result	RL	Units	DF	Analyzed	By	Method
Solids, Total Suspended	7.0	4.0	mg/l	1	11/08/10	DD	SM20 2540D

RL = Reporting Limit

Report of Analysis

Client Sample ID:	NW1RP-GM-38-GW-RW3-MW4-110310		
Lab Sample ID:	JA60709-3	Date Sampled:	11/03/10
Matrix:	AQ - Ground Water	Date Received:	11/04/10
Method:	EPA 624	Percent Solids:	n/a
Project:	GM-38, 100 Broadway, Bethpage, NY		

Run #	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	T152921.D	1	11/12/10	JNW	n/a	n/a	VT6075
Run #2	T152955.D	5	11/12/10	JNW	n/a	n/a	VT6076

Run #	Purge Volume
Run #1	5.0 ml
Run #2	5.0 ml

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	5.0	3.9	ug/l	
71-43-2	Benzene	ND	1.0	0.27	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.29	ug/l	
75-25-2	Bromoform	ND	1.0	0.19	ug/l	
74-83-9	Bromomethane	ND	1.0	0.23	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	1.7	ug/l	
75-15-0	Carbon disulfide	ND	1.0	0.25	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.14	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.26	ug/l	
75-00-3	Chloroethane	ND	1.0	0.47	ug/l	
67-66-3	Chloroform	0.32	1.0	0.17	ug/l	J
74-87-3	Chloromethane	ND	1.0	0.16	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.23	ug/l	
75-34-3	1,1-Dichloroethane	1.8	1.0	0.30	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.53	ug/l	
75-35-4	1,1-Dichloroethene	0.86	1.0	0.24	ug/l	J
156-59-2	cis-1,2-Dichloroethene	1.6	1.0	0.24	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.35	ug/l	
540-59-0	1,2-Dichloroethene (total)	1.6	1.0	0.24	ug/l	
78-87-5	1,2-Dichloropropane	ND	1.0	0.12	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	0.19	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	0.20	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.22	ug/l	
591-78-6	2-Hexanone	ND	5.0	1.7	ug/l	
108-10-1	4-Methyl-2-pentanone(MIBK)	ND	5.0	1.4	ug/l	
75-09-2	Methylene chloride	ND	1.0	0.17	ug/l	
100-42-5	Styrene	ND	2.0	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	0.16	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.51	ug/l	
108-88-3	Toluene	ND	1.0	0.24	ug/l	
71-55-6	1,1,1-Trichloroethane	0.67	1.0	0.21	ug/l	J
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.21	ug/l	

ND = Not detected MDL - Method Detection Limit

RL = Reporting Limit

E = Indicates value exceeds calibration range

J = Indicates an estimated value

B = Indicates analyte found in associated method blank

N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	NW1RP-GM-38-GW-RW3-MW4-110310	
Lab Sample ID:	JA60709-3	Date Sampled: 11/03/10
Matrix:	AQ - Ground Water	Date Received: 11/04/10
Method:	EPA 624	Percent Solids: n/a
Project:	GM-38, 100 Broadway, Bethpage, NY	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
79-01-6	Trichloroethene	308 ^a	5.0	1.2	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.16	ug/l	
1330-20-7	Xylenes (total)	ND	1.0	0.35	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
17060-07-0	1,2-Dichloroethane-D4 (SUR)	108%	97%	64-135%
2037-26-5	Toluene-D8 (SUR)	98%	100%	76-117%
460-00-4	4-Bromofluorobenzene (SUR)	102%	101%	72-122%
1868-53-7	Dibromofluoromethane (S)	102%	96%	76-120%

(a) Result is from Run# 2

ND = Not detected MDL - Method Detection Limit
 RL = Reporting Limit
 E = Indicates value exceeds calibration range

J = Indicates an estimated value
 B = Indicates analyte found in associated method blank
 N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID: NW1RP-GM-38-GW-RW3-MW4-110310	
Lab Sample ID: JA60709-3	Date Sampled: 11/03/10
Matrix: AQ - Ground Water	Date Received: 11/04/10
	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

Total Metals Analysis

Analyte	Result	RL	Units	DF	Prep	Analyzed By	Method	Prep Method
Mercury	< 0.20	0.20	ug/l	1	11/23/10	11/23/10 VK	EPA 245.1 ¹	EPA 245.1 ²

(1) Instrument QC Batch: MA25411

(2) Prep QC Batch: MP55761

RL = Reporting Limit

Report of Analysis

Client Sample ID: NW1RP-GM-38-GW-RW3-MW4-110310	Date Sampled: 11/03/10
Lab Sample ID: JA60709-3	Date Received: 11/04/10
Matrix: AQ - Ground Water	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

General Chemistry

Analyte	Result	RL	Units	DF	Analyzed	By	Method
Solids, Total Suspended	< 4.0	4.0	mg/l	1	11/08/10	DD	SM20 2540D

RL = Reporting Limit

Report of Analysis

Client Sample ID:	NW1RP-GM-38-GW-TB-110310	
Lab Sample ID:	JA60709-4	Date Sampled: 11/03/10
Matrix:	AQ - Trip Blank Water	Date Received: 11/04/10
Method:	EPA 624	Percent Solids: n/a
Project:	GM-38, 100 Broadway, Bethpage, NY	

Run #1	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	T152926.D	1	11/12/10	JNW	n/a	n/a	VT6075
Run #2							

Run #1	Purge Volume
Run #1	5.0 ml
Run #2	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	5.0	3.9	ug/l	
71-43-2	Benzene	ND	1.0	0.27	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.29	ug/l	
75-25-2	Bromoform	ND	1.0	0.19	ug/l	
74-83-9	Bromomethane	ND	1.0	0.23	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	1.7	ug/l	
75-15-0	Carbon disulfide	ND	1.0	0.25	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.14	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.26	ug/l	
75-00-3	Chloroethane	ND	1.0	0.47	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	1.0	0.16	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.23	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.30	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.53	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.24	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.24	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.35	ug/l	
540-59-0	1,2-Dichloroethene (total)	ND	1.0	0.24	ug/l	
78-87-5	1,2-Dichloropropane	ND	1.0	0.12	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	0.19	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	0.20	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.22	ug/l	
591-78-6	2-Hexanone	ND	5.0	1.7	ug/l	
108-10-1	4-Methyl-2-pentanone(MIBK)	ND	5.0	1.4	ug/l	
75-09-2	Methylene chloride	ND	1.0	0.17	ug/l	
100-42-5	Styrene	ND	2.0	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	0.16	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.51	ug/l	
108-88-3	Toluene	ND	1.0	0.24	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.21	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.21	ug/l	

ND = Not detected MDL - Method Detection Limit

RL = Reporting Limit

E = Indicates value exceeds calibration range

J = Indicates an estimated value

B = Indicates analyte found in associated method blank

N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	NW1RP-GM-38-GW-TB-110310	
Lab Sample ID:	JA60709-4	Date Sampled: 11/03/10
Matrix:	AQ - Trip Blank Water	Date Received: 11/04/10
Method:	EPA 624	Percent Solids: n/a
Project:	GM-38, 100 Broadway, Bethpage, NY	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.16	ug/l	
1330-20-7	Xylenes (total)	ND	1.0	0.35	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
17060-07-0	1,2-Dichloroethane-D4 (SUR)	105%		64-135%
2037-26-5	Toluene-D8 (SUR)	99%		76-117%
460-00-4	4-Bromofluorobenzene (SUR)	100%		72-122%
1868-53-7	Dibromofluoromethane (S)	101%		76-120%

ND = Not detected MDL - Method Detection Limit
 RL = Reporting Limit
 E = Indicates value exceeds calibration range

J = Indicates an estimated value
 B = Indicates analyte found in associated method blank
 N = Indicates presumptive evidence of a compound

2235 Route 130, Dayton, NJ 08810
TEL: 732-329-0200 FAX: 732-329-3499/3480
www.accutest.com

Order # 1512 7125 Bottle Order Control # JA60709
Accutest Cycle # Accutest Job #

Client / Reporting Information		Project Information				Requested Analysis (see TEST CODE sheet)												Matrix Codes
Company Name <u>Elor Solutions Inc</u>		Project Name <u>NWIRP Bethpage - Gm 38</u>				<div style="display: flex; justify-content: space-between;"> <div style="writing-mode: vertical-rl; transform: rotate(180deg);"> (604) TCL vials Mercuri TSS </div> <div style="border: 1px solid black; padding: 5px;"> DW - Drinking Water GW - Ground Water WW - Water SW - Surface Water SO - Soil SL - Sludge SED - Sediment OI - Oil LIQ - Other Liquid AIR - Air SOL - Other Solid WP - Wipe FB - Field Blank EB - Equipment Blank RB - Range Blank TB - Trip Blank </div> </div>												LAB USE ONLY <u>NET 18,</u> <u>WC 17,</u> <u>419</u>
Street Address <u>440 Creamery Way</u>		Street <u>100 Broadway</u>																
City State Zip <u>Exton PA 19341</u>		City State <u>Bethpage NY</u>																
Project Contact <u>Matt Lapp</u>		Project # <u>ET032, 300</u>																
Phone # <u>610 840 9200</u>		Client Purchase Order # <u> </u>																
Samples Name(s) <u>Gres Gansen / Will Torres</u>		Project Manager <u>Will Torres</u>																
Accutest Sample #	Field ID / Point of Collection	MEQ/HD/ Vial #	Date	Time	Sampled by	Matrix	# of bottles	HCl	MECH	INOC	H2SO4	NONE	DI Water	MECH	ENCORE			
1	<u>NWIRP-Gm 38-GW-RU3-MU3</u>	<u>110310</u>	<u>11/03/10</u>	<u>1048</u>	<u>GG</u>	<u>CW</u>	<u>5</u>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<u>3</u>	<u>1</u>	
2	<u>NWIRP-Gm 38-GW-RU3-MU1</u>	<u>110310</u>	<u>11/03/10</u>	<u>0940</u>	<u>GG</u>	<u>CW</u>	<u>5</u>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<u>3</u>	<u>1</u>	
3	<u>NWIRP-Gm 38-GW-RU3-MU4</u>	<u>110310</u>	<u>11/03/10</u>	<u>1150</u>	<u>GG</u>	<u>CW</u>	<u>5</u>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<u>3</u>	<u>1</u>	
4	<u>NWIRP-Gm 38-GW-TB-010310</u>	<u> </u>	<u>11/03/10</u>	<u>1300</u>	<u>GG</u>	<u>CW</u>	<u>2</u>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<u>2</u>	<u> </u>	

Turnaround Time (Business days)		Approved By (Accutest PM): / Date:		Data Deliverable Information				Comments / Special Instructions			
<input checked="" type="checkbox"/> Std. 15 Business Days <input type="checkbox"/> Std. 10 Business Days (by Contract only) <input type="checkbox"/> 10 Day RUSH <input type="checkbox"/> 5 Day RUSH <input type="checkbox"/> 3 Day EMERGENCY <input type="checkbox"/> 2 Day EMERGENCY <input type="checkbox"/> 1 Day EMERGENCY		<input type="checkbox"/> Commercial "A" (Level 1) <input type="checkbox"/> Commercial "B" (Level 2) <input type="checkbox"/> FULLT1 (Level 3+4) <input type="checkbox"/> NJ Reduced <input type="checkbox"/> Commercial "C"		<input type="checkbox"/> NYASP Category A <input type="checkbox"/> NYASP Category B <input type="checkbox"/> State Forms <input type="checkbox"/> EDD Format <input type="checkbox"/> Other				<u>*TB filled 10/27/10 @ 7:00</u> <u>KL 11/4/10</u>			

Emergency & Rush T/A data available VIA Lablink

Sample Custody must be documented below each time samples change possession, including courier delivery.

Reinquished by: <u>1 Wyo</u>	Date Time: <u>11/4/2010</u>	Received By: <u>KEITH</u>	Reinquished By: <u>2 KEITH</u>	Date Time: <u>11/4/2010</u>	Received By: <u>2/14/15</u>		
Reinquished by: <u>3</u>	Date Time: <u> </u>	Received By: <u>3</u>	Reinquished By: <u>4</u>	Date Time: <u>2:15</u>	Received By: <u>4</u>		
Reinquished by: <u>5 2A</u>	Date Time: <u> </u>	Received By: <u>5</u>	Custody Seal # <u>314</u>	<input checked="" type="checkbox"/> Intact <input type="checkbox"/> Not Intact	<input checked="" type="checkbox"/> Preserved where applicable <input type="checkbox"/> Not Preserved	<input checked="" type="checkbox"/> On Ice <input type="checkbox"/> Not On Ice	Cooler Temp. <u>3.3°C</u>

Sample Summary

Ecor Solutions

Job No: JA61273

GM-38, 100 Broadway, Bethpage, NY
 Project No: EF032-300

Sample Number	Collected		Received	Matrix		Client Sample ID
	Date	Time By		Code	Type	
JA61273-1	11/09/10	15:35 GG	11/11/10	AQ	Ground Water	NWIRP-GM38-GW-RW3-MW2-110910
JA61273-2	11/09/10	15:35 GG	11/11/10	AQ	Ground Water	NWIRP-GM38-GW-RW3-MW2-DUP
JA61273-3	11/09/10	16:20 GG	11/11/10	AQ	Ground Water	NWIRP-GM38-GW-RW3-MW1-110910
JA61273-3D	11/09/10	16:20 GG	11/11/10	AQ	Water Dup/MSD	NWIRP-GM38-GW-RW3-MW1-110910
JA61273-3S	11/09/10	16:20 GG	11/11/10	AQ	Water Matrix Spike	NWIRP-GM38-GW-RW3-MW1-110910
JA61273-4	11/09/10	17:00 GG	11/11/10	AQ	Field Blank Water	NWIRP-GM38-GW-FB-110910
JA61273-5	11/10/10	10:20 GG	11/11/10	AQ	Ground Water	NWIRP-GM38-GW-RW1-MW1-111010
JA61273-6	11/10/10	11:40 GG	11/11/10	AQ	Ground Water	NWIRP-GM38-GW-RW1-MW3-111010
JA61273-7	11/10/10	11:40 GG	11/11/10	AQ	Trip Blank Water	NWIRP-GM38-GW-TB-111010

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-RW3-MW2-110910		
Lab Sample ID:	JA61273-1	Date Sampled:	11/09/10
Matrix:	AQ - Ground Water	Date Received:	11/11/10
Method:	EPA 624	Percent Solids:	n/a
Project:	GM-38, 100 Broadway, Bethpage, NY		

Run #	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	T153219.D	1	11/19/10	JNW	n/a	n/a	VT6088
Run #2							

Run #	Purge Volume
Run #1	5.0 ml
Run #2	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	5.0	3.9	ug/l	
71-43-2	Benzene	ND	1.0	0.27	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.29	ug/l	
75-25-2	Bromoform	ND	1.0	0.19	ug/l	
74-83-9	Bromomethane	ND	1.0	0.23	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	1.7	ug/l	
75-15-0	Carbon disulfide	ND	1.0	0.25	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.14	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.26	ug/l	
75-00-3	Chloroethane	ND	1.0	0.47	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	1.0	0.16	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.23	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.30	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.53	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.24	ug/l	
156-59-2	cis-1,2-Dichloroethene	0.92	1.0	0.24	ug/l	J
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.35	ug/l	
540-59-0	1,2-Dichloroethene (total)	0.92	1.0	0.24	ug/l	J
78-87-5	1,2-Dichloropropane	ND	1.0	0.12	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	0.19	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	0.20	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.22	ug/l	
591-78-6	2-Hexanone	ND	5.0	1.7	ug/l	
108-10-1	4-Methyl-2-pentanone(MIBK)	ND	5.0	1.4	ug/l	
75-09-2	Methylene chloride	ND	1.0	0.17	ug/l	
100-42-5	Styrene	ND	2.0	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	0.16	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.51	ug/l	
108-88-3	Toluene	ND	1.0	0.24	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.21	ug/l	
79-00-5	1,1,2-Trichloroethane	0.27	1.0	0.21	ug/l	J

ND = Not detected MDL - Method Detection Limit

RL = Reporting Limit

E = Indicates value exceeds calibration range

J = Indicates an estimated value

B = Indicates analyte found in associated method blank

N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-RW3-MW2-110910		
Lab Sample ID:	JA61273-1	Date Sampled:	11/09/10
Matrix:	AQ - Ground Water	Date Received:	11/11/10
Method:	EPA 624	Percent Solids:	n/a
Project:	GM-38, 100 Broadway, Bethpage, NY		

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
79-01-6	Trichloroethene	60.9	1.0	0.25	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.16	ug/l	
1330-20-7	Xylenes (total)	ND	1.0	0.35	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
17060-07-0	1,2-Dichloroethane-D4 (SUR)	111%		64-135%
2037-26-5	Toluene-D8 (SUR)	96%		76-117%
460-00-4	4-Bromofluorobenzene (SUR)	99%		72-122%
1868-53-7	Dibromofluoromethane (S)	100%		76-120%

ND = Not detected MDL - Method Detection Limit
 RL = Reporting Limit
 E = Indicates value exceeds calibration range

J = Indicates an estimated value
 B = Indicates analyte found in associated method blank
 N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID: NWIRP-GM38-GW-RW3-MW2-110910	Date Sampled: 11/09/10
Lab Sample ID: JA61273-1	Date Received: 11/11/10
Matrix: AQ - Ground Water	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

Total Metals Analysis

Analyte	Result	RL	Units	DF	Prep	Analyzed By	Method	Prep Method
Mercury	< 0.20	0.20	ug/l	1	12/01/10	12/01/10 JW	SW846 7470A ¹	SW846 7470A ²

(1) Instrument QC Batch: MA25446

(2) Prep QC Batch: MP55939

Report of Analysis

Client Sample ID: NWIRP-GM38-GW-RW3-MW2-110910	Date Sampled: 11/09/10
Lab Sample ID: JA61273-1	Date Received: 11/11/10
Matrix: AQ - Ground Water	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

General Chemistry

Analyte	Result	RL	Units	DF	Analyzed	By	Method
Solids, Total Suspended	10.0	4.0	mg/l	1	11/12/10	DD	SM20 2540D

RL = Reporting Limit

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-RW3-MW2-DUP		
Lab Sample ID:	JA61273-2	Date Sampled:	11/09/10
Matrix:	AQ - Ground Water	Date Received:	11/11/10
Method:	EPA 624	Percent Solids:	n/a
Project:	GM-38, 100 Broadway, Bethpage, NY		

Run #1	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	T153218.D	1	11/19/10	JNW	n/a	n/a	VT6088
Run #2							

Run #1	Purge Volume
Run #1	5.0 ml
Run #2	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	5.0	3.9	ug/l	
71-43-2	Benzene	ND	1.0	0.27	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.29	ug/l	
75-25-2	Bromoform	ND	1.0	0.19	ug/l	
74-83-9	Bromomethane	ND	1.0	0.23	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	1.7	ug/l	
75-15-0	Carbon disulfide	ND	1.0	0.25	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.14	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.26	ug/l	
75-00-3	Chloroethane	ND	1.0	0.47	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	1.0	0.16	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.23	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.30	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.53	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.24	ug/l	
156-59-2	cis-1,2-Dichloroethene	0.92	1.0	0.24	ug/l	J
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.35	ug/l	
540-59-0	1,2-Dichloroethene (total)	0.92	1.0	0.24	ug/l	J
78-87-5	1,2-Dichloropropane	ND	1.0	0.12	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	0.19	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	0.20	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.22	ug/l	
591-78-6	2-Hexanone	ND	5.0	1.7	ug/l	
108-10-1	4-Methyl-2-pentanone(MIBK)	ND	5.0	1.4	ug/l	
75-09-2	Methylene chloride	ND	1.0	0.17	ug/l	
100-42-5	Styrene	ND	2.0	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	0.16	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.51	ug/l	
108-88-3	Toluene	ND	1.0	0.24	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.21	ug/l	
79-00-5	1,1,2-Trichloroethane	0.25	1.0	0.21	ug/l	J

ND = Not detected MDL - Method Detection Limit

RL = Reporting Limit

E = Indicates value exceeds calibration range

J = Indicates an estimated value

B = Indicates analyte found in associated method blank

N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-RW3-MW2-DUP		
Lab Sample ID:	JA61273-2	Date Sampled:	11/09/10
Matrix:	AQ - Ground Water	Date Received:	11/11/10
Method:	EPA 624	Percent Solids:	n/a
Project:	GM-38, 100 Broadway, Bethpage, NY		

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
79-01-6	Trichloroethene	58.2	1.0	0.25	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.16	ug/l	
1330-20-7	Xylenes (total)	ND	1.0	0.35	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
17060-07-0	1,2-Dichloroethane-D4 (SUR)	107%		64-135%
2037-26-5	Toluene-D8 (SUR)	94%		76-117%
460-00-4	4-Bromofluorobenzene (SUR)	99%		72-122%
1868-53-7	Dibromofluoromethane (S)	100%		76-120%

ND = Not detected MDL - Method Detection Limit
 RL = Reporting Limit
 E = Indicates value exceeds calibration range

J = Indicates an estimated value
 B = Indicates analyte found in associated method blank
 N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID: NWIRP-GM38-GW-RW3-MW2-DUP	Date Sampled: 11/09/10
Lab Sample ID: JA61273-2	Date Received: 11/11/10
Matrix: AQ - Ground Water	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

Total Metals Analysis

Analyte	Result	RL	Units	DF	Prep	Analyzed By	Method	Prep Method
Mercury	< 0.20	0.20	ug/l	1	12/01/10	12/01/10 JW	SW846 7470A ¹	SW846 7470A ²

(1) Instrument QC Batch: MA25446

(2) Prep QC Batch: MP55939

RL = Reporting Limit

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-RW3-MW2-DUP	Date Sampled:	11/09/10
Lab Sample ID:	JA61273-2	Date Received:	11/11/10
Matrix:	AQ - Ground Water	Percent Solids:	n/a
Project:	GM-38, 100 Broadway, Bethpage, NY		

General Chemistry

Analyte	Result	RL	Units	DF	Analyzed	By	Method
Solids, Total Suspended	< 4.0	4.0	mg/l	1	11/12/10	DD	SM20 2540D

RL = Reporting Limit

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-RW3-MW1-110910		
Lab Sample ID:	JA61273-3	Date Sampled:	11/09/10
Matrix:	AQ - Ground Water	Date Received:	11/11/10
Method:	EPA 624	Percent Solids:	n/a
Project:	GM-38, 100 Broadway, Bethpage, NY		

Run #1	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	T153217.D	1	11/19/10	JNW	n/a	n/a	VT6088
Run #2							

Run #1	Purge Volume
Run #1	5.0 ml
Run #2	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	5.0	3.9	ug/l	
71-43-2	Benzene	ND	1.0	0.27	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.29	ug/l	
75-25-2	Bromoform	ND	1.0	0.19	ug/l	
74-83-9	Bromomethane	ND	1.0	0.23	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	1.7	ug/l	
75-15-0	Carbon disulfide	ND	1.0	0.25	ug/l	
56-23-5	Carbon tetrachloride	0.19	1.0	0.14	ug/l	J
108-90-7	Chlorobenzene	ND	1.0	0.26	ug/l	
75-00-3	Chloroethane	ND	1.0	0.47	ug/l	
67-66-3	Chloroform	0.20	1.0	0.17	ug/l	J
74-87-3	Chloromethane	ND	1.0	0.16	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.23	ug/l	
75-34-3	1,1-Dichloroethane	1.4	1.0	0.30	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.53	ug/l	
75-35-4	1,1-Dichloroethene	1.2	1.0	0.24	ug/l	
156-59-2	cis-1,2-Dichloroethene	0.45	1.0	0.24	ug/l	J
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.35	ug/l	
540-59-0	1,2-Dichloroethene (total)	0.45	1.0	0.24	ug/l	J
78-87-5	1,2-Dichloropropane	ND	1.0	0.12	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	0.19	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	0.20	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.22	ug/l	
591-78-6	2-Hexanone	ND	5.0	1.7	ug/l	
108-10-1	4-Methyl-2-pentanone(MIBK)	ND	5.0	1.4	ug/l	
75-09-2	Methylene chloride	ND	1.0	0.17	ug/l	
100-42-5	Styrene	ND	2.0	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	0.16	ug/l	
127-18-4	Tetrachloroethene	1.5	1.0	0.51	ug/l	
108-88-3	Toluene	ND	1.0	0.24	ug/l	
71-55-6	1,1,1-Trichloroethane	1.2	1.0	0.21	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.21	ug/l	

ND = Not detected MDL - Method Detection Limit

RL = Reporting Limit

E = Indicates value exceeds calibration range

J = Indicates an estimated value

B = Indicates analyte found in associated method blank

N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-RW3-MW1-110910		
Lab Sample ID:	JA61273-3	Date Sampled:	11/09/10
Matrix:	AQ - Ground Water	Date Received:	11/11/10
Method:	EPA 624	Percent Solids:	n/a
Project:	GM-38, 100 Broadway, Bethpage, NY		

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
79-01-6	Trichloroethene	77.6	1.0	0.25	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.16	ug/l	
1330-20-7	Xylenes (total)	ND	1.0	0.35	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
17060-07-0	1,2-Dichloroethane-D4 (SUR)	108%		64-135%
2037-26-5	Toluene-D8 (SUR)	96%		76-117%
460-00-4	4-Bromofluorobenzene (SUR)	98%		72-122%
1868-53-7	Dibromofluoromethane (S)	95%		76-120%

ND = Not detected MDL - Method Detection Limit
 RL = Reporting Limit
 E = Indicates value exceeds calibration range

J = Indicates an estimated value
 B = Indicates analyte found in associated method blank
 N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID: NWIRP-GM38-GW-RW3-MW1-110910	Date Sampled: 11/09/10
Lab Sample ID: JA61273-3	Date Received: 11/11/10
Matrix: AQ - Ground Water	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

Total Metals Analysis

Analyte	Result	RL	Units	DF	Prep	Analyzed By	Method	Prep Method
Mercury	< 0.20	0.20	ug/l	1	12/01/10	12/01/10 JW	SW846 7470A ¹	SW846 7470A ²

(1) Instrument QC Batch: MA25446

(2) Prep QC Batch: MP55939

Report of Analysis

Client Sample ID: NWIRP-GM38-GW-RW3-MW1-110910	Date Sampled: 11/09/10
Lab Sample ID: JA61273-3	Date Received: 11/11/10
Matrix: AQ - Ground Water	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

General Chemistry

Analyte	Result	RL	Units	DF	Analyzed	By	Method
Solids, Total Suspended	< 4.0	4.0	mg/l	1	11/12/10	DD	SM20 2540D

RL = Reporting Limit

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-FB-110910	
Lab Sample ID:	JA61273-4	Date Sampled: 11/09/10
Matrix:	AQ - Field Blank Water	Date Received: 11/11/10
Method:	EPA 624	Percent Solids: n/a
Project:	GM-38, 100 Broadway, Bethpage, NY	

Run #1	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	T153226.D	1	11/19/10	JNW	n/a	n/a	VT6088
Run #2							

Run #1	Purge Volume
Run #1	5.0 ml
Run #2	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	5.0	3.9	ug/l	
71-43-2	Benzene	ND	1.0	0.27	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.29	ug/l	
75-25-2	Bromoform	ND	1.0	0.19	ug/l	
74-83-9	Bromomethane	ND	1.0	0.23	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	1.7	ug/l	
75-15-0	Carbon disulfide	ND	1.0	0.25	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.14	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.26	ug/l	
75-00-3	Chloroethane	ND	1.0	0.47	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	1.0	0.16	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.23	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.30	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.53	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.24	ug/l	
156-59-2	cis-1,2-Dichloroethene	0.30	1.0	0.24	ug/l	J
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.35	ug/l	
540-59-0	1,2-Dichloroethene (total)	0.30	1.0	0.24	ug/l	J
78-87-5	1,2-Dichloropropane	ND	1.0	0.12	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	0.19	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	0.20	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.22	ug/l	
591-78-6	2-Hexanone	ND	5.0	1.7	ug/l	
108-10-1	4-Methyl-2-pentanone(MIBK)	ND	5.0	1.4	ug/l	
75-09-2	Methylene chloride	ND	1.0	0.17	ug/l	
100-42-5	Styrene	ND	2.0	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	0.16	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.51	ug/l	
108-88-3	Toluene	ND	1.0	0.24	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.21	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.21	ug/l	

ND = Not detected MDL - Method Detection Limit

RL = Reporting Limit

E = Indicates value exceeds calibration range

J = Indicates an estimated value

B = Indicates analyte found in associated method blank

N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-FB-110910	
Lab Sample ID:	JA61273-4	Date Sampled: 11/09/10
Matrix:	AQ - Field Blank Water	Date Received: 11/11/10
Method:	EPA 624	Percent Solids: n/a
Project:	GM-38, 100 Broadway, Bethpage, NY	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
79-01-6	Trichloroethene	0.85	1.0	0.25	ug/l	J
75-01-4	Vinyl chloride	ND	1.0	0.16	ug/l	
1330-20-7	Xylenes (total)	ND	1.0	0.35	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
17060-07-0	1,2-Dichloroethane-D4 (SUR)	107%		64-135%
2037-26-5	Toluene-D8 (SUR)	96%		76-117%
460-00-4	4-Bromofluorobenzene (SUR)	99%		72-122%
1868-53-7	Dibromofluoromethane (S)	99%		76-120%

ND = Not detected MDL - Method Detection Limit
 RL = Reporting Limit
 E = Indicates value exceeds calibration range

J = Indicates an estimated value
 B = Indicates analyte found in associated method blank
 N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID: NWIRP-GM38-GW-FB-110910	
Lab Sample ID: JA61273-4	Date Sampled: 11/09/10
Matrix: AQ - Field Blank Water	Date Received: 11/11/10
	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

Total Metals Analysis

Analyte	Result	RL	Units	DF	Prep	Analyzed By	Method	Prep Method
Mercury	< 0.20	0.20	ug/l	1	12/01/10	12/01/10 JW	SW846 7470A ¹	SW846 7470A ²

(1) Instrument QC Batch: MA25446

(2) Prep QC Batch: MP55939

Report of Analysis

Client Sample ID: NWIRP-GM38-GW-FB-110910	Date Sampled: 11/09/10
Lab Sample ID: JA61273-4	Date Received: 11/11/10
Matrix: AQ - Field Blank Water	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

General Chemistry

Analyte	Result	RL	Units	DF	Analyzed	By	Method
Solids, Total Suspended	< 4.0	4.0	mg/l	1	11/12/10	DD	SM20 2540D

RL = Reporting Limit

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-RW1-MW1-111010		
Lab Sample ID:	JA61273-5	Date Sampled:	11/10/10
Matrix:	AQ - Ground Water	Date Received:	11/11/10
Method:	EPA 624	Percent Solids:	n/a
Project:	GM-38, 100 Broadway, Bethpage, NY		

Run #	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	T153231.D	1	11/19/10	JNW	n/a	n/a	VT6088
Run #2							

Run #	Purge Volume
Run #1	5.0 ml
Run #2	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	5.0	3.9	ug/l	
71-43-2	Benzene	ND	1.0	0.27	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.29	ug/l	
75-25-2	Bromoform	ND	1.0	0.19	ug/l	
74-83-9	Bromomethane	ND	1.0	0.23	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	1.7	ug/l	
75-15-0	Carbon disulfide	ND	1.0	0.25	ug/l	
56-23-5	Carbon tetrachloride	0.17	1.0	0.14	ug/l	J
108-90-7	Chlorobenzene	ND	1.0	0.26	ug/l	
75-00-3	Chloroethane	ND	1.0	0.47	ug/l	
67-66-3	Chloroform	0.56	1.0	0.17	ug/l	J
74-87-3	Chloromethane	ND	1.0	0.16	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.23	ug/l	
75-34-3	1,1-Dichloroethane	3.0	1.0	0.30	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.53	ug/l	
75-35-4	1,1-Dichloroethene	1.7	1.0	0.24	ug/l	
156-59-2	cis-1,2-Dichloroethene	107	1.0	0.24	ug/l	
156-60-5	trans-1,2-Dichloroethene	1.3	1.0	0.35	ug/l	
540-59-0	1,2-Dichloroethene (total)	108	1.0	0.24	ug/l	
78-87-5	1,2-Dichloropropane	ND	1.0	0.12	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	0.19	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	0.20	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.22	ug/l	
591-78-6	2-Hexanone	ND	5.0	1.7	ug/l	
108-10-1	4-Methyl-2-pentanone(MIBK)	ND	5.0	1.4	ug/l	
75-09-2	Methylene chloride	ND	1.0	0.17	ug/l	
100-42-5	Styrene	ND	2.0	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	0.16	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.51	ug/l	
108-88-3	Toluene	ND	1.0	0.24	ug/l	
71-55-6	1,1,1-Trichloroethane	0.53	1.0	0.21	ug/l	J
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.21	ug/l	

ND = Not detected MDL - Method Detection Limit

RL = Reporting Limit

E = Indicates value exceeds calibration range

J = Indicates an estimated value

B = Indicates analyte found in associated method blank

N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-RW1-MW1-111010		
Lab Sample ID:	JA61273-5	Date Sampled:	11/10/10
Matrix:	AQ - Ground Water	Date Received:	11/11/10
Method:	EPA 624	Percent Solids:	n/a
Project:	GM-38, 100 Broadway, Bethpage, NY		

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
79-01-6	Trichloroethene	84.2	1.0	0.25	ug/l	
75-01-4	Vinyl chloride	0.17	1.0	0.16	ug/l	J
1330-20-7	Xylenes (total)	ND	1.0	0.35	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
17060-07-0	1,2-Dichloroethane-D4 (SUR)	108%		64-135%
2037-26-5	Toluene-D8 (SUR)	94%		76-117%
460-00-4	4-Bromofluorobenzene (SUR)	99%		72-122%
1868-53-7	Dibromofluoromethane (S)	99%		76-120%

ND = Not detected MDL - Method Detection Limit
 RL = Reporting Limit
 E = Indicates value exceeds calibration range

J = Indicates an estimated value
 B = Indicates analyte found in associated method blank
 N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID: NWIRP-GM38-GW-RW1-MW1-111010	Date Sampled: 11/10/10
Lab Sample ID: JA61273-5	Date Received: 11/11/10
Matrix: AQ - Ground Water	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

Total Metals Analysis

Analyte	Result	RL	Units	DF	Prep	Analyzed By	Method	Prep Method
Mercury	< 0.20	0.20	ug/l	1	12/01/10	12/01/10 JW	SW846 7470A ¹	SW846 7470A ²

(1) Instrument QC Batch: MA25446

(2) Prep QC Batch: MP55939

Report of Analysis

Client Sample ID: NWIRP-GM38-GW-RW1-MW1-111010	Date Sampled: 11/10/10
Lab Sample ID: JA61273-5	Date Received: 11/11/10
Matrix: AQ - Ground Water	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

General Chemistry

Analyte	Result	RL	Units	DF	Analyzed	By	Method
Solids, Total Suspended	< 4.0	4.0	mg/l	1	11/15/10	DD	SM20 2540D

RL = Reporting Limit

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-RW1-MW3-111010		
Lab Sample ID:	JA61273-6	Date Sampled:	11/10/10
Matrix:	AQ - Ground Water	Date Received:	11/11/10
Method:	EPA 624	Percent Solids:	n/a
Project:	GM-38, 100 Broadway, Bethpage, NY		

Run #	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	T153232.D	1	11/19/10	JNW	n/a	n/a	VT6088
Run #2							

Run #	Purge Volume
Run #1	5.0 ml
Run #2	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	5.0	3.9	ug/l	
71-43-2	Benzene	ND	1.0	0.27	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.29	ug/l	
75-25-2	Bromoform	ND	1.0	0.19	ug/l	
74-83-9	Bromomethane	ND	1.0	0.23	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	1.7	ug/l	
75-15-0	Carbon disulfide	ND	1.0	0.25	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.14	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.26	ug/l	
75-00-3	Chloroethane	ND	1.0	0.47	ug/l	
67-66-3	Chloroform	0.69	1.0	0.17	ug/l	J
74-87-3	Chloromethane	ND	1.0	0.16	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.23	ug/l	
75-34-3	1,1-Dichloroethane	2.3	1.0	0.30	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.53	ug/l	
75-35-4	1,1-Dichloroethene	0.28	1.0	0.24	ug/l	J
156-59-2	cis-1,2-Dichloroethene	0.55	1.0	0.24	ug/l	J
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.35	ug/l	
540-59-0	1,2-Dichloroethene (total)	0.55	1.0	0.24	ug/l	J
78-87-5	1,2-Dichloropropane	ND	1.0	0.12	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	0.19	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	0.20	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.22	ug/l	
591-78-6	2-Hexanone	ND	5.0	1.7	ug/l	
108-10-1	4-Methyl-2-pentanone(MIBK)	ND	5.0	1.4	ug/l	
75-09-2	Methylene chloride	ND	1.0	0.17	ug/l	
100-42-5	Styrene	ND	2.0	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	0.16	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.51	ug/l	
108-88-3	Toluene	ND	1.0	0.24	ug/l	
71-55-6	1,1,1-Trichloroethane	0.26	1.0	0.21	ug/l	J
79-00-5	1,1,2-Trichloroethane	0.55	1.0	0.21	ug/l	J

ND = Not detected MDL - Method Detection Limit

RL = Reporting Limit

E = Indicates value exceeds calibration range

J = Indicates an estimated value

B = Indicates analyte found in associated method blank

N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-RW1-MW3-111010	
Lab Sample ID:	JA61273-6	Date Sampled: 11/10/10
Matrix:	AQ - Ground Water	Date Received: 11/11/10
Method:	EPA 624	Percent Solids: n/a
Project:	GM-38, 100 Broadway, Bethpage, NY	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
79-01-6	Trichloroethene	0.91	1.0	0.25	ug/l	J
75-01-4	Vinyl chloride	ND	1.0	0.16	ug/l	
1330-20-7	Xylenes (total)	ND	1.0	0.35	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
17060-07-0	1,2-Dichloroethane-D4 (SUR)	109%		64-135%
2037-26-5	Toluene-D8 (SUR)	95%		76-117%
460-00-4	4-Bromofluorobenzene (SUR)	100%		72-122%
1868-53-7	Dibromofluoromethane (S)	102%		76-120%

ND = Not detected MDL - Method Detection Limit
 RL = Reporting Limit
 E = Indicates value exceeds calibration range

J = Indicates an estimated value
 B = Indicates analyte found in associated method blank
 N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID: NWIRP-GM38-GW-RW1-MW3-111010	
Lab Sample ID: JA61273-6	Date Sampled: 11/10/10
Matrix: AQ - Ground Water	Date Received: 11/11/10
	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

Total Metals Analysis

Analyte	Result	RL	Units	DF	Prep	Analyzed By	Method	Prep Method
Mercury	< 0.20	0.20	ug/l	1	12/01/10	12/01/10 JW	SW846 7470A ¹	SW846 7470A ²

(1) Instrument QC Batch: MA25446

(2) Prep QC Batch: MP55939

Report of Analysis

Client Sample ID: NWIRP-GM38-GW-RW1-MW3-111010	Date Sampled: 11/10/10
Lab Sample ID: JA61273-6	Date Received: 11/11/10
Matrix: AQ - Ground Water	Percent Solids: n/a
Project: GM-38, 100 Broadway, Bethpage, NY	

General Chemistry

Analyte	Result	RL	Units	DF	Analyzed	By	Method
Solids, Total Suspended	< 4.0	4.0	mg/l	1	11/15/10	DD	SM20 2540D

RL = Reporting Limit

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-TB-111010		
Lab Sample ID:	JA61273-7	Date Sampled:	11/10/10
Matrix:	AQ - Trip Blank Water	Date Received:	11/11/10
Method:	EPA 624	Percent Solids:	n/a
Project:	GM-38, 100 Broadway, Bethpage, NY		

Run #1	File ID	DF	Analyzed	By	Prep Date	Prep Batch	Analytical Batch
Run #1	T153227.D	1	11/19/10	JNW	n/a	n/a	VT6088
Run #2							

Run #1	Purge Volume
Run #1	5.0 ml
Run #2	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
67-64-1	Acetone	ND	5.0	3.9	ug/l	
71-43-2	Benzene	ND	1.0	0.27	ug/l	
75-27-4	Bromodichloromethane	ND	1.0	0.29	ug/l	
75-25-2	Bromoform	ND	1.0	0.19	ug/l	
74-83-9	Bromomethane	ND	1.0	0.23	ug/l	
78-93-3	2-Butanone (MEK)	ND	5.0	1.7	ug/l	
75-15-0	Carbon disulfide	ND	1.0	0.25	ug/l	
56-23-5	Carbon tetrachloride	ND	1.0	0.14	ug/l	
108-90-7	Chlorobenzene	ND	1.0	0.26	ug/l	
75-00-3	Chloroethane	ND	1.0	0.47	ug/l	
67-66-3	Chloroform	ND	1.0	0.17	ug/l	
74-87-3	Chloromethane	ND	1.0	0.16	ug/l	
124-48-1	Dibromochloromethane	ND	1.0	0.23	ug/l	
75-34-3	1,1-Dichloroethane	ND	1.0	0.30	ug/l	
107-06-2	1,2-Dichloroethane	ND	1.0	0.53	ug/l	
75-35-4	1,1-Dichloroethene	ND	1.0	0.24	ug/l	
156-59-2	cis-1,2-Dichloroethene	ND	1.0	0.24	ug/l	
156-60-5	trans-1,2-Dichloroethene	ND	1.0	0.35	ug/l	
540-59-0	1,2-Dichloroethene (total)	ND	1.0	0.24	ug/l	
78-87-5	1,2-Dichloropropane	ND	1.0	0.12	ug/l	
10061-01-5	cis-1,3-Dichloropropene	ND	1.0	0.19	ug/l	
10061-02-6	trans-1,3-Dichloropropene	ND	1.0	0.20	ug/l	
100-41-4	Ethylbenzene	ND	1.0	0.22	ug/l	
591-78-6	2-Hexanone	ND	5.0	1.7	ug/l	
108-10-1	4-Methyl-2-pentanone(MIBK)	ND	5.0	1.4	ug/l	
75-09-2	Methylene chloride	ND	1.0	0.17	ug/l	
100-42-5	Styrene	ND	2.0	1.0	ug/l	
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.0	0.16	ug/l	
127-18-4	Tetrachloroethene	ND	1.0	0.51	ug/l	
108-88-3	Toluene	ND	1.0	0.24	ug/l	
71-55-6	1,1,1-Trichloroethane	ND	1.0	0.21	ug/l	
79-00-5	1,1,2-Trichloroethane	ND	1.0	0.21	ug/l	

ND = Not detected MDL - Method Detection Limit

RL = Reporting Limit

E = Indicates value exceeds calibration range

J = Indicates an estimated value

B = Indicates analyte found in associated method blank

N = Indicates presumptive evidence of a compound

Report of Analysis

Client Sample ID:	NWIRP-GM38-GW-TB-111010	
Lab Sample ID:	JA61273-7	Date Sampled: 11/10/10
Matrix:	AQ - Trip Blank Water	Date Received: 11/11/10
Method:	EPA 624	Percent Solids: n/a
Project:	GM-38, 100 Broadway, Bethpage, NY	

VOA TCL List

CAS No.	Compound	Result	RL	MDL	Units	Q
79-01-6	Trichloroethene	ND	1.0	0.25	ug/l	
75-01-4	Vinyl chloride	ND	1.0	0.16	ug/l	
1330-20-7	Xylenes (total)	ND	1.0	0.35	ug/l	

CAS No.	Surrogate Recoveries	Run# 1	Run# 2	Limits
17060-07-0	1,2-Dichloroethane-D4 (SUR)	107%		64-135%
2037-26-5	Toluene-D8 (SUR)	94%		76-117%
460-00-4	4-Bromofluorobenzene (SUR)	100%		72-122%
1868-53-7	Dibromofluoromethane (S)	101%		76-120%

ND = Not detected MDL - Method Detection Limit
 RL = Reporting Limit
 E = Indicates value exceeds calibration range

J = Indicates an estimated value
 B = Indicates analyte found in associated method blank
 N = Indicates presumptive evidence of a compound

2235 Route 130, Dayton, NJ 08810
TEL: 732-329-0200 FAX: 732-329-3499/3480
www.accutest.com

FED-EX Tracking # 8705 2403 7901 Bottle Order Control #
Accutest Quote # JA61273 Accutest Job #

Client / Reporting Information		Project Information				Requested Analysis (see TEST CODE sheet)												Matrix Codes
Company Name Acor Solutions		Project Name NWIRP Bethpage Gw-38				<div style="display: flex; justify-content: space-between;"> <div style="writing-mode: vertical-rl; transform: rotate(180deg);"> TRC VOLS (224) MERWA-1 TSS MS/MSD </div> <div> DW - Drinking Water GW - Ground Water WW - Water SW - Surface Water SD - Soil SL - Sludge SED - Sediment OI - Oil LIQ - Other Liquid AIR - Air SOL - Other Solid WP - Wipe FB - Field Blank EB - Equipment Blank RB - Rinse Blank TB - Trip Blank </div> </div>												Matrix Codes DW - Drinking Water GW - Ground Water WW - Water SW - Surface Water SD - Soil SL - Sludge SED - Sediment OI - Oil LIQ - Other Liquid AIR - Air SOL - Other Solid WP - Wipe FB - Field Blank EB - Equipment Blank RB - Rinse Blank TB - Trip Blank
Street Address 440 Creamery Way		Street 100 Broadway																
City State Zip Exton PA 19341		City State Bethpage NY																
Project Contact MATT LAPP 610840-9200		Project # EFO38-300																
Phone # 610840-9200		Client Purchase Order #																
Sampler(s) Name(s) Craig Casemir		Project Manager Will Torres																
Field ID / Point of Collection		MECH/DI Viol #	Date	Time	Sampled by	Matrix	# of bottles	HC	MEDI	HNO3	H2SO4	HNO2	NO3E	DI Water	MEDIH	ENCORE	LAB USE ONLY	
-1	NWIRP-Gw38-GW-RWS-MW	2-110910	11/09/10	1535	GG	GW	5	X	X	X	X	X	X	X	X	X	708	
-2	NWIRP-Gw38-GW-RW3-MW	-DUP	11/09/10	1535	GG	GW	5	X	X	X	X	X	X	X	X	X	ME18	
-3	NWIRP-Gw38-GW-RWS-MW	1-110910	11/09/10	1620	GG	GW	5	X	X	X	X	X	X	X	X	X	WC17	
-4	NWIRP-Gw38-GW-RWB-MW	1-110910	11/09/10	1620	GG	GW	9	X	X	X	X	X	X	X	X	X		
-5	NWIRP-Gw38-GW-FB-110910		11/09/10	1700	GG	GW	5	X	X	X	X	X	X	X	X	X		
-6	NWIRP-Gw38-GW-RW3-MW	3-111010	11/10/10	1020	GG	GW	5	X	X	X	X	X	X	X	X	X		
-7	NWIRP-Gw38-GW-TB-111010		11/10/10	1500	GG	GW	2	X										

Turnaround Time (Business days)		Data Deliverable Information				Comments / Special Instructions	
<input checked="" type="checkbox"/> Std. 15 Business Days <input type="checkbox"/> Std. 10 Business Days (by Contract only) <input type="checkbox"/> 10 Day RUSH <input type="checkbox"/> 5 Day RUSH <input type="checkbox"/> 3 Day EMERGENCY <input type="checkbox"/> 2 Day EMERGENCY <input type="checkbox"/> 1 Day EMERGENCY <input type="checkbox"/> Emergency & Rush - Data available VIA Lablink		Approved By (Accutest PM) / Date: _____ _____ _____ _____ _____				<input type="checkbox"/> Commercial "A" (Level 1) <input type="checkbox"/> Commercial "B" (Level 2) <input type="checkbox"/> FULL T1 (Level 3+4) <input type="checkbox"/> NJ Reduced <input type="checkbox"/> Commercial "C" <input type="checkbox"/> NYASP Category A <input checked="" type="checkbox"/> NYASP Category B <input type="checkbox"/> State Forms <input type="checkbox"/> EDD Format <input type="checkbox"/> Other _____ Commercial "A" = Results Only Commercial "B" = Results + QC Summary NJ Reduced = Results + QC Summary + Partial Raw data	*MS/MSD for NWIRP-Gw38-GW-RW3-MW-1

Sample Custody must be documented below each time samples change possession, including courier delivery.					
Relinquished by Sampler: Craig Casemir	Date Time 11/10/10 1500	Received By: Felix	Relinquished By: Felix	Date Time 11/11/10 0730	Received By: [Signature]
Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
3		3	4		4
Relinquished by:	Date Time:	Received By:	Custody Seal #	<input checked="" type="checkbox"/> Intact <input type="checkbox"/> Not intact	Preserved where applicable <input type="checkbox"/>
5		5	NA #		On Ice <input type="checkbox"/>
					Cooler Temp. 2.6

JA61273: Chain of Custody

Page 1 of 2