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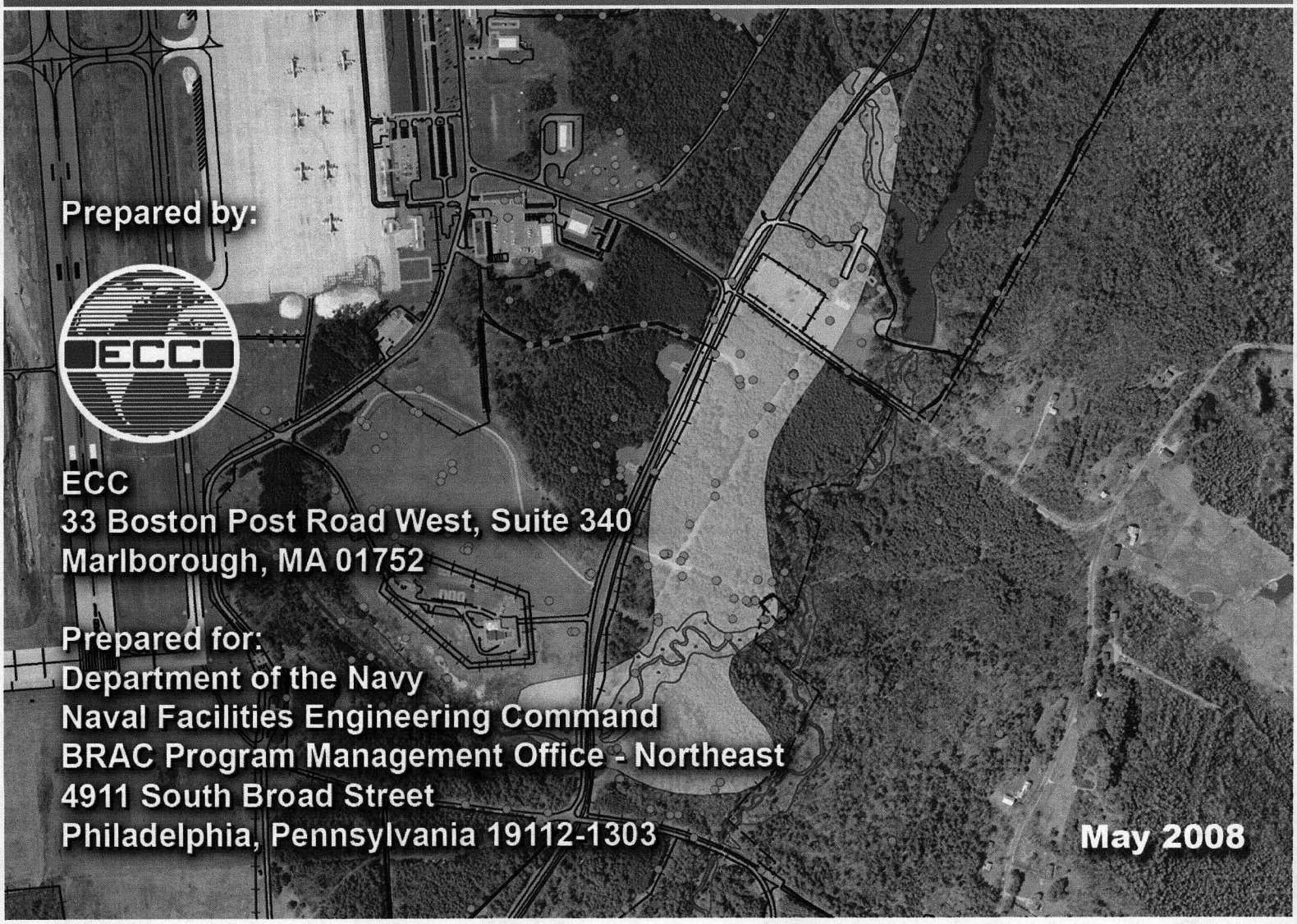
U.S. NAVAL AIR STATION
BRUNSWICK MAINE

Final
Sites 1, 3 & Eastern Plume Monitoring Event 29 Report September 2006

Contract No. N62472-02-D-0810
Contract Task Order No. 007

Naval Air Station Brunswick, Maine



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May 2008

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Dear Mr. Daly and Ms. Sait:

SUBJECT: FINAL SITES 1 AND 3, EASTERN PLUME MONITORING EVENT 29 REPORT, SEPTEMBER 2006, NAVAL AIR STATION (NAS) BRUNSWICK, MAINE

Enclosed you will find the Final Sites 1 and 3, Eastern Plume Monitoring Event 29 Report, September 2006, Naval Air Station (NAS) Brunswick, Maine. This report is provided for your use/reference.

If you have any questions or comments, please contact the Navy's Remedial Project Manager, Todd Bober at (215) 897-4911.

Sincerely,

Paul F. Burgio
BRAC Environmental Coordinator
By direction of BRAC PMO

Enclosure:
Final Sites 1 and 3, Eastern Plume Monitoring Event 29 Report, September 2006, NAS Brunswick, Maine

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DATE: 7 MAY 2008	JOB NO.: 5700.007
ATTENTION: Todd Bober, RPM and Paul Burgio, BEC	
RE: Final Sites 1 and 3, Eastern Plume Monitoring Event 29 Report, September 2006	
Naval Air Station Brunswick, Maine	

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FINAL

SITES 1 AND 3 AND EASTERN PLUME MONITORING EVENT 29 REPORT SEPTEMBER 2006

Naval Air Station
Brunswick, Maine

Prepared for

Department of the Navy
Naval Facilities Engineering Command
BRAC Program Management Office - Northeast
4911 South Broad Street
Philadelphia, Pennsylvania 19112-1303

Contract No. N62472-02-D-0810
Contract Task Order No. 007

May 2008

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FINAL

SITES 1 AND 3 AND EASTERN PLUME MONITORING EVENT 29 REPORT SEPTEMBER 2006

Naval Air Station
Brunswick, Maine

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Department of the Navy
Naval Facilities Engineering Command
BRAC Program Management Office - Northeast
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5/7/08
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QUALITY REVIEW STATEMENT

Contract No. N62472-02-D-0810 ECC Project No.: 5700.007
Contract Task Order No. 007
Activity: Naval Air Station, Brunswick, Maine

Description of Final Report/Deliverable:

Final Monitoring Event 29 Report – September 2006 for Sites 1,3, and Eastern Plume, Naval Air Station, Brunswick, Maine

ECC CTO Senior Project Manager: Alexander C. Easterday, P.G.

As per State of Maine Department of Professional and Financial Regulations, Title 32 Chapter 73, Law, the sections of this document related to geology and geologic data interpretation have been reviewed for its technical content by the undersigned State of Maine Certified Geologist.

This document has been reviewed by the undersigned for their geological interpretive content. This statement is based upon the review of the undersigned conducted during the preparation of this report, as dated below.

State of Maine Geologist Reviewer:

STATE OF MAINE
GINA M. CALDERONE
No. GE442
CERTIFIED GEOLOGIST

Gina M. Calderone

5/7/08
Date

Gina M. Calderone, P.G., C.P.G.
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LIST OF ABBREVIATIONS AND ACRONYMS

4,4'-DDD	dichlorodiphenyldichloroethane
4,4'-DDT	dichlorodiphenyltrichloroethane
BTEX	benzene, toluene, ethylbenzene, and xylenes
°C	degrees Celsius
DCE	dichloroethene
EPA	U.S. Environmental Protection Agency
EW	extraction wells
GWETS	groundwater extraction and treatment system
LTMP	Long-Term Monitoring Plan
MCL	maximum contaminant levels
MEDEP	Maine Department of Environmental Protection
MEG	maximum exposure guideline
µg/L	micrograms per liter
µmhos/cm	micromhos per centimeter
mg/kg	milligram per kilogram
mg/L	milligrams per liter
MNA	monitored natural attenuation
mV	millivolt
MW	monitoring well
NAS	Naval Air Station
NTU	nephelometric turbidity units
NWQC	National Recommended Water Quality Criteria
P	piezometers
PCE	tetrachloroethene
QAPP	Quality Assurance Project Plan
ROD	record of decision
SDWR	Secondary Drinking Water Regulations
SM	Standard Method
SWQC	Statewide Water Quality Criteria
1,1,1-TCA	1,1,1-trichloroethane
TCE	trichlorethene
VOC	volatile organic compounds
YSI	Yellow Springs Instruments

1.0 PROJECT ACTIVITIES AND MONITORING EVENT RESULTS

Naval Facilities Engineering Command (NAVFAC) contracted with ECC to perform long-term monitoring at Sites 1 and 3 and Eastern Plume, Naval Air Station (NAS), Brunswick, Maine under Contract Number N62472-02-D-0810, Contract Task Order No. 007. NAS Brunswick is located south of the Androscoggin River between Brunswick and Cooks Corner, Maine. The locations of Sites 1 and 3 and the Eastern Plume are provided on Figure 1-1.

At Sites 1 and 3 and Eastern Plume (Figure 1-2), the Navy is currently performing long-term monitoring, maintenance, and corrective measures as part of the long-term remedial actions required by the: (1) *Record of Decision (ROD) for a Remedial Action for Sites 1 and 3* (ABB-ES 1992); and (2) *ROD for No Further Action at Sites 4, 11, and 13 and Remedial Action for the Eastern Plume* (ABB-ES 1998). In 1994, a Long-Term Monitoring Plan (LTMP) was established for Sites 1 and 3 and Eastern Plume (ABB-ES 1994). A draft revision to the 1994 LTMP (Sites 1 & 3 and Eastern Plume only) was issued Draft in October 1998 (EA 1998); the Final LTMP for Sites 1 and 3 and Eastern Plume was completed in February 2000 (EA 2000a). The Draft, Revision 1, Long-Term Monitoring Plan was issued in March 2004 (EA 2004a). In October 2004, the Navy initiated a proposal for optimizing the groundwater long-term monitoring and sampling program at NAS Brunswick. The intent of this proposal was to offer a formal proposal based on stakeholder discussions held as part of the October 2004 Technical Meeting. As a result of this meeting, and regulator comment and collaboration, the proposed Optiminization Plan (October 2004) was revised and re-issued on November 4th, 2004 (EA 2004b) as the Revised Proposed Optiminization Plan for Groundwater Samples Collected as Part of Long-Term Monitoring, NAS Brunswick. This Monitoring Event (ME 29) was conducted following the October 2004 Proposed Optiminization Plan.

The Sites 1 and 3 well designation and sample parameters are summarized in Table 1-1 and the Eastern Plume well designation and sample parameters are summarized in Table 1-2. Figure 1-3 shows the Sites 1 and 3 and Eastern Plume monitoring and sampling locations.

Remedial actions at Sites 1 and 3 included construction of a low permeability slurry wall to a depth of approximately 90 feet, which is upgradient of and surrounding two disposal trenches, construction of a low permeability cap atop the landfill, and placement of two extraction wells (EW-6 and EW-7) within the landfill limits. Extraction wells within the landfill limits were deactivated on 19 November 1997 due to continually decreasing yields and stabilized water levels within the confines of the slurry wall. The source of the Eastern Plume has been identified as Sites 4, 11, and 13 (ABB-ES 1998). Groundwater in the Eastern Plume is being remediated by a treatment system consisting of four groundwater extraction wells designed to provide hydraulic control of the aquifer, and a treatment plant to remove volatile organic compounds (VOCs) from the groundwater prior to discharge. The extraction system, which has been operational since April 1995 and consists of the following wells (see Figure 1-2 for locations):

- **Extraction Well EW-01** located at the southern end of the Eastern Plume north of MW-229B provides VOC removal and hydraulic control in this area

- **Extraction Well EW-02A** located within the Eastern Plume in the vicinity of monitoring well MW-311, was activated on 12 June 1998 to provide additional VOC removal and hydraulic control in this area. On 27 September 2000, extraction well EW-02 was removed from service and decommissioned.

- **Extraction Well EW-03** is no longer operational and was removed from service in December 1998 and decommissioned 27 September 2000.

- **Extraction Well EW-04** located within the Eastern Plume northwest of piezometer P-111 provides additional VOC removal and hydraulic control in this area.

- **Extraction Well EW-05A** is a replacement extraction well installed during September 2000 and brought online 10 January 2001. EW-5 was removed from service and decommissioned 5 January 2001.

On 11 September 2001, at 1119 hours, the extraction well network and treatment plant were ordered shut down by the Commanding Officer of NAS Brunswick. During the 1 October 2001 project conference call between the Navy, Maine Department of Environmental Protection (MEDEP), and U.S. Environmental Protection Agency (EPA) remedial project managers, it was agreed that the extraction well network and treatment plant would remain off-line until completion of the Fall 2001 Long-Term Monitoring Program. The extraction well network and treatment plant were placed back in service on 13 November 2001. The extraction well network and treatment plant had been offline for a total of 63 days.

Monthly groundwater extraction and treatment system operations reports were provided to the Brunswick Sewer District summarize additional details related to treatment plant operations and maintenance. However, after the GWETS Infiltration Gallery went on-line in February 2002, monthly reports were no longer provided to the Brunswick Sewer District. Monthly reports are still generated and are provided to the MEDEP and EPA.

1.1 Long-Term Monitoring Program

The LTMP document, which is comprised of a Long-Term Monitoring Program; Quality Assurance Project Plan (EA 2000b); Safety, Health, and Emergency Response Plan; and remedial construction technical specifications, establishes the monitoring/sampling requirements for Sites 1 and 3 and Eastern Plume. The Final LTMP (EA 2000a) was revised based on review of the long-term monitoring data previously collected and has been issued as Draft, Revision 1, LTMP (EA 2004a); Draft LTMP (EA 2006a); and Draft Final LTMP (EA 2006b) which remains in progress for finalization. The Draft Final LTMP (EA 2006b) incorporated the November 2004 Optiminization Plan (EA 2004c) for sampling at Sites 1 and 3 and Eastern Plume. However, the Long-Term Monitoring Program has not been finalized and should be finalized prior to the Fall 2007 Monitoring Event. This Monitoring Event (ME 29) was conducted following the October 2004 Proposed Optiminization Plan.

The objective of the Long-Term Monitoring Program is to obtain data necessary to assess the long-term effectiveness of the remedial actions conducted at Sites 1 and 3 and Eastern Plume.

The remedial action objectives for Sites 1 and 3 as stated in the 1992 Record of Decision for a Remedial Action at Sites 1 and 3 are:

- To reduce the generation and migration of contaminated groundwater.
- To reduce the potential risk associated with ingestion of contaminated groundwater.
- To minimize future negative impacts to Mere Brook and the sediment in the leachate seeps resulting from the discharge of contaminated groundwater and leachate.
- To reduce the concentrations of metals (iron and zinc) discharge to Mere Brook.

The remedial action objectives for the Eastern Plume as stated in the 1998 Record of Decision for No Future Action at Sites 4, 11, and 13 and a Remedial Action for the Eastern Plume are:

- To minimize further migration of the Eastern Plume
- To minimize any further negative impact to surface water resulting from discharge of contaminated groundwater.
- To reduce the potential risk associated with ingestion of contaminated groundwater to acceptable levels.
- To restore the aquifer.

Monitoring and sampling data collected during the performance of long-term monitoring in accordance with the Records of Decisions are being used to:

- Assess the ambient water quality conditions (groundwater and surface water) by collecting samples to monitor trends and assess effectiveness of remedial actions.
- Evaluate the effectiveness of the groundwater extraction system by assessing trends in the concentration of VOCs in groundwater within the boundaries of the Eastern Plume, and provide recommendations to improve system effectiveness.
- Evaluate the effectiveness of the landfill cap and slurry wall by evaluating trends in VOCs and Target Analyte List metals in surface water, groundwater, sediment, and leachate station seep samples within and adjacent to Sites 1 and 3.
- Analyze the effective capture zone of the groundwater extraction system at Sites 1 and 3 and Eastern Plume to determine the degree of hydraulic control achieved through remedial pumping.

This report provides results for Monitoring Event 29 conducted in September 2006. Section 1 describes the activities completed during this monitoring event and an overview of the Long-Term Monitoring Program is summarized. Temporal trends and other observations based on data collected during twice per year monitoring are presented in Section 2. Conclusions and

recommendations are provided in Section 3. Appendix A provides response to comments from MEDEP and EPA on the draft report (to be provided with the final version). Appendix B contains the laboratory analytical data summary. Appendix C provides graphical summaries of the Long-Term Monitoring Program and trend graphs of the chemical data. Appendix D provides an analytical data quality review. Appendix E provides field monitoring and sampling forms. Appendix F provides the engineering inspection report. Appendix G provides complete analytical report Form I laboratory data tables. Finally, Appendix H provides a history of 1,4-dioxane results.

1.2 Measurement of Water Level Elevations

Water level measurements were obtained on September 2006 at the monitoring wells, piezometers, and surface water gauging locations (Table 1-3, Figure 1-4 [shallow] and Table 1-4, Figure 1-5 [deep]). These gauging locations were used to interpret the groundwater potentiometic surface elevations for the site.

Pumping rates for each extraction well for the period October 2005 through September 2006 (which may affect groundwater potentiometric surface elevations) are provided in Table 1-5. EW-1 experienced a period of low operational percentage in July and August. The groundwater extraction and treatment system (GWETS) was operational for 93.92 percent of available hours. Details on operational interruptions and a statement of the corrective actions taken are provided in the GWETS monthly operations reports.

1.3 Groundwater Monitoring, Sampling, and Analysis

At Sites 1 and 3, seven groundwater samples were collected between the 13th and 20th of September 2006 via low-flow sampling techniques. One monitoring well was sampled inside the slurry wall (MW-217B) and six on the outside, to include the newly installed monitoring well couplets located south of the slurry wall opening. These newly install well couplets include: MW-1301S, MW-1301D, MW-1302S, MW-1302D, MW-1303AS, and MW-1303AD (Table 1-1).

At the Eastern Plume, groundwater samples were collected from 20 LTMP monitoring wells and 3 extraction wells. The groundwater sampling program was performed during 11th through the 20th of September 2006. The sampling program for the September 2006 sampling events at Sites 1 and 3 and Eastern Plume are summarized in Tables 1-1 and 1-2. Preserved samples were delivered by laboratory sample courier to Accutest Laboratory in Marlborough, Massachusetts, Accutest Laboratory is a Navy certified laboratory. LTMP groundwater samples collected from Sites 1 and 3 and Eastern Plume were submitted for the following analysis:

- LTMP Target Compound List Volatile Organic Compounds (VOCs) by EPA Method 8260B and

- LTMP Target Analyte List elements (Sites 1 and 3 landfill), including:
  - Metals by inductively coupled plasma/atomic emission spectroscopy (EPA Method 6010B),

- Metals by inductively coupled plasma/mass-spectrometry (EPA Method 6020), and
- Mercury by cold vapor atomic absorption (EPA Method 7470A).

In addition to the above parameter sampling, groundwater samples were collected from selected monitoring well locations for the VOC compound, 1,4-dioxane analysis using EPA Region I 1,4-Dioxane Method. This additional sampling has been conducted at the Eastern Plume since Monitoring Event 24 at the request of the EPA and MEDEP, and is currently not formally part of the Long-Term Monitoring Program at the Eastern Plume. A result table for 1,4-dioxane groundwater sampling can be found in Appendix H

Water quality indicator parameters, including pH, specific conductance, temperature, dissolved oxygen, oxidation-reduction potential, and turbidity, were monitored and recorded to ensure stabilization of water quality prior to sample collection (Tables1-6 through 1-11).

Appendix B, Tables B-1 through B-10 provides a summary of analytical results for groundwater samples collected at Sites 1 and 3 and the Eastern Plume. The data obtained during the September 2006 sampling event were determined to be of sufficient quality to be used to evaluate groundwater quality as described in Section 1.5.

1.4 Surface Water, Leachate Seep, and Leachate Sediment Sampling and Analysis

Samples were collected in accordance with the general methodologies established in the Final LTMP (EA 2000a) with the exception of the collection, preservation, and analysis of sediment samples using EPA Method 5035.

The following types of samples were collected at Sites 1 and 3 in September 2006:

- Surface water;
- Leachate seep; and
- Leachate sediment.

The following types of samples were collected at the Eastern Plume on September 2006:

- Surface water;
- Leachate seep and
- Leachate sediment.

Samples were analyzed by Accutest Laboratory Services for the following analysis:

- LTMP Target Compound List VOCs by EPA Method 8260B;
- LTMP Target Analyte List metals by EPA Method 6010B/7000 or EPA Method 6020; and
- Pesticides by EPA Method 8081A.

1.5 Quality Assurance and Quality Control

A rigorous quality assurance/quality control program is required to meet the data quality objectives of the groundwater sampling program, as outlined in the Final Revision 0 Base-Wide Quality Assurance Project Plan (QAPP) (ECC/EA 2006 issued in January). Quality control samples, field duplicates, matrix spike, rinsate blank, and trip blank samples were collected at the frequency prescribed in the QAPP. Method specific laboratory quality control samples were analyzed by the laboratory at the method prescribed frequency. Appendix D summarizes laboratory and field quality control sample results.

1.6 Analytical Data Quality Review

As required by the Final Revision 0 Base-Wide Quality Assurance Project Plan (QAPP) (ECC/EA 2006), a review of laboratory data was performed on selected quality control parameters to evaluate precision, accuracy, representativeness, completeness, and comparability and data quality objective requirements. A summary of the analytical data quality review for chemical data is provided in Appendix D.

With consideration of the data qualifiers and notes provided in Appendix D, the data represented in this report were found to meet specified acceptance criteria, and therefore represent data in compliance with the Final Revision 0 Base-Wide Quality Assurance Project Plan (QAPP) (ECC/EA 2006). Method detection limits for sediment and aqueous media are included in Appendix D.

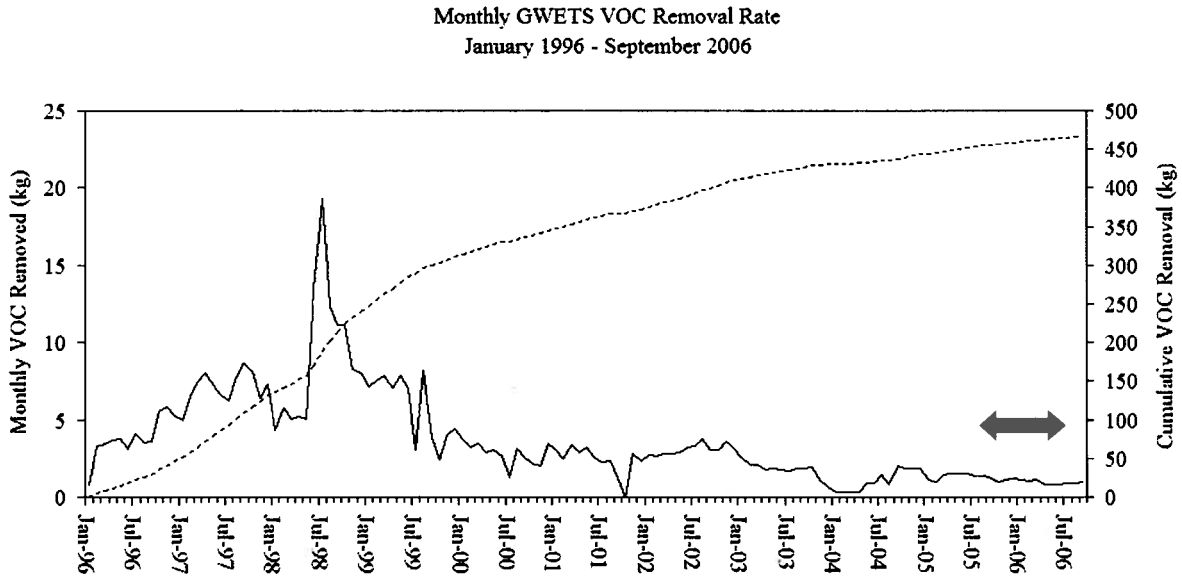
2.0 TEMPORAL TRENDS AND OBSERVATIONS

This section describes observations and trends in site water-level gauging results, field monitoring results, and laboratory analytical results.

2.1 Groundwater Extraction and Treatment System Performance Summary

The GWETS was operational for 93.92 percent of available hours. Table 1-5 summarizes the monthly flow rates for the four extraction wells (EW-01, EW-02A, EW-04, and EW-05A). Although three of the extraction wells were operational 99.38% of available hours, EW-01 was operational only 75.87% of available hours, which brings down the total operation efficiency to 93.92%. EW-1 experienced a period of low operational percentage in July and August.

The chart below summarizes VOC removal rates achieved by the extraction wells in the Eastern Plume during the period January 1996 – September 2006. The dotted line represents the cumulative VOC removal since January 1996.



The monthly VOC removal rates for September 2005 through September 2006 ranged from approximately 0.78 to 1.29 kilograms per month with an average removal rate of 0.99 kilogram per month. The cumulative VOC mass removed from the Eastern Plume since the extraction system began operation is approximately 467.30 kilograms. Data from the effluent samples collected between 30 April 2006 and 30 September 2006 indicated no violations of permit discharge limits established by the Brunswick Sewer District.

2.2 Water Level Gauging Program

Water level measurements from the wells and piezometers were obtained during September 8th, 2006 monitoring event at the locations indicated in Tables 1-1 and 1-2 for Sites 1 and 3 and the Eastern Plume. Figures 1-2 and 1-3 provide the locations of monitoring/gauging

points that comprise the long-term monitoring network at Sites 1 and 3 and Eastern Plume, respectively. A summary of water elevations is presented in Tables 1-3 and 1-4. Figures 1-4 and 1-5 show interpretations of the shallow and deep potentiometric surfaces. At Sites 1 and 3, a comparison of water elevation data collected during long-term monitoring indicates water elevations have decreased in the vicinity of the slurry wall due to active pumping and placement of the slurry wall and landfill cap. The deepest known elevation of the bottom of the waste material at Sites 1 and 3 has been reported to be 31.59 feet above mean sea level (at well MW-216A). As shown on Figure 1-5, groundwater elevation here is 32.22 feet.

Project stakeholders agreed during the 9 October 2003 Technical Meeting to establish the following trigger elevations for each of the monitoring wells in the quarterly groundwater gauging program for the Sites 1 and 3 landfill:

Monitoring Location	Trigger Elevation (Feet above MSL)
EP-17	35
EP-18	35
EP-19	35
EP-20	35
EW-06	39
EW-07	35
MW-234R	33

During the period 30 April 2006 through 30 September 2006, no trigger elevations were reached. The trigger elevations were established to ensure groundwater elevations are below the level of the majority of the waste in the landfill. In the event the trigger event is exceeded the project stakeholders would be notified and any necessary action would be performed on-site.

2.3 Groundwater Monitoring and Sampling Program

This section provides a summary of groundwater sampling results and trends for Sites 1 and 3 and Eastern Plume. This summary focuses on the results for the groundwater sampling and analysis program based on the following criteria:

- Monitoring wells that exhibited increasing analyte concentrations over recent sampling events;
- Monitoring wells that exhibited decreasing analyte concentrations over recent sampling events;
- Monitoring wells that had analyte concentrations that previously exceeded State Maximum Exposure Guidelines (MEGs) and Federal Maximum Contaminant Levels (MCLs) and currently do not have exceedances; and
- Monitoring wells that had analyte concentrations that previously did not exceed State MEGs and Federal MCLs yet currently do exceed the limits.

Appendix B (Tables B-1 through B-10) provides analytical data from the September 2006 sampling event. The temporal trends in groundwater chemicals of concern at Sites 1&3 and the

Eastern Plume between 1996, and the current monitoring event (29) are presented in Appendix C.

The September 2006 monitoring event result tables presented in Sections 2.4 and 2.5 below show total VOC and metal results. Monitoring wells are only shown in the tables in this section if an exceedance of a State Maximum Exposure Guideline (MEG) or Federal Maximum Contaminant Level (MCL) occurred during this monitoring event (29) otherwise the data can be reviewed in Appendix B and Appendix C. In the event that a State MEG or Federal MCL was exceeded the analytical trends are depicted as bar-graphs, showing the overall analytical trends over the last ten monitoring events. The bar graphs are colored in red if an exceedance occurred. The tables in this section provide a summary of the total VOCs, or specific metals concentrations, for selected monitoring wells, leachate seeps, seeps, piezometer, extraction well or the combined influent sample results. A high-low range is also presented for 29 monitoring events and for the earlier monitoring events. For the earlier sampling events, a low-flow sample procedure was used instead of the diffusion sampling procedure, which is now employed at some monitoring well locations. A concentration trend for the analyte of concern is presented as a bar-graph with the ordinate (y-axis) scale in monitoring events (20 through 29), and the abscissa scale (x-axis) in the relative analyte concentration based upon the analyte's historical high-low range. (Note: some analytes were not measured for all monitoring events and a small line (_) serves as a place holder). For each analyte listed in the following trend graphs the corresponding figure in Appendix C is referenced. In addition, the MEG and MCL for each analyte are listed for each compound or metal.

2.4 Sites 1 and 3 – Volatile Organic Compounds and Metals

2.4.1 Monitoring Wells

The in-text tables below summarize the analytical results for the seven groundwater samples collected at Site 1 and 3. Detections above a State MEG or Federal MCL in the seven wells sampled were reported in MW-217B, MW-1301S, MW-1301D, MW-1302S, MW-1302D, MW-1303S, and MW-1303D. The tables show the reported detections above the Federal MCL or State MEG for VOC and metals.

The newly installed (October 2005) monitoring wells couplets (MW-1301S, MW-1301D, MW-1302S, MW-1302D, MW-1303S, and MW-1303D), referred to as the 1300 series wells, located at Sites 1 and 3 were sampled as part of Monitoring Event 28 and 29. However, these six wells are not shown on the tables in the Section as this event was only the second time where groundwater samples were collected from these wells. Reported metal concentrations of aluminum, iron, and manganese exceeded either the MCL or MEG in each of these 1300 series monitoring wells which is suspected to be associated with turbidity. Aluminum concentrations ranged from 1,290 – 9,840 µg/L, iron concentrations ranged from 612 – 18,400 µg/L, and manganese concentrations ranged from 373 – 4,280 µg/L. In addition, the groundwater sample collected from MW-1301D reported a detection of chromium (113 µg/L) for the first time and MW-1303A reported a detection of arsenic for the second time (47.5 µg/L) above the MCL of 10 µg/L. There were three VOC concentrations reported in the groundwater samples collected from these new monitoring well couplets, which exceeded the Federal MCL and/or State MEG. 1,1-Dichloroethane was detected at 93.4 µg/L in monitoring event 29 and

83 J µg/L in monitoring event 28 (MEG, 70 µg/L) in well MW-1302D, vinyl chloride was detected at 10.9 µg/L in monitoring event 29 and 10 J µg/L in monitoring event 28 (MCL, 2 µg/L) in monitoring well MW-1301D, and vinyl chloride was detected at 2.2 µg/L in monitoring event 29 and 1.3 J µg/L in monitoring event 28 (MEG, 0.2 µg/L) in well MW-1302D. Vinyl chloride was also reported in the groundwater sample collected from monitoring well MW-217B at 1.4 µg/L above the MEG (0.2 µg/L).

Monitoring Well MW-217B

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
VOCs	3.40 µg/L	15.2 µg/L	Stable, decreasing	1.93 – 587.4	
Vinyl Chloride (MCL=2, MEG=0.2)	1 J µg/L	1.4 µg/L	Decreasing	ND – 100	
Metals					
Aluminum (MEG=1,430)	240 µg/L	14,000 µg/L	Spike	14.5 – 100,000	
Arsenic (MCL/MEG=10)	10 U µg/L	442 µg/L	Spike	10 - 442	
Beryllium (MCL=4)	5 U µg/L	4.7 J µg/L	Detection Limit**	4.7 - 5	
Chromium (MCL=100, MEG=40)	10 U µg/L	265 µg/L	Spike	10 – 1,600	
Iron	39,000 µg/L	6,210,000 µg/L	Spike	19.6 – 6,210,000	
Lead (MEG = 10 MCL=15)	3 U µg/L	22.3 µg/L	Spike	3 - 52	
Manganese (MEG=500)	1,100 µg/L	3,720 µg/L	Stable	1,100 – 18,100	
Nickel (MEG=140)	40 U µg/L	289 µg/L	Spike	40 – 1,000	

Note – Newly installed monitoring well couplet results are not summarized in this table as these wells were first sampling during Monitoring Event 28.
**Compounds listed with a "Detection Limit" indicate the compound is above the screening value due to detection limit being above the defined standard

It is noted that monitoring well MW-217B had been purged dry during Monitoring Events 24, 25, and 27. These samples had a high turbidity and the sample was "cloudy with particles." Elevated concentrations of metals during these past sampling events are suspected to be associated, at least in part, with the high turbidity and therefore the metal results are not a reliable indicator for assessing the concentration trends for metals.

Monitoring Well MW-218

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
Metals					
Arsenic (MCL/MEG=10)	150 µg/L	Not Sampled	Spike	10 - 680	
Iron	5,100 µg/L	Not Sampled	Spike, decreasing	19.6 – 720,000	
Manganese (MEG=500)	1,100 µg/L	Not Sampled	Stable	1,100 – 18,100	

Note - Monitoring well couplet results are not summarized in this table as these wells were first sampling during Monitoring Event 28.

2.4.2 Surface Water

Surface water samples, SW-04, SW-07, SW-08, SW-09, SW-15 and SW-16, had no detections of VOCs above the Risk-Based Ecological Screening Values. Using the Risk-Based Ecological Screening Values for Surface Water, Seep Water, and Sediment (EA 2006) the six surface water sites above had detections above the screening values for barium and manganese (all six sites), aluminum, and iron at SW-04 (and lead) and SW-16 (Tables B-7 and B-8).

2.4.3 Leachate Seep

As part of the September 2006 monitoring event, five leachate seep samples were collected and analyzed for VOC, TAL Metals, and Pesticides (refer to Appendix B-10, B-11, and B-12). Pesticides were non-detect for this sampling event (except for SEEP-03, SEEP-05, and SEEP-09) but detections were below the screening values. All samples had exceedances of metals as shown in the tables.

Leachate Seep SEEP-01

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	Range (µg/L)	Trend
VOCs*	0.56 µg/L	0.103 J µg/L	Stable	ND – 102	
Metals*					
Aluminum (87)	200 UJ µg/L	224 µg/L	Stable	15.4 – 28,800	
Barium (3.9)	200 U µg/L	28.0 J µg/L	Stable	32.4 – 2,160	
Iron (1,000)	3,600 J µg/L	1,490 µg/L	Decreasing	1,700 – 1,460,000	
Lead (0.41)	3 U µg/L	0.72 J µg/L	Stable	1.5 – 199	
Manganese (120)	260 J µg/L	441µg/L	Stable	118 – 82,500	

*Revised Screening Values for Surface Water, Seep Water, and Sediment, Naval Air Station, Brunswick, Maine, January 2006 (EA 20006) in parenthesis

Leachate Seep SEEP-03

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	Range (µg/L)	Trend
VOCs*	4.20 µg/L	10.26 µg/L	Spike	ND – 108	
Metals*					
Aluminum (87)	23,000 µg/L	941 µg/L	Increasing	15.4 – 23,000	
Barium (3.9)	270 µg/L	49.0 J µg/L	Stable	40.2 – 3,490	
Chromium (11)	130 µg/L	20.2 µg/L	Spike	0.6 - 420	
Copper (2.36)	25 UJ µg/L	11.1 J µg/L	Decreasing	0.7 – 2,500	
Iron (1,000)	320,000 J µg/L	21,200 µg/L	Steady	9,210 – 5,150,000	
Lead (0.41)	51 µg/L	3.5 µg/L	Increasing	0.91 - 150	
Manganese (120)	13,000 J µg/L	2,580 µg/L	Steady	1,020 – 189,000	
Nickel (13.4)	120 µg/L	24.2 J µg/L	Spike, Steady	0.6 – 172	

*Revised Screening Values for Surface Water, Seep Water, and Sediment, Naval Air Station, Brunswick, Maine, January 2006 (EA 20006) in parenthesis

Leachate Seep SEEP-04

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	Range (µg/L)	Trend
VOCs*	0 µg/L	12.6 µg/L	Decreasing	0 – 114.6	
Metals*					
Aluminum (87)	700 J µg/L	2,870 µg/L	Spike	8.2 – 50,000	
Barium (3.9)	200 U µg/L	73.8 J µg/L		44.8 – 1,970	
Chromium (11)	10 U µg/L	107 µg/L	Spike	0.57 - 430	
Copper (2.36)	25 UJ µg/L	24.8 J µg/L	Increasing	0.84 - 600	
Iron (1,000)	13,000 J µg/L	221,000 µg/L	Steady	1,200 – 6,630,000	
Lead (0.41))	30 U µg/L	4.8 µg/L	Spike	1.4 - 90	
Nickel (13.4)	56 µg/L	230 µg/L	Spike	2.6 - 230	
Vanadium (20)	50 U µg/L	59.9 µg/L	Detection Limit**	0.36 - 153	

*Revised Screening Values for Surface Water, Seep Water, and Sediment, Naval Air Station, Brunswick, Maine, January 2006 (EA 20006)
**Compounds listed with a "Detection Limit" indicate the compound is above the screening value due to detection limit being above the defined standard

Leachate Seep SEEP-05

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	Range (µg/L)	Trend
VOCs*	0 µg/L	38.5 µg/L	Steady	0 - 137.2	
Metals*					
Aluminum (87)	220 J µg/L	28,000 µg/L	Spike	0 – 34,800	
Arsenic (150)	140 J µg/L	1,590 µg/L	Steady	7.6 – 15,700	
Barium (3.9)	200 U µg/L	177 J µg/L	Steady	12.4 – 1,690	
Beryllium (0.66)	5 U µg/L	3.7 J µg/L	Steady, Detection Limit**	0.2 – 5	
Chromium (11)	10 U µg/L	39.7 µg/L	Spike	0.7 – 140	
Cobalt (23)	50 U µg/L	209 µg/L	Increasing	1.2 – 209	
Copper (2.36)	25 UJ µg/L	58.6 µg/L	Increasing	1.29 – 600	
Iron (1,000)	110,000 J µg/L	476,000 µg/L	Steady	4,600 – 8,080,000	
Lead (0.41)	3 U µg/L	107 µg/L	Spike	1 – 375	
Manganese (120)	6,700 µg/L	9,540 µg/L	Steady	875 – 58,100	
Mercury (0.91)	0.2 U µg/L	1.0 µg/L	Spike	0.1 – 1	
Nickel (13.4)	40 U µg/L	163 µg/L	Spike	0.85 – 163	
Selenium (5)	5 U µg/L	5.1 J µg/L	Steady, Detection Limit**	1 – 2,720	
Silver (0.23)	10 UJ µg/L	1.5 J µg/L	Steady, Detection Limit**	1 – 260	
Vanadium (20)	50 U µg/L	158 µg/L	Spike	0.1 – 158	

*Revised Screening Values for Surface Water, Seep Water, and Sediment, Naval Air Station, Brunswick, Maine, January 2006 (EA 20006)
**Compounds listed with a "Detection Limit" indicate the compound is above the screening value due to detection limit being above the defined standard

Leachate Seep SEEP-09

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	Range (µg/L)	Trend
VOCs*	3.92 µg/L	0 (0) µg/L	Steady	ND – 24.08	
Metals*					
Aluminum (87)	3,600 J µg/L	371,000 J (273,000 J) µg/L	Spike	48 – 371,000	
Arsenic (150)	170 J µg/L	83.5 J (706 J) µg/L	Steady	5 – 3,470	
Beryllium (0.66)	5 U µg/L	26.4 (20.7) µg/L	Spike, Detection Limit**	0.14 – 26.4	
Cadmium (0.08)	5 U µg/L	83.9 J (8.8 J) µg/L	Spike, Detection Limit**	0.24 – 83.9	
Chromium (11)	10 U µg/L	387 J (287) µg/L	Spike	0.57 – 387	
Copper (2.36)	25 UJ µg/L	576 J (358) µg/L	Spike, Detection Limit**	0.66 – 576	
Iron (1,000)	180,000 J µg/L	2,640,000 J (1,680,000) µg/L	Spike	742 – 2,640,000	
Lead (0.41)	17 µg/L	54.7 J (439) µg/L	Detection Limit**	2 – 98.4	
Manganese (120)	1,900 J µg/L	76,800 (58,500) µg/L	Detection Limit**	100 – 76,800	
Mercury (0.91)	0.2 J µg/L	10.8 (12.4) µg/L	Spike	0.01 – 10.8	
Nickel (13.4)	40 U µg/L	878 J (667 J) µg/L	Spike	1.1 – 878	
Selenium (5)	5 U µg/L	50 UJ (22.9 J) µg/L	Steady	2.39 – 877	
Silver (0.23)	10 UJ µg/L	5.8 J (5.7 J) µg/L	Detection Limit**	1.03 – 102	
Vanadium (20)	50 U µg/L	737 J (576) µg/L	Spike	0.53 – 737	

*Revised Screening Values for Surface Water, Seep Water, and Sediment, Naval Air Station, Brunswick, Maine, January 2006 (EA 20006)
**Compounds listed with a "Detection Limit" indicate the compound is above the screening value due to detection limit being above the defined standard

2.4.4 Leachate Seep Sediment

Results from the metals analysis for Leachate Sediment samples all show exceedance of screening values and are presented in the tables below. Laboratory results for total VOC and metal concentrations are found in Table B-15.

Leachate Sediment LT-01

Analyte	June 2006 (ME28)	September 2006 (ME29)	Trend Assessment	Range (mg/kg)	Trend
Metals*					
Barium (0.7)	7.3 mg/kg	142 mg/kg	Steady	12 - 626	
Beryllium (0.55)	0.47 U mg/kg	1.3 mg/kg	Spike	0.11 – 4.1	
Cadmium (0.99)	0.94 U mg/kg	2.9mg/kg	Spike	0.16 – 8.2	
Cobalt (10)	4.7 U mg/kg	164 mg/kg	Spike	3.4 - 737	
Iron (10,000)	9,100 J mg/kg	52,800 mg/kg	Spike	5,750 – 592,000	
Mercury (0.18)	0.18 mg/kg	0.62 J mg/kg	Spike	0.08 – 8.6	
Nickel (22.7)	4.5 J mg/kg	60.8 mg/kg	Spike	2.8 - 121	
Selenium (0.29)	4.7 U mg/kg	3.8 J mg/kg	Steady	2.3 – 15.2	

*Revised Screening Values for Surface Water, Seep Water, and Sediment, Naval Air Station, Brunswick, Maine, January 2006 (EA 20006) in parenthesis

Leachate Sediment LT-03

Analyte	June 2006 (ME28)	September 2006 (ME29)	Trend Assessment	Range (mg/kg)	Trend
Metals*					
Arsenic (9.8)	7.7 mg/kg	27.7 mg/kg	Spike	1.9 – 36.2	
Barium (0.7)	43 J mg/kg	203 mg/kg	Steady	18.5 – 572	
Beryllium (0.55)	1.3 mg/kg	0.77 mg/kg	Steady	0.11 – 1.6	
Cobalt (10)	4.3 mg/kg	34.3 mg/kg	Spike	2 – 43.9	
Iron (10,000)	19,000 J mg/kg	157,000 mg/kg	Spike	0 – 1.3	
Mercury (0.18)	0.36 mg/kg	1.2 J mg/kg	Seasonal	0.017 – 1.4	
Selenium (0.29)	3.2 U mg/kg	5.0 J mg/kg	Seasonal	1.1 – 11.6	
Silver (0.5)	0.32 U mg/kg	1.2 J mg/kg	Seasonal, decreasing	0.12 – 20.1	

*Revised Screening Values for Surface Water, Seep Water, and Sediment, Naval Air Station, Brunswick, Maine, January 2006 (EA 20006)

Leachate Sediment LT-04

Analyte	June 2006 (ME28)	September 2006 (ME29)	Trend Assessment	Range (µg/L)	Trend
Metals*					
Antimony (0.16)	3.8 U mg/kg	0.63 J mg/kg	Steady	0.26 – 9.81	
Arsenic (9.8)	1.4 mg/kg	33.3 mg/kg	Steady	1.4 - 170	
Barium (0.7)	9.7 J mg/kg	20.3 J mg/kg	Steady	5.5 - 751	
Beryllium (0.55)	0.38 U mg/kg	0.67 J mg/kg	Steady	0.17 – 4.8	
Cobalt (10)	5.1 mg/kg	31.5 mg/kg	Steady	3.5 - 82	
Mercury (0.18)	0.075 mg/kg	0.63 J mg/kg	Steady	0.11 – 2.3	
Nickel (22.7)	12 J mg/kg	54.4 mg/kg	Steady	2 - 170	
Selenium (0.29)	3.8 U mg/kg	3.2 J mg/kg	Steady	0.12 – 23.5	

*Revised Screening Values for Surface Water, Seep Water, and Sediment, Naval Air Station, Brunswick, Maine, January 2006 (EA 20006) in parenthesis

Leachate Sediment LT-05

Analyte	June 2006 (ME28)	September 2006 (ME29)	Trend Assessment	Range (µg/L)	Trend
Metals*					
Arsenic (9.8)	18 mg/kg	416 J mg/kg	Steady	3.4 – 4,900	
Barium (0.7)	8.8 J mg/kg	33.2 mg/kg	Steady	10.6 - 171	
Beryllium (0.55)	0.36 U mg/kg	0.96 mg/kg	Steady	0.5 - 4	
Cadmium (0.99)	0.71 U mg/kg	1.4 mg/kg	Steady	0.13 – 7.48	
Cobalt (10)	13 mg/kg	111 mg/kg	Increasing	8.8 - 151	
Iron (10,000)	6,300 J mg/kg	67,800 mg/kg	Stable	63,100 – 826,000	
Lead (35.8)	4.7 mg/kg	44.1 mg/kg	Spike	0.14 – 65.4	
Mercury (0.18)	0.018 U mg/kg	0.28 J mg/kg	Spike	0.018 – 0.43	
Nickel (22.7)	3.9 J mg/kg	27.7 mg/kg	Spike	3.9 – 45.8	
Selenium (0.29)	3.6 U mg/kg	3.2 J mg/kg	Decreasing	0.14 – 27.3	

*Revised Screening Values for Surface Water, Seep Water, and Sediment, Naval Air Station, Brunswick, Maine, January 2006 (EA 20006) in parenthesis

Leachate Sediment LT-09

Analyte	June 2006 (ME28)	September 2006 (ME29)	Trend Assessment	Range (µg/L)	Trend
Metals*					
Arsenic (9.8)	1.3 mg/kg	363 J (792 J) mg/kg	Spike	1.3 – 604	
Barium (0.7)	22 J mg/kg	51.6 (53.2) mg/kg	Steady	10.7 – 75.8	
Beryllium (0.55)	0.36 U mg/kg	0.59 J (0.64 U) mg/kg	Spike	0.36 – 2.6	
Cobalt (10)	12 mg/kg	80.7 (11.7) mg/kg	Spike	1.7 – 81.7	
Iron (10,000)	12,000 J mg/kg	127,000 (495,000) mg/kg	Steady	15,500 – 480,000	
Manganese (630)	120 J mg/kg	774 J (939 J) mg/kg	Spike	97.1 – 7.270	
Nickel (22.7)	13 J mg/kg	32.3 (3.6 J) mg/kg	Spike	6 – 34	
Selenium (0.29)	3.6 U mg/kg	2.4 J (4 UJ) mg/kg	Steady	0.5 – 43.5	

*Revised Screening Values for Surface Water, Seep Water, and Sediment, Naval Air Station, Brunswick, Maine, January 2006 (EA 20006) in parenthesis

2.4.5 Sediment

Sediment samples were collected as part of the September 2006 monitoring event (SED-09 was not sampled). Of the five sediment samples collected (SED-15, SED-16, SED-17, SED-18, and SED-19) only barium (0.7 mg/kg) exceeded the Risk-Based Ecological Screening Values for Surface Water, Seep Water, and Sediment (EA 2006c) in September 2006 (ranged from 16.5 J – 26.1 J mg/kg). In addition, manganese concentrations (630 mg/kg) reported from SED-17 (756 mg/kg) and SED-19 (720 mg/kg) also exceeded the Risk-Based Ecological Screening Values for Monitoring Event 29 and selenium (0.29 mg/kg) was exceeded in SED-19 (0.46 J mg/kg). No pesticides exceeded the Risk-Based Ecological Screening Values for Surface Water, Seep Water, and Sediment (EA 2006c). No trending is shown since sampling is conducted on an annual basis.

2.5 Eastern Plume - Volatile Organic Compounds

2.5.1 Monitoring Wells - Shallow Interval Wells

There were no reported detections above the MCL or MEG of VOCs at either of the shallow monitoring wells, MW-224 and MW-332. No tables are provided in this section for the shallow monitoring wells samples since there were no reported exceedances. The data for both wells are provided in Appendix B and the trends graphs are provided in Appendix C.

The reported total VOC concentrations and interpreted groundwater contours for wells screened within the shallow interval at the Eastern Plume are shown on Figure 2-1. Of the five shallow monitoring wells only two were sampled and only MW-224 had VOCs detected (Table B-7).

2.5.2 Monitoring Wells – Deep Interval Wells

Groundwater samples were collected from deep groundwater wells at the Eastern Plume, as listed in Table 1-2. Laboratory Form I tables are provided in Appendix H. The tables in this section summarize the analytical results for these groundwater samples. Of the 17 monitoring wells sampled only seven wells reported VOC exceedences of State MEGs or Federal MCLs. The other wells are not shown in the tables below, as this data is provided in Appendix B and the trend charts in Appendix C.

The data summarized in the tables below show a comparison to the previous monitoring event in April 2006, the overall concentration trends, and provides a trend graph of chemical data from the last 10 monitoring events. The reported total VOC concentrations and interpreted groundwater contours for wells screened within the deep interval at the Eastern Plume are shown on Figure 2-2.

Monitoring Well MW-205

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
VOCs	29.32 µg/L	35.5 µg/L	Decreasing	29.32 – 706.1	
Trichloroethene (MCL=5, MEG=32)	10 J µg/L	15.7 µg/L	Decreasing	10 – 280	

Monitoring Well MW-229A

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
Mid Depth Interval					
VOCs	33.7 µg/L	Not Sampled	Decreasing, Stable	71 – 18,990	
Trichloroethene (MCL=5, MEG=32)	13 J µg/L	Not Sampled	Decreasing	16 – 3,400	

Monitoring Well MW-230A

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
Deep Depth Interval					
VOCs	7.58 µg/L	0 µg/L	Decreasing	0 – 14.1	
Trichloroethene (MCL=5, MEG=32)	5.2 J µg/L	1 U µg/L	Stable	0 – 6.6	

Monitoring Well MW-308

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
VOCs	96.72 µg/L	Not Sampled	Spike	0 – 96.72	
Trichloroethene (MCL=5, MEG=32)	49 µg/L	Not Sampled	Stable	0 – 49	

Monitoring Well MW-311

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
Mid Depth Interval (Not Sampled during Monitoring Events 19 – 21)					
VOCs	45.2 µg/L	22.7 µg/L	Decreasing, Stable	71 – 18,990	
Tetrachloroethene (MCL=5, MEG=7)	8.8 J µg/L	14.9 µg/L	Decreasing	4.1 – 200	
Trichloroethene (MCL=5, MEG=32)	15 J µg/L	3.6 µg/L	Decreasing	3.6 – 3,400	
1,1-Dichloroethene (MCL=7, MEG=1)	9.4 J µg/L	1 U µg/L	Decreasing	9.4 – 1,400	
Deep Depth Interval					
VOCs	29.70 µg/L	24.90 µg/L	Decreasing	24.90 – 18,990	
Tetrachloroethene (MCL=5, MEG=7)	15 J µg/L	17 µg/L	Decreasing	4 – 200	

Monitoring Well MW-313

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
VOCs	24.3 µg/L	11.40 µg/L	Decreasing, Stable	11.4 – 18,990	
1,1-Dichloroethene (MCL=7, MEG=1)	13 µg/L	5.4 µg/L	Decreasing	4.1 – 200	
1,4-Dioxane (MEG=32)	78 (120) µg/L	69 J (70.6) µg/L	Decreasing	78 – 180	

Monitoring Well MW-319

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
VOCs	38.00 µg/L	25.7 µg/L	Decreasing, Stable	25.7 – 109.9	
Tetrachloroethene (MCL=5, MEG=7)	29 J µg/L	25.7 µg/L	Decreasing	12 – 59	
Trichloroethene (MCL=5, MEG=32)	6.4 J µg/L	1 U µg/L	Decreasing	1 – 33	

Monitoring Well MW-331

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
VOCs	518.95 µg/L	422.50 µg/L	Decreasing, Stable	244.50 – 1,540.9	
1,4-Dioxane (MEG=32)	26 µg/L	45.5 µg/L	Increasing	7.2 – 28	
Trichloroethene (MCL=5, MEG=32)	68 J µg/L	100 µg/L	Decreasing	68 – 370	
1,2-Dichloroethene, total (MCL=70, MEG=70)	230 J µg/L	94.7 µg/L	Decreasing	4 – 350	
1,1-Dichloroethene (MCL=7, MEG=1)	27 J µg/L	22.5 µg/L	Stable	22.5 – 120	

Monitoring Well MW-333

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
VOCs	23.80 µg/L	15.80 µg/L	Stable	0.9 – 40	
1,1-Dichloroethene (MCl=7, MEG=1)	12 J µg/L	8.6 µg/L	Stable	0.8 – 15	
1,4-Dioxane (MEG=32)	54 µg/L	56.8 µg/L	Stable	47.6 – 60	

Monitoring Well MW-NASB-212

Analyte	September 2005 (ME27)	April 2006 (ME28)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
VOCs	9.0 µg/L	7.3 µg/L	Decreasing	3 – 46.65	
Trichloroethene (MCL=5, MEG=32)	7.8 µg/L	7.3 µg/L	Decreasing	5.5 – 34	

Piezometer P-106

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
VOCs	845.82 µg/L	683.10 µg/L	Stable	683.1 – 6,426	
Tetrachloroethene (MCL=5, MEG=7)	4.3 J µg/L	7.0 µg/L	Decreasing	4.3 – 22	
Trichloroethene (MCL=5, MEG=32)	210 J µg/L	245 µg/L	Decreasing, Stable	170 – 1,300	
1,1,1-Trichloroethane (MCL=200, EG=200)	420 J µg/L	352 µg/L	Decreasing, Stable	360– 4,500	
1,1-Dichloroethene (MCL=7, MEG=1)	58 J µg/L	56.9 µg/L	Decreasing, Stable	58 – 500	
1,4-Dioxane (MEG=32)	31 µg/L	16.1 µg/L	Decreasing	35 – 68.7	

2.5.3 Extraction Wells

The tables below contain summaries of the analytical results for the groundwater samples collected at the extraction wells located at the Eastern Plume. Laboratory Form I tables are provided in Appendix H. The data summarized in these tables show a comparison to the previous monitoring event in April 2006, the overall concentration trends, and provides a trend graph of chemical data from the last 10 monitoring events. The locations of the extraction wells sampled are shown on Figure 1-3.

Extraction Well EW-01

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
VOCs	86.6 µg/L	32.2 µg/L	Decreasing, Stable	41.3 – 189	
1,1,1-Trichloroethane (200, 200)	13 J µg/L	5.9 µg/L	Decreasing	6.8 - 110	
Trichloroethene (MCL=5, MEG=32)	31 J µg/L	15.6 µg/L	Decreasing, Stable	17.5 – 46	

Extraction Well EW-02A

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
VOCs	141.00µg/L	128.10µg/L	Stable	128.1 – 2,083	
Tetrachloroethene (MCL=5, MEG=7)	5 J µg/L	8.4 µg/L	Stable	4 – 18	
1,1,1-Trichloroethane (MCL=200,MEG=200)	50 J µg/L	54 µg/L	Decreasing	50 – 1,800	
Trichloroethene (MCL=5, MEG=32)	28 J µg/L	35.6 µg/L	Stable	40 – 680	
1,1-Dichloroethene (MCL=7, MEG=1)	24 J µg/L	11.6 µg/L	Stable	11.6 – 200	

Extraction Well EW-05A

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
VOCs	35.5 µg/L	24.4 µg/L	Decreasing	28 – 195.2	
1,1,1-Trichloroethane (MCL=200, EG=200)	10 J µg/L	7.1 µg/L	Decreasing	10 – 110	
Trichloroethene (MCL=5, MEG=32)	14 J µg/L	8.6 µg/L	Decreasing	8.6 – 49	

Eastern Plume Combined Influent

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	High-Low Range (µg/L)	Trend (last 10 MEs)
VOCs	110.19 µg/L	98.2 µg/L	Decreasing	129.8 – 858.8	
1,1,1- Trichloroethane (MCL=200, MEG=200)	46 J µg/L	45.1 µg/L	Stable	46 – 670	
Trichloroethene (MCL=5, MEG=5)	31 J µg/L	26.9 µg/L	Decreasing	34 – 170	
1,1-Dichloroethene (MCL=7, MEG=1)	9.3 J µg/L	8 µg/L	Decreasing	7.6 – 52	

2.5.4 Leachate Seep

Leachate Seep (SEEP-10) and leachate Seep (SEEP-11) had no detections of VOCs concentrations above the Risk-Based Ecological Screening Values for Surface Water, Seep Water, and Sediment (EA 2006c) (Table B-8).

2.5.5 Leachate Sediment

The tables below summarize analytical results for the one leachate sediment sample collected at the Eastern Plume (Table B-9). Laboratory Form I tables are provided in Appendix G. The data summarized in the table below shows a comparison to the previous monitoring event in April 2006, the overall concentration trend, and a trend graph of chemical data from the last 10 monitoring events. The locations of the leachate sediment sampled are shown on Figure 1-3.

Leachate Sediment SED-11

Analyte	April 2006 (ME28)	September 2006 (ME29)	Trend Assessment	Range (mg/kg)	Trend
Metals*					
Barium (0.7)	52 mg/kg	36.7 (38.8) mg/kg	Steady	33 – 46.9	
Iron (10,000)	22,000 J mg/kg	18,300 (20,900) mg/kg	Steady	14,000 – 43,000	
Manganese (630)	720 mg/kg	505 (518) mg/kg	Steady	170 - 874	
Selenium (0.29)	7.5 U mg/kg	0.55 J (0.69 J) mg/kg	Spike	0.55 – 7.5	
Pesticides*					
4,4'-DDD (0.00488)	0.14 U mg/kg	0.0115 J (0.0144 J) mg/kg	Steady	0.0115 – 0.14	

*Revised Screening Values for Surface Water, Seep Water, and Sediment, Naval Air Station, Brunswick, Maine, January 2006 (EA 20006) in parenthesis

2.5.6 Surface Water

Surface samples, SW-10, SW-11, SW-12, SW-13, and SW-14 had no detections of VOCs concentrations above the Risk-Based Ecological Screening Values for Surface Water, Seep Water, and Sediment (EA 2006c) (Table B-10).

3.0 LONG TERM MONITORING CONCLUSIONS AND RECOMMENDATIONS

Based on the analysis of the data collected at Sites 1 and 3 and Eastern Plume during the September 2006 Monitoring Event, the following general conclusions and recommendations are provided on the basis of the September 2006 sampling at Sites 1 and 3 and Eastern Plume:

3.1 Conclusions and Recommendations

- **Conclusion** – Arsenic concentrations were reported above the MCL/MEG (10 ppb) in 2 of 6 monitoring wells sampled for metals, and manganese concentrations were reported above the MEG (500 ppb) in 5 of 6 monitoring wells sampled for metals. Elevated VOC concentrations were reported above the MCL and/or MEG at 14 of the 26 monitoring wells sampled.

  Elevated VOC concentrations at were reported above the MCL and/or MEG at 11 of the 19 LTMP monitoring wells sampled in the Eastern Plume. TCE was reported in concentrations above the MCL at 4 monitoring well locations (MW-205, MW-NASB-212, MW-331 and P-106). PCE was reported in concentrations above the MCL at MW-311 and MW-319 and above the MEG at P-106. 1,2-DCE (total) was reported in concentrations above the MCL in MW-331. 1,1,1-TCA was reported in concentrations above the MCL at P-106.

  Recommendation – The installation of one new extraction well location has been agreed to by the Project Stakeholders (scheduled to be installed in Spring 2007 and the Navy in in the process of developing a groundwater model to assist in the selecting the location of a second extraction well at the Eastern Plume. Previous extraction well installations (EW-5A and EW-2A) have resulted in improved VOC removal at hot-spot locations and a similar approach is recommended to remediate other areas with elevated VOCs.

- **Conclusion** – Overall the surface water and seep samples at the Eastern Plume show either non-detect concentrations, or decreasing trends. The surface water samples collected during September 2006 monitoring event were non-detect for VOCs.

  Recommendation –Pore water sampling studies were conducted at Mere Brook in the Fall 2005 and Spring 2006 in order to quantify VOC concentrations near SW-12 and to assess the discharge of the Eastern Plume to Mere Brook and Merriconeag Stream . Additionally, during the Mere Brook Investigation (ECC 2007), piezometers were installed, which will be sampled in Fall 2007.

- **Conclusion** – Based on the data collected to date, the remedial measures completed at Sites 1 and 3 are effective in preventing significant impacts from the Sites 1 and 3 landfill, although inorganic concentrations in seeps and groundwater downgradient of the landfill remain elevated. Elevated vinyl chloride concentrations were reported above the MCL and/or MEG in 3 of the 7 LTMP monitoring wells sampled at Site 1&3. Vinyl chloride exceeded the MCL at MW-1302-D and MW-1301-D.

Recommendation – Continue monitoring the 1300 series monitoring wells located at Site 1&3, and additional down-gradient LTMP monitoring wells, as part of the long term monitoring.

- **Conclusion** – The extraction well network appears to provide hydraulic control of the plume. The recent investigation at the Mere Brook and Merriconeag Stream confluence indicates that localized upwelling of contaminants may be occurring. Surface water results have been historically non-detect for VOCs.

  Recommendation – In order to achieve a totally effective treatment system, consideration should be given to changing the remedial approach for the Eastern Plume to include pump-and-treat in conjunction with hot spot removal/reduction. Pump-and-treat activities have been useful for reducing hot spots of VOCs, and the use of the existing pump-and-treat system is effective for removal of VOC mass. Any modifications to the existing treatment, such as to include hot-spot reduction, would be evaluated once the Eastern Plume groundwater model has been completed along with the site Background Study.

- **Conclusion** – Extraction Well 1 (EW-1) is screened from the shallow to the lower aquifer region, and located between monitoring wells MW-229B and MW-105B.

  Recommendation – Consider re-installation of EW-1 (or an additional extraction well) with the well screen set in the lower sand aquifer.

3.2 Long-Term Monitoring Objectives

The following describes some of the uses for the data collected during the September 2006 Monitoring Event The Final Revision 2 LTMP for Sites 1 and 3 and Eastern Plume is planned to be issued in two separate documents and is planned to be issued in September 2007.

- ***LTMP Goal*** *– Assess the ambient water quality conditions (groundwater and surface water) by collecting samples to monitor trends and assess effectiveness of remedial actions.*

  The Navy is planning to develop of Background Study Work Plan to facilitate establishing natural background conditions for the Site. This Work Plan is planned to be submitted for review in Spring 2007. Long-Term Monitoring data are being collected to assess contaminant trends in surface water and groundwater at Sites 1 and 3 and Eastern Plume. The Navy and MEDEP have conducted investigations in Spring 2006 along the confluence of Mere Brook and Merriconeag Stream to further assess the occurrence of potential plume discharge to surface water.

- ***LTMP Goal*** *– Evaluate the effectiveness of the groundwater extraction system by assessing trends in the concentration of VOCs in groundwater within the boundaries of the Eastern Plume, and provide recommendations to improve system effectiveness.*

The effectiveness of the groundwater extraction system will be made after the results from the investigation and modeling are assessed.

- ***LTMP Goal*** *– Evaluate the effectiveness of the landfill cap and slurry wall by evaluating trends in VOCs and Target Analyte List metals in surface water, groundwater, sediment, and leachate station seep samples within and adjacent to Sites 1 and 3.*

  The effectiveness of the landfill cap and slurry wall can be evaluated with data from the newly installed 1300 series monitoring wells straddling the gap in the Site 1&3 slurry wall.

- ***LTMP Goal*** *– Analyze the effective capture zone of the groundwater extraction system at Sites 1 and 3 and Eastern Plume to determine the degree of hydraulic control achieved through remedial pumping.*

  The effective capture zone of the groundwater extraction system and the degree of hydraulic control can be assessed by data currently being collected. The Navy is in the process of developing a groundwater flow model for the Eastern Plume to further assess the degree of hydraulic control achieved through the current extraction well network and to gain further understanding of the contaminant migration beneath the site.

4.0 REFERENCES

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TABLES

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TABLE 1-1
SUMMARY OF LONG-TERM MONITORING PROGRAM AT SITES 1 AND 3
SEPTEMBER 2006 SAMPLING EVENT

Sample Type/Location	Monitoring Frequency	Slurry Wall	Sample Parameters			Monitoring Event 29	
			TCL VOC	TAL Elements	Field Parameters[a]	Gauged	Sampled
Shallow Monitoring Wells							
MW-201R	Bi-Annual	Outside	NR	NR	NR	X	NR
MW-202A	Annual[b]	Outside	X[b]	X	NR	X	NR
MW-203	Annual[b]	Outside	X[b]	X	NR	X	NR
MW-204	Annual[c]	Outside	X[c]	X	NR	X	NR
MW-210B	Bi-Annual	Outside	NR	NR	NR	X	NR
MW-211B	Bi-Annual	Inside	NR	NR	NR	X	NR
MW-215R	Bi-Annual	Inside	NR	NR	NR	X	NR
MW-217B	Bi-Annual	Inside	X[d]	X	X	X	X
MW-234R	Bi-Annual	Inside	NR	NR	NR	X	NR
MW-240	Annual[c]	Outside	X[c]	X	NR	X	NR
MW-2101	Annual[c]	Outside	X[c]	X	NR	X	NR
MW-1301S	Bi-Annual	Outside	X[d]	X	X	X	X
MW-1302S	Bi-Annual	Outside	X[d]	X	X	X	X
MW-1303S	Bi-Annual	Outside	X[d]	X	X	X	X
Deep Monitoring Wells							
MW-216A	Bi-Annual	Inside	NR	NR	NR	X	NR
MW-217A	Bi-Annual	Inside	NR	NR	NR	X	NR
MW-218	Annual[b]	Outside	X[b]	X	NR	X	NR
MW-219	Annual[c]	Outside	NR	NR	NR	X	NR
MW-220	Bi-Annual	Outside	NR	NR	NR	X	NR
MW-232A	Bi-Annual	Inside	NR	NR	NR	X	NR
MW-233R	Bi-Annual	Inside	NR	NR	NR	X	NR
MW-1301D	Bi-Annual	Outside	X[d]	X	X	X	X
MW-1302D	Bi-Annual	Outside	X[d]	X	X	X	X
MW-1303D	Bi-Annual	Outside	X[d]	X	X	X	X
Bedrock Wells							
MW-210A	Bi-Annual	Outside	NR	NR	NR	X	NR
MW-210R	Bi-Annual	Inside	NR	NR	NR	X	NR
MW-211A	Bi-Annual	Inside	NR	NR	NR	X	NR
Extraction Wells							
EW-06	Bi-Annual	Inside	NR	NR	NR	X	NR
EW-07	Bi-Annual	Inside	NR	NR	NR	X	NR

(a) Determination of field parameters in accordance with U.S. Environmental Protection Agency 600/4-79/020 using the following methods: pH (Method 150.1), temperature (Method 170.1), specific conductance (Method 120.1), and turbidity (Method 180.1). Optional field parameters, including dissolved oxygen (Method 360.1) and ORP $_{(Ag/AgCl)}$, were also recorded. The field parameters also include observation and recording of the water level measurement.
(b) Annual sampling is performed in April
(c) Sampling every two years in April
(d) Groundwater sample collected by low-flow and diffusion sampler method.

NOTE: TCL = Target Compound List.
VOC = volatile organic compound (U.S. Environmental Protection Agency SW-846).
TAL = Target Analyte List.
NR = not required.

TABLE 1-1 (continued)
SUMMARY OF LONG-TERM MONITORING PROGRAM AT SITES 1 AND 3

Sample Type/Location	Monitoring Frequency	Sample Parameters			Monitoring Event 29	
		TCL VOC	TAL Elements	Field Parameters[a]	Gauged	Sampled
Shallow EP-Series Piezometers						
EP-16	Bi-Annual	Inside	NR	NR	X	NR
EP-17	Bi-Annual	Inside	NR	NR	X	NR
EP-18	Bi-Annual	Inside	NR	NR	X	NR
EP-19	Bi-Annual	Inside	NR	NR	X	NR
EP-20	Bi-Annual	Inside	NR	NR	X	NR
Leachate Station Seep						
SEEP-1	Bi-Annual	X	X	X	NR	X[c]
SEEP-3	Bi-Annual	X	X	X	NR	X[c]
SEEP-4	Bi-Annual	X	X	X	NR	X[c]
SEEP-5	Bi-Annual	X	X	X	NR	X[c]
SEEP-9	Bi-Annual	X	X	X	NR	X
Leachate Station Sediment						
LT-1	Bi-Annual	X	X	NR	NR	X
LT-3	Bi-Annual	X	X	NR	NR	X
LT-4	Bi-Annual	X	X	NR	NR	X
LT-5	Bi-Annual	X	X	NR	NR	X
LT-9	Bi-Annual	X	X	NR	NR	X
Surface Water						
SW-4	Bi-Annual	X	X	X	NR	X
SW-7	Bi-Annual	X	X	X	NR	X
SW-8	Bi-Annual	X	X	X	NR	X
SW-9	Bi-Annual	X	X	X	NR	X
SW-15	Annual[d]	X	X	X	NR	X
SW-16	Annual[d]	X	X	X	NR	X
Sediment						
SED-9	Annual[d]	NR	NR	NR	NR	Not Sampled
SED-15	Annual[c,d]	NR	NR	NR	NR	X
SED-16	Annual[c,d]	NR	NR	NR	NR	X
SED-17	Annual[c,d]	NR	NR	NR	NR	X
SED-18	Annual[c,d]	NR	NR	NR	NR	X
SED-19	Annual[c,d]	NR	NR	NR	NR	X

(c) These seep samples were additionally analyzed for pesticides by EPA Method 8081A
(d) Annual samples collected in September.

TABLE 1-2
SUMMARY OF LONG-TERM MONITORING PROGRAM AT EASTERN PLUME

Sample Type/Location	Monitoring Frequency	Well Location	Sample Parameters		Monitoring Event 29	
			TCL VOC	Field Parameters[a]	Gauged	Sampled
Shallow Monitoring Wells						
MW-105B	Bi-Annual	Perimeter	NR	NR	X	NR
MW-106	Bi-Annual	NA	NR	NR	X	NR
MW-206B	Bi-Annual	NA	NR	NR	X	NR
MW-207B	Bi-Annual	NA	NR	NR	X	NR
MW-209	Bi-Annual	NA	NR	NR	X	NR
MW-222	Bi-Annual	NA	NR	NR	X	NR
MW-223	Bi-Annual	NA	NR	NR	X	NR
MW-224	Bi-Annual	Perimeter	X[b]	X	X	X
MW-225B	Bi-Annual	NA	NR	NR	X	NR
MW-229B	Bi-Annual	NA	NR	NR	X	NR
MW-231B	Annual[c]	Sentinel	NR	NR	X	NR
MW-307	Bi-Annual	NA	NR	NR	X	NR
MW-318	Annual[c]	Sentinel	NR	NR	X	NR
MW-332	Bi-Annual	Interior Plume	X[b]	X	X	X
MW-1104	Annual[c]	Perimeter	NR	NR	X	NR
Deep Monitoring Wells						
MW-105A	Annual[c]	Perimeter	X	NR	X	NR
MW-205	Bi-Annual	Interior Plume	X[c]	NR	X	X
MW-206A	Bi-Annual	NA	NR	NR	X	NR
MW-207A	Bi-Annual	Interior Plume	Destroyed and replaced with MW-207AR			
MW-207AR(M,D)	Annual[d]	Interior Plume	X[c]	NR	X	NR
MW-208	Bi-Annual	NA	NR	NR	X	NR
MW-225A	Annual[d]	Interior Plume	X[c]	NR	X	NR
MW-229A	Annual[d]	Interior Plume	X[c]	NR	X	NR
MW-230A	Bi-Annual	Sentinel	X[b]	X	X	X
MW-230B	Bi-Annual	Sentinel	NR	NR	X	NR
MW-231A	Annual[d]	Sentinel	X[c]	NR	X	NR
MW-303	Annual[d]	Sentinel	X[c]	NR	X	NR
MW-305	AAnnual[c]	Sentinel	Sentinel	NR	NR	X
MW-306	Annual[d]	Perimeter	X[c]	NR	X	NR
MW-310	Bi-Annual	NA	NR	NR	X	NR
MW-311(M,D)	Bi-Annual	Interior Plume	X[b]	X	X	X
MW-312	Bi-Annual	NA	NR	NR	X	NR

(a) Determination of field parameters in accordance with U.S. Environmental Protection Agency 600/4-79/020 using the following methods: pH (Method 150.1), temperature (Method 170.1), specific conductance (Method 120.1), and turbidity (Method 180.1). Optional field parameters, including dissolved oxygen (Method 360.1) and ORP $_{(Ag/AgCl)}$, were also recorded. The field parameters also include observation and recording of the water level measurement.
(b) The groundwater sample was collected utilizing the diffusion sampler method.
(c) Sampling every two years in April
(d) Annual sampling is performed in April

NOTE:
TCL = Target Compound List.
VOC = Volatile organic compound.
NR = Sampling is not required
NA = Not applicable. Well is not sampled, therefore, location is not indicated.
Perimeter = Located at the edge of the plume to monitor concentrations of plume boundary.
Sentinel = Outside area of known contamination to be used to warn of plume migration.
Interior Plume = Within area of known contamination to monitor plume migration.

TABLE 1-2 (continued)
SUMMARY OF LONG-TERM MONITORING PROGRAM AT EASTERN PLUME

Sample Type/Location	Monitoring Frequency	Well Location	Sample Parameters		Monitoring Event 29	
			TCL VOC	Field Parameters[a]	Gauged	Sampled
Deep Monitoring Wells (continued)						
MW-313	Bi-Annual	Sentinel	X[b]	X	X	X
MW-315A	Bi-Annual	Sentinel	X[b]	X	X	X
MW-319	Bi-Annual	Interior Plume	X[b]	X	X	X
MW-330	Annual[c]	Perimeter	NR	NR	NR	NR
MW-331	Bi-Annual	Interior Plume	X[b]	X	X	X
MW-333	Bi-Annual	Interior Plume	X[b]	X	X	NR
MW-334	Bi-Annual	Sentinel	X	NR	NR	NR
MW-335	Bi-Annual	Sentinel	X[b]	X	X	X
MW-336	Bi-Annual	Sentinel	X[b]	X	X	X
MW-337	Bi-Annual	Sentinel	X[b]	X	X	X
MW-338A	Bi-Annua	Sentinel	X[b]	X	X	X
MW-338B	Bi-Annual	Sentinel	X[b]	X	X	X
MW-338C	Bi-Annual	Sentinel	X[b]	X	X	X
MW-339	Bi-Annual	Sentinel	X[b]	X	X	X
MW-NASB-212	Bi-Annual	Perimeter	X[b]	X	X	X
Bedrock Monitoring Wells						
MW-308	Annual[d]	Sentinel	X	NR	NR	NR
MW-309A	Bi-Annual	NA	NR	NR	NR	NR
MW-309B	Annual[d]	Sentinel	X	NR	NR	NR
MW-316A	Bi-Annual	NA	NR	NR	X	NR
MW-316B	Bi-Annual	NA	NR	NR	X	NR
MW-317A	Bi-Annual	NA	NR	NR	X	NR
MW-317B	Bi-Annual	NA	NR	NR	X	NR
MW-323	Annual[c]	NA	X[c]	NR	X	NR
Shallow P-Series Piezometers						
P-103	Bi-Annual	NA	NR	NR	X	NR
P-111	Bi-Annual	Perimeter	X[c]	X	X	X
P-121	Bi-Annual	NA	NR	NR	X	NR
P-132	Annual[c]	Sentinel	NR	NR	NR	NR
Deep P-Series Piezometers						
PZ-1	Bi-Annual	NA	NR	NR	X	NR
PZ-2	Bi-Annual	NA	NR	NR	X	NR
PZ-6	Bi-Annual	NA	NR	NR	X	NR
PZ-11	Bi-Annual	NA	NR	NR	X	NR
P-105	Bi-Annual	NA	NR	NR	X	NR
P-106	Bi-Annual	Interior Plume	X[c]	X	X	X
P-123	Bi-Annual	NA	NR	NR	X	NR
Extraction Wells						
EW-01	Bi-Annual	Interior Plume	X	X	X	X
EW-02A	Bi-Annual	Interior Plume	X	X	X	X
EW-04	Bi-Annual	Interior Plume	X	NR	NR	NR
EW-05A	Bi-Annual	Interior Plume	X	X	X	X
Deep EP-Series Piezometers						
EP-01	Bi-Annual	NA	NR	NR	X	NR
EP-02	Bi-Annual	NA	NR	NR	X	NR
EP-03	Bi-Annual	NA	NR	NR	X	NR
EP-04	Bi-Annual	NA	NR	NR	X	NR
EP-05	Bi-Annual	NA	NR	NR	X	NR
EP-06	Bi-Annual	NA	NR	NR	X	NR
EP-07	Bi-Annual	NA	NR	NR	X	NR

TABLE 1-2 (continued)
SUMMARY OF LONG-TERM MONITORING PROGRAM AT EASTERN PLUME

Sample Type/Location	Monitoring Frequency	Well Location	Sample Parameters		Monitoring Event 29	
			TCL VOC	Field Parameters[a]	Gauged	Sampled
Deep EP-Series Piezometers (continued)						
EP-09	Bi-Annual	NA	NR	NR	X	NR
EP-10	Bi-Annual	NA	NR	NR	X	NR
EP-11	Bi-Annual	NA	NR	NR	X	NR
EP-12	Bi-Annual	NA	NR	NR	X	NR
EP-13	Bi-Annual	NA	NR	NR	X	NR
EP-14	Bi-Annual	NA	NR	NR	X	NR
EP-15	Bi-Annual	NA	NR	NR	X	NR
Surface Water						
SW-10	Bi-Annual	NA	X	X	NR	X
SW-11	Bi-Annual	NA	X	X	NR	X
SW-12	Bi-Annual	NA	X	X	NR	X
SW-13	Bi-Annual	NA	X	X	NR	X
SW-14	Bi-Annual	NA	X	X	NR	X
GP-1A	Bi-Annual	NA	NR	NR	X	NR
GP-2A	Bi-Annual	NA	NR	NR	X	NR
GP-3B	Bi-Annual	NA	NR	NR	X	NR
GP-4A	Bi-Annual	NA	NR	NR	X	NR
GP-5B	Bi-Annual	NA	NR	NR	X	NR
GP-6A	Bi-Annual	NA	NR	NR	X	NR
Seep						
SEEP-10	Bi-Annual	NA	X	X	NR	X
SEEP-11	Bi-Annual	NA	X	X	NR	X
Sediment						
SED-11	Bi-Annual	NA	X[d]	NR	NR	X
Other						
TPE	Bi-Annual	NA	X	NR	NR	X
Raw Influent	Bi-Annual	NA	X	NR	NR	X

(d) Sediment samples to be analyzed for Target Analyte List elements, organochlorine pesticides by U.S. Environmental Protection Agency Method 8081, total organic carbon, and grain size.

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TABLE 1-3
MONITORING WELL GAUGING SUMMARY FOR SEPTEMBER 2006
AT SITES 1 AND 3

Well Designation	Well Riser Elevation (ft MSL)	Depth to Well Bottom (ft below top of well riser)	Slurry Wall	Depth to Water (ft below top of well riser)	Groundwater Elevation (ft MSL)
Shallow Monitoring Wells					
MW-201R	58.88	49.68	Outside	12.23	46.65
MW-202A	52.40	31.09	Outside	22.18	30.22
MW-203	52.75	42.04	Outside	30.50	22.25
MW-204	50.50	37.18	Outside	29.08	21.42
MW-210B	54.72	40.85	Outside	26.23	28.49
MW-211B	65.44	35.87	Inside	33.52	31.92
MW-215R	62.26	59.00	Inside	29.97	32.29
MW-217B	61.25	32.90	Inside	29.08	32.17
MW-234R	68.55	59.10	Inside	37.00	31.55
MW-240	52.21	42.60	Outside	29.68	22.52
MW-2101	61.05	30.00	Outside	11.60	49.45
Deep Monitoring Wells					
MW-216A	71.17	47.75	Inside	38.95	32.22
MW-217A	61.78	10.39	Inside	30.72	31.06
MW-218	54.16	53.54	Outside	33.34	17.56
MW-219	51.87	71.82	Outside	28.76	23.11
MW-220	47.20	51.43	Outside	23.37	23.83
MW-232A	71.18	34.78	Inside	39.36	31.82
MW-233R	63.94	38.72	Inside	32.44	31.50
Bedrock Monitoring Wells					
MW-210A	52.17	106.32	Outside	16.15	36.02
MW-210R	55.90	112.35	Inside	19.14	36.76
MW-211A	65.59	142.76	Inside	22.85	42.74
Extraction Wells					
EW-06	57.74	59.93	Inside	22.95	34.79
EW-07	51.13	48.90	Inside	22.81	28.32
Shallow EP Series Piezometers					
EP-16	58.92	59.52	Inside	30.12	28.80
EP-17	69.73	42.70	Inside	37.66	32.07
EP-18	68.58	38.93	Inside	36.60	31.98
EP-19	68.22	46.59	Inside	36.47	31.75
EP-20	69.55	47.25	Inside	37.58	31.97

NOTE: MSL = Mean sea level.

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TABLE 1-4
MONITORING WELL GAUGING SUMMARY FOR SEPTEMBER 2006
EASTERN PLUME

Well Designation	Well Riser Elevation (ft MSL)	Depth to Well Bottom (ft below top of well riser)	Depth to Water (ft below top of well riser)	Groundwater Elevation (ft MSL)
Shallow Monitoring Wells				
MW-105B	24.55	21.91	7.10	17.45
MW-106	51.26	37.27	16.90	34.36
MW-206B	42.77	27.17	14.88	27.89
MW-207B	22.90	9.21	6.60	16.30
MW-209	54.84	32.38	18.34	36.50
MW-222	57.43	45.34	21	36.43
MW-223	53.71	42.61	18.75	34.96
MW-224	57.63	46.01	20.18	37.45
MW-225B	46.25	42.00	15.10	31.15
MW-229B	30.08	33.14	15.13	14.95
MW-231B	46.31	37.99	22.50	23.81
MW-307	62.70	22.21	15.07	47.63
MW-318	24.28	25.14	6.03	18.25
MW-332	25.33	21.03	9.82	15.51
MW-1104	60.09	27.55	8.41	51.68
Deep Monitoring Wells				
MW-105A	24.19	47.75	Artesian Well	Artesian Well
MW-205	45.99	79.00	21.32	24.67
MW-206A	43.02	74.36	15.01	28.01
MW-207A	Destroyed and replaced with MW-207AR			
MW-207AR(a)	23.42	(a)	Artesian Well	Artesian Well
MW-208	49.40	102.80	14.78	34.62
MW-225A	45.95	76.03	13.88	32.07
MW-229A	33.83	64.97	11.11	22.72
MW-230A	36.32	81.49	12.94	23.38
MW-231A	45.41	61.19	18.63	26.78
MW-303	44.28	72.75	10.8	33.48
MW-305	43.09	53.51	12.41	30.68
MW-306	52.12	56.98	13.06	39.06
MW-310	53.39	73.25	23.67	29.72
MW-311	21.48	56.25	7.46	14.02
MW-312	35.97	71.15	10.51	25.46
MW-313	21.39	37.47	7.78	13.61
MW-315A	22.86	64.50	0.4	NA
MW-319	40.16	72.60	7.39	32.77
MW-330B	35.71	36.36	2.04	33.67
MW-331	30.54	56.23	Artesian well	Artesian Well
MW-333	27.25	42.85	9.25	18.00
MW-334	30.93	47.80	8.29	22.64
MW-335	40.91	86.00	17.36	NA

TABLE 1-4 (continued)
MONITORING WELL GAUGING SUMMARY FOR SEPTEMBER 2006
EASTERN PLUME

Well Designation	Well Riser Elevation (ft MSL)	Depth to Well Bottom (ft below top of well riser)	Depth to Water (ft below top of well riser)	Groundwater Elevation (ft MSL)
Deep Monitoring Wells (continued)				
MW-336	29.62	26.00	11.14	18.48
MW-337	37.19	85.00	13.85	23.34
MW-338A	21.37	91.00	Artesian Well	Artesian Well
MW-338B	21.48	70.00	Artesian Well	Artesian Well
MW-338C	21.65	52.00	2.07	19.58
MW-339	22.54	72.00	1.23	21.31
MW-NASB-212	41.64	64.29	7.52	34.12
Bedrock Monitoring Wells				
MW-308	37.70	73.25	2.10	35.69
MW-309A	22.84	72.71	Artesian well	Artesian well
MW-309B	22.32	59.25	Artesian well	Artesian well
MW-316A	53.71	103.10	21.06	32.65
MW-316B	54.40	57.85	11.65	42.75
MW-317A	71.35	120.79	14.16	57.19
MW-317B	70.10	96.95	12.93	75.17
MW-323	55.90	39.00	7.52	48.38
Shallow P-Series Piezometers				
P-103	60.35	28.75	19.35	41.00
P-111	31.48	9.98	4.93	26.55
P-121	50.78	17.35	15.40	35.38
P-132	42.95	32.46	18.13	24.82
Deep P-Series Piezometers				
PZ-1	47.88	58.00	23.37	24.51
PZ-2	39.66	55.50	16.90	22.76
PZ-6	33.14	55.60	12.90	20.24
PZ-11	53.66	41.10	21.85	31.81
P-105	42.08	70.35	5.87	36.21
P-106	38.83	72.40	5.52	33.31
P-123	Ice Damage to PVC Riser, Cannot Gauge			
Extraction Wells				
EW-01	25.34	99.66	15.16	10.18
EW-02A	22.27	66.00	27.27	-5.00
EW-04	37.13	69.37	11.13	26.00
EW-05A	37.63	82.00	10.27	27.36

TABLE 1-4 (continued)
MONITORING WELL GAUGING SUMMARY FOR SEPTEMBER 2006
EASTERN PLUME

Well Designation	Well Riser Elevation (ft MSL)	Depth to Well Bottom (ft below top of well riser)	Depth to Water (ft below top of well riser)	Groundwater Elevation (ft MSL)
Deep EP-Series Piezometers				
EP-01	31.67	101.22	7.73	23.94
EP-02	29.74	99.00	6.18	23.56
EP-03	27.91	89.21	3.80	24.11
EP-04	32.59	91.11	1.80	30.79
EP-05	34.61	79.85		34.61
EP-06	40.14	83.51	8.10	32.04
EP-07	48.49	70.20	13.50	34.99
EP-08	47.31	80.38	12.11	35.20
EP-09	37.84	62.46	2.40	35.44
EP-10	37.78	57.73	2.62	35.16
EP-11	41.59	65.03	4.94	36.65
EP-12	49.38	69.61	12.22	37.16
EP-13	38.96	70.93	1.40	37.56
EP-14	43.46	80.05	6.05	37.41
EP-15	45.37	82.68	8.15	37.22

Surface Water Gauging Stations			
Well Designation	Gauging Point Elevation (ft MSL)	Depth to Water (ft below gauging point)	Surface Water Elevation (ft MSL)
GP-1A	25.39	2.22	27.61
GP-2A	23.92	1.50	25.42
GP-3B	31.15	0.22	31.15
GP-4A	17.68	submerged	
GP-5B	12.09	submerged	
GP-6A	7.46	2.6	10.06

(a) MW-207AR was completed in 2002 and has not been sounded for total depth.
(b) MW-331 has an obstruction approximately one foot into the well due possibly from frost damage
NOTE: MSL = Mean sea level.

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TABLE 1-5
GROUNDWATER EXTRACTION AND TREATMENT SYSTEM (BUILDING 50)

Date	EW-01					EW-02A				
	Days Operated Days	Ave Flow rate GPM	Total Run Time Hours	Percent Operation	Water Treated Gallons	Days Operated Days	Ave Flow rate GPM	Total Run Time Hours	Percent Operation	Water Treated Gallons
Apr 06	30	4.3	709.3	98.51%	181,754	30	12.0	709.3	98.51%	510,703
May-06	31	5.6	740.0	99.46%	250,560	31	12.0	740	99.46%	532,800
Jun-06	30	4.5	717.8	99.69%	195,240	30	12.0	717.8	99.69%	516,780
Jul-06	31	4.0	245.8	33.04%	58,999	31	11.7	740.6	99.54%	518,818
Aug-06	31	5.0	182.6	24.54%	78,893	31	12.0	737.1	99.07%	530,698
Sep-06	30	10.0	720.0	100%	432,000	30	12.0	720.0	100%	518,400
Totals	182	5.57	3,315.5	75.87%	1,197,446	182	11.95	4,364.8	99.38%	3,128,199

Date	EW-04					EW-05A				
	Days Operated Days	Ave Flow rate GPM	Total Run Time Hours	Percent Operation	Water Treated Gallons	Days Operated Days	Ave Flow rate GPM	Total Run Time Hours	Percent Operation	Water Treated Gallons
Apr 06	30	25.0	709.3	98.51%	1,063,965	30	6.0	709.3	98.51%	255,352
May-06	31	25.0	740	99.46%	1,110,000	31	6.0	740	99.46%	266,400
Jun-06	30	25.0	717.8	99.69%	1,076,625	30	6.0	717.8	99.69%	258,390
Jul-06	31	25.0	740.6	99.54%	1,110,870	31	6.0	740.6	99.54%	266,609
Aug-06	31	25.0	737.1	99.07%	1,105,620	31	6.0	737.1	99.07%	265,349
Sep-06	30	24.3	720.0	100%	1,051,200	30	5.5	720.0	100%	236,160
Totals	182	24.88	4,364.8	99.38%	6,518,280	182	5.92	4,364.8	99.38%	1,548,260

	Total Days Available	Total Hours	Total Run Time (Hours)	Percent Operation	Water Treated (Gallons)
Totals	728	17,472	16,409.9	93.92%	12,392,185

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TABLE 1-6
SUMMARY OF WATER QUALITY INDICATOR PARAMETERS MEASURED IN LOW-FLOW GROUNDWATER SAMPLES COLLECTED IN SEPTEMBER 2006 SITES 1 AND 3

Well Designation	Location Relative to Slurry Wall	pH	Temperature (°C)	Conductivity (µmhos/cm)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	ORP (mV)
Shallow Monitoring Wells							
MW-217B[a]	Inside	5.57	13.89	648	3.03	170	16.0
MW-1301S	Outside	5.80	13.40	1,160	0.83	3.1	67.2
MW-1302S	Outside	5.04	10.30	461	2.10	5	83.4
MW-1303A-S	Outside	5.48	17.74	291	1.18	5	141.7
Deep Monitoring Wells							
MW-1301D	Outside	6.17	15.90	2,111	0.81	160	216.6
MW-1302D	Outside	6	12.66	720	3.44	8.3	33.6
MW-1303A-D	Outside	6.38	15.29	758	0.82	29	67.3

(a) MW 217B was sampled by low-flow and a passive aqueous diffusion bag.

NOTE:

°C = degrees Celsius
µmhos/cm = microhms per centimeter
mg/L = milligram per liter
mV = millivolts
NTU = Nephelometric turbidity unit.

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TABLE 1-7
SUMMARY OF WATER QUALITY INDICATOR PARAMETERS MEASURED IN LOW-FLOW GROUNDWATER SAMPLES COLLECTED IN SEPTEMBER 2006 AT EASTERN PLUME

Well Designation	pH	Temperature (°C)	Conductivity (µmhos/-cm)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	ORP (mV)
Shallow P-Series Piezometers						
P-111	6.45	13.67	125	0.66	2	316
Deep P-Series Piezometers						
P-106	6.92	9.59	116	9.24	1	261

NOTE: °C = degrees Celsius
µmhos/cm = microhms per centimeter
mg/L = milligram per liter
mV = millivolt
NTU = Nephelometric turbidity unit.

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TABLE 1-8
SUMMARY OF WATER QUALITY INDICATOR PARAMETERS MEASURED IN AQUEOUS DIFFUSION GROUNDWATER SAMPLES COLLECTED IN SEPTEMBER 2006 AT EASTERN PLUME

Well Designation	pH	Temperature (°C)	Conductivity (µmhos/cm)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	ORP (mV)
Shallow Monitoring Wells						
MW-224	5.87	9.04	85	10.85	---	62.8
MW-332	6.50	12.30	45	7.19	---	85
Deep Monitoring Wells						
MW-205	6.93	8.45	169	2.25	---	-22.9
MW-230A	7.33	8.11	127	0.12	---	-83.3
MW-311 [(a)]	6.68	8.15	297	0.35	---	-66
MW-313	8.17	7.8	272	0.27	---	-114.9
MW-315A	7.69	8.20	174	0.11	---	-68.0
MW-319	6.31	8.39	350	1.44	---	160
MW-331 [(b)]						
MW-333	8.18	7.82	296	0.56	---	-125.3
MW-335	5.81	7.98	287	2.60	---	-48.4
MW-336	5.90	8.53	39	8.74	---	97.2
MW-337	8.62	8.02	121	0.12	---	-64.2
MW-338A	8.55	8.34	1,131	2.18	---	-129.6
MW-338B	8.24	8.00	122	0.21	---	-117.8
MW-338C	6.04	8.84	61	8.80	---	105.3
MW-339	5.62	8.19	136	1.61	---	-53.7
MW-NASB-212	7.02	9.54	338	0.36	---	-41.4

= (a) Water quality parameters taken from the deep interval.
(b) Well obstructed unable to take measurements.

NOTE:
°C = degrees Celsius
µmhos/cm = microhms per centimeter
mg/L = milligram per liter
mV = millivolt
NTU = Nephelometric turbidity unit.
Dashes (---) indicate data not collected from diffusion samplers as deionized water is used to construct sampling apparatus.

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TABLE 1-9
SUMMARY OF WATER QUALITY INDICATOR PARAMETERS MEASURED IN WATER SAMPLES COLLECTED FROM EXTRACTION WELLS AND THE TREATMENT PLANT IN SEPTEMBER 2006 AT EASTERN PLUME

Well Designation	pH	Temperature (°C)	Conductivity (µmhos/cm)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	ORP (mV)
Extraction Wells						
EW-01	6.43	9.10	193	11.55	29	106.9
EW-02A	6.42	9.12	289	10.32	18	36.2
EW-04	Not Sampled					
EW-05A	6.42	10.89	124	9.19		122.7
Groundwater Treatment Plant						
Eastern Plume Raw Influent	6.68	11.07	174	7.94	<2	69
Combined Effluent	7.43	14.64	173	10.05	<1	64

NOTE: °C = degrees Celsius
µmhos/cm = microhms per centimeter
mg/L = milligram per liter
mV = millivolt
NTU = Nephelometric turbidity unit

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TABLE 1-10
SUMMARY OF WATER QUALITY INDICATOR PARAMETERS MEASURED IN SURFACE WATER AND SEEP SAMPLES COLLECTED IN SEPTEMBER 2006 AT SITES 1 AND 3

Sample Designation	pH	Temperature (°C)	Conductivity (µmhos/cm)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	ORP (mV)
Surface Water						
SW-4	6.8	13.74	195	8.77	9	-63.9
SW-7	6.72	14.50	193	9.76	9.2	28.3
SW-8	6.64	16.33	184	9.86	6.1	-23.1
SW-9	6.74	15.72	300	10.32	5.9	-38.7
SW-15	6.70	14.84	188	9.92	38	-2.0
SW-16	6.82	14.76	171	7.95	6	-33.9
Seep						
SEEP-1	6.46	12.65	631	3.34	2.7	-21.5
SEEP-3	6.50	12.82	565	0.88	45	-114.5
SEEP-4	No Surface Water Present					
SEEP-5	6.68	11.79	563	2.69	110	-113.7
SEEP-9	6.29	13.46	442	2.51	>1,000	-77.9
Sediment						
SED-17	6.90	13.64	174	9.56	30	-43.4
SED-18	6.51	14.12	185	9.99	23	-28.0

NOTE: °C = degrees Celsius
µmhos/cm = microhms per centimeter
mg/L = milligram per liter
mV = millivolt
NTU = Nephelometric turbidity unit.
NC = Not collected; no reason provided on field form.

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TABLE 1-11
SUMMARY OF WATER QUALITY INDICATOR PARAMETERS MEASURED IN SURFACE WATER SAMPLES COLLECTED IN SEPTEMBER 2006 AT EASTERN PLUME

Sample Designation	pH	Temperature (°C)	Conductivity (µmhos/cm)	Dissolved Oxygen (mg/L)	Turbidity (NTU)	Eh (mV)
Surface Water						
SW-10	6.47	18.14	181	10.44	7	158
SW-11						
SW-12	7.37	12.7	160	8.9	6.0	31.3
SW-13	6.97	19.13	138	8.63	5.3	35.3
SW-14						
Seep						
SEEP-10	5.32	18.18	71	0.35	400	38.9
SEEP-11	5.96	10.63	156	7.39	450	79.4

NOTE: °C = degrees Celsius
µmhos/cm = microhms per centimeter
mg/L = milligram per liter
mV = millivolt
NTU = Nephelometric turbidity unit.

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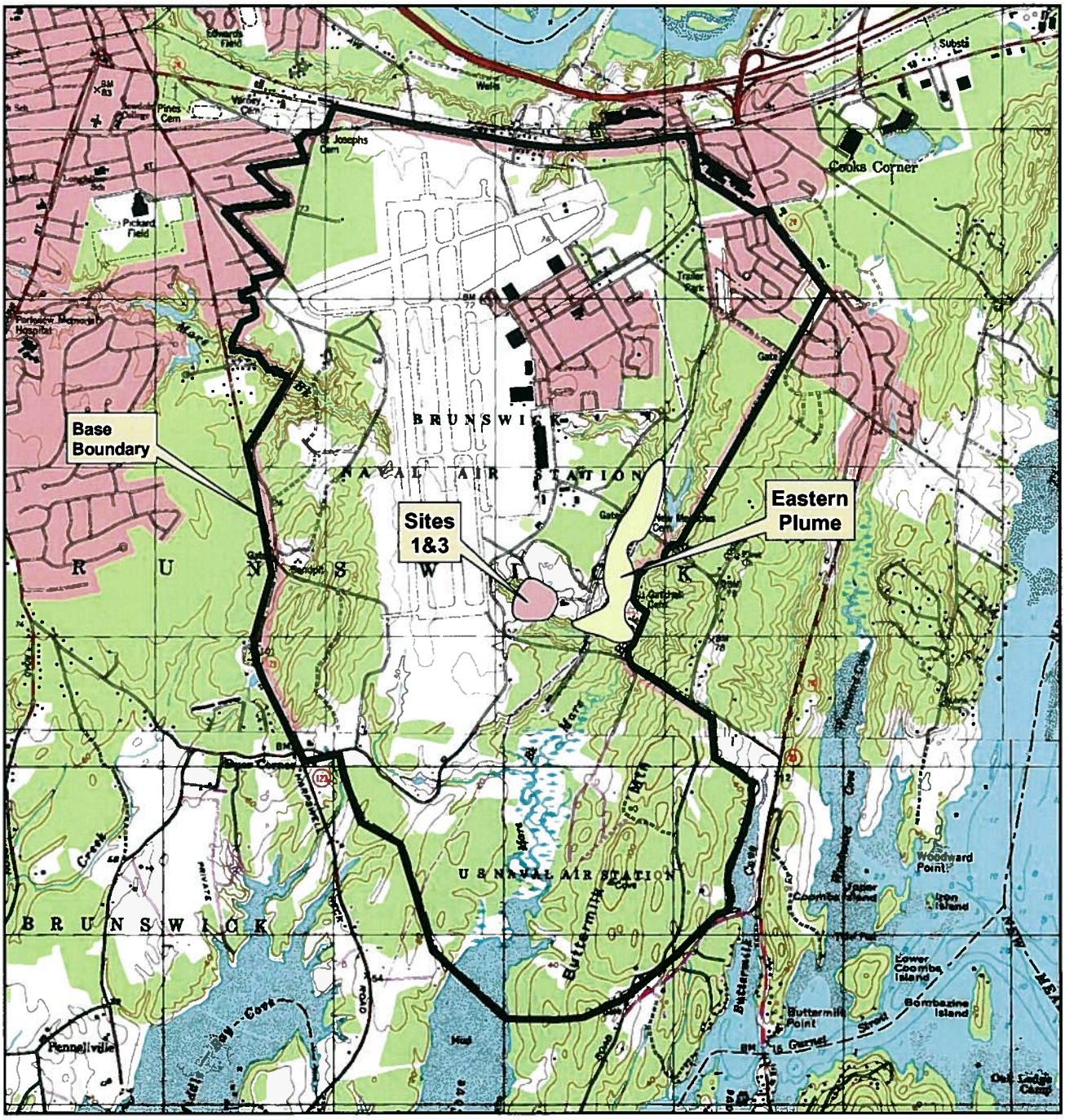
TABLE 2-1
SUMMARY OF AQUEOUS DIFFUSION SAMPLERS RESULTS – SEPTEMBER 2006

Monitoring Well (Well Depth)	Monitoring Event 29 Groundwater Total VOC Concentration[a]	Well Type	Summary of Monitoring Event 29 Diffusion Sampler Study Results
Sampling Group 1			
MW-205 (Deep)	Moderate	Interior Plume	Moderate VOCs reported in sample (35.5 µg/L)
MW-NASB-212 (Deep)	Moderate	Perimeter	Moderate VOCs reported in sample (7.3 µg/L)
MW-224 (Shallow)	Low	Perimeter	Moderate VOCs reported in sample (2.6 µg/L)
MW-311 (Deep)	Moderate	Interior Plume	Moderate VOCs reported in sample (22.7 µg/L)
MW-319 (Deep)	Moderate	Interior Plume	Moderate VOCs reported in sample (25.7 µg/L)
MW-331 (Deep)	High	Interior Plume	High VOCs reported in sample (422.5 µg/L)
MW-332 (Shallow)	Low	Interior Plume	Not Sampled
Sampling Group 2			
MW-230A (Deep)	Low	Sentinel	Not Sampled
MW-333 (Deep)	Moderate	Sentinel	Moderate VOCs reported in samples (15.8 µg/L)
MW-313 (Shallow)	Low	Perimeter	Moderate VOCs reported in samples (11.4 µg/L)

(a) High concentration = >greater than 400 µg/L; moderate contamination from 400 µg/L to 5 µg/L; low contamination = less than <5 µg/L.
(b) MW-207AR and MW-217B were not included in original Pilot Test Group No. 2.

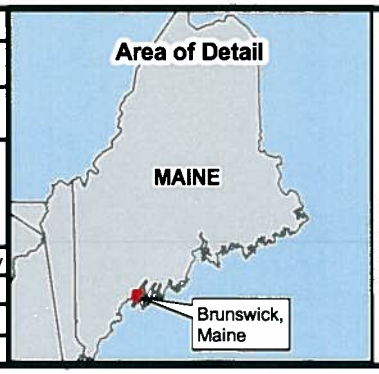
NOTE: VOC = Volatile organic compound.
ug/L = microgram per liter

FIGURES



Contract. No.	N62472-02-D-0810
Description	NAS Brunswick, ME
Coordinate system	NAD 1983, UTM, Zone 19 N in meters
Sources	Naval Base Boundary provided by Navy.

Date	22-APR-2008	Rev.	Date	App. By
DB	C. Guido			
CB	G. Calderone			
AB				



Legend

- NAS Brunswick Boundary
- Eastern Plume (Sept 06)
- Sites 1 and 3

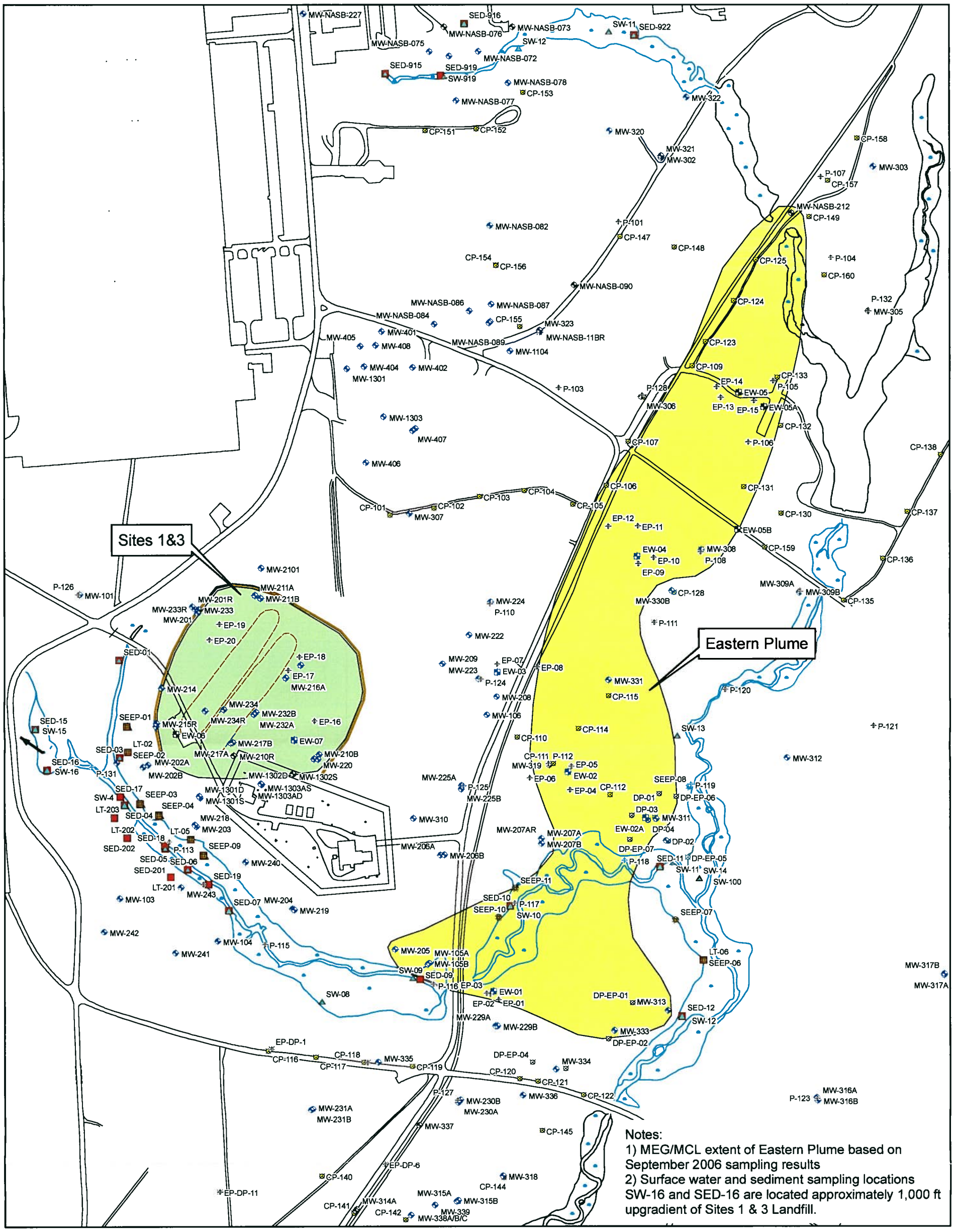
Figure 1-1

Sites 1 and 3 and Eastern Plume Site Location

Naval Air Station
Brunswick, Maine

C:\NAVY_GIS\TO07_Brunswick\Site1and3\MapDocuments\EP_Sept06\EP_Sept06Fig1-1.mxd

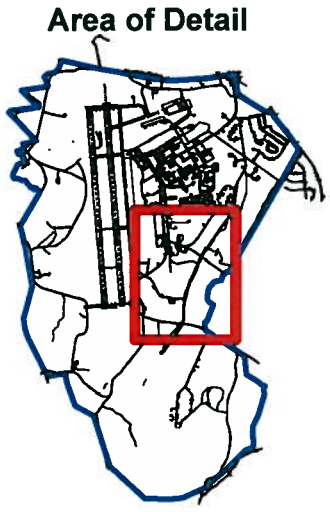
0 650 1,300 2,600 Feet



Contract No.	5700.007
Description	NASB Brunswick, ME
Coordinate system	NAD 1983, UTM, Zone 19N in meters
Sources	Naval Base Boundary provided by Navy.

Date	28-APR-2008	Rev.	Date	App. By
DB	C. Guido			
CB	G. Calderone			
AB				

Area of Detail



Legend

- Cone Penetrometer
- Direct Push
- Extraction Well
- Monitoring Well
- Piezometer
- Seep Location
- Surface Water Location
- Sediment/Leachate Location

Figure 1-2

Site Plan
Sites 1 and 3,
Eastern Plume

Naval Air Station
Brunswick, Maine

C:\NAVY_GIS\TO07_Brunswick\Site1and3\MapDocuments\EP_Sept06\EP_Sept06Fig1-2_11X17.mxd

0 125 250 500 Feet

Inferred extent of Eastern Plume based on reported VOC concentrations above State MEGs/Federal MCLs (September 2006)

Sites 1&3 Landfill

Inferred plume area based on detections of VOCs (September 2006)

Merriconeag Stream

Mere Brook

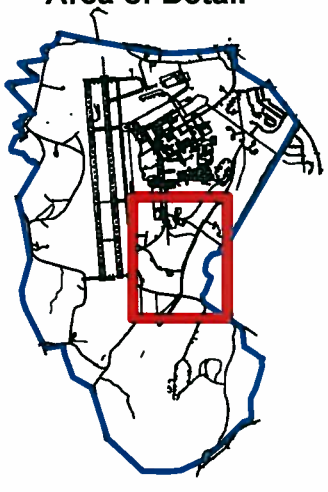
MW-NASB-212
MW-306
EW-05A
P-106
MW-224
MW-330B
P-111
MW-331
SW-13
MW-319
EW-02A
MW-311
MW-332
SW-11
SED-11
SW-14
SEEP-11
SW-10
SEEP-10
MW-205
SW-09
SED-09
EW-01
MW-313
SW-12
MW-229B
MW-229A
MW-333
MW-335
MW-334
MW-336
MW-230A
MW-337
MW-339
MW-315A
MW-338C
MW-338A
MW-338B
SEED-15
SW-15
SED-16
SW-16
SEEP-01
LT-01
MW-217B
MW-1302D
MW-1302S
MW-1303AD
MW-1303AS
MW-1301D
MW-1301S
SED-17
SW-04
LT-03
SEEP-03
SEEP-04
LT-04
SEEP-05
LT-05
SED-18
LT-09
SEEP-09
SED-19
SW-07
SW-08

Notes:
1. Inferred extent of Eastern Plume boundary line (black dashed line) are approximate and based on September 2006 sampling results.
2. Extent of Eastern Plume (yellow area) based on September 2006 sampling results that exceeded MEG/MCL.
3. VOC concentrations used to generate these boundary lines do not include: acetone, 2-butanone, methylene chloride, 1,4 dioxane.
4. The inferred plume area (black dashed line) is based on detections of VOCs above the method detection limits in the September 2006 groundwater data. A detection of 1,2 DCA (1.2 ug/L) was reported at MW-339.
5. Surface water and sediment sampling locations SW-16 and SED-16 are located approximately 1,000 ft upgradient of Sites 1&3 Landfill.

Contract No.	5700.007
Description	NASB Brunswick, ME
Coordinate system	NAD 1983, UTM, Zone 19N in meters
Sources	Naval Base Boundary provided by Navy.

Date	22-APR-2008	Rev.	Date	App. By
DB	C. Guido			
CB	G. Calderone			
AB				

Area of Detail



Legend

- Extraction Well
- Surface Water Location
- Seep Location
- Monitoring Well
- Piezometer
- Leachate Sediment/Seep
- Sediment Location
- Slurrywall
- Landfills 1 & 3

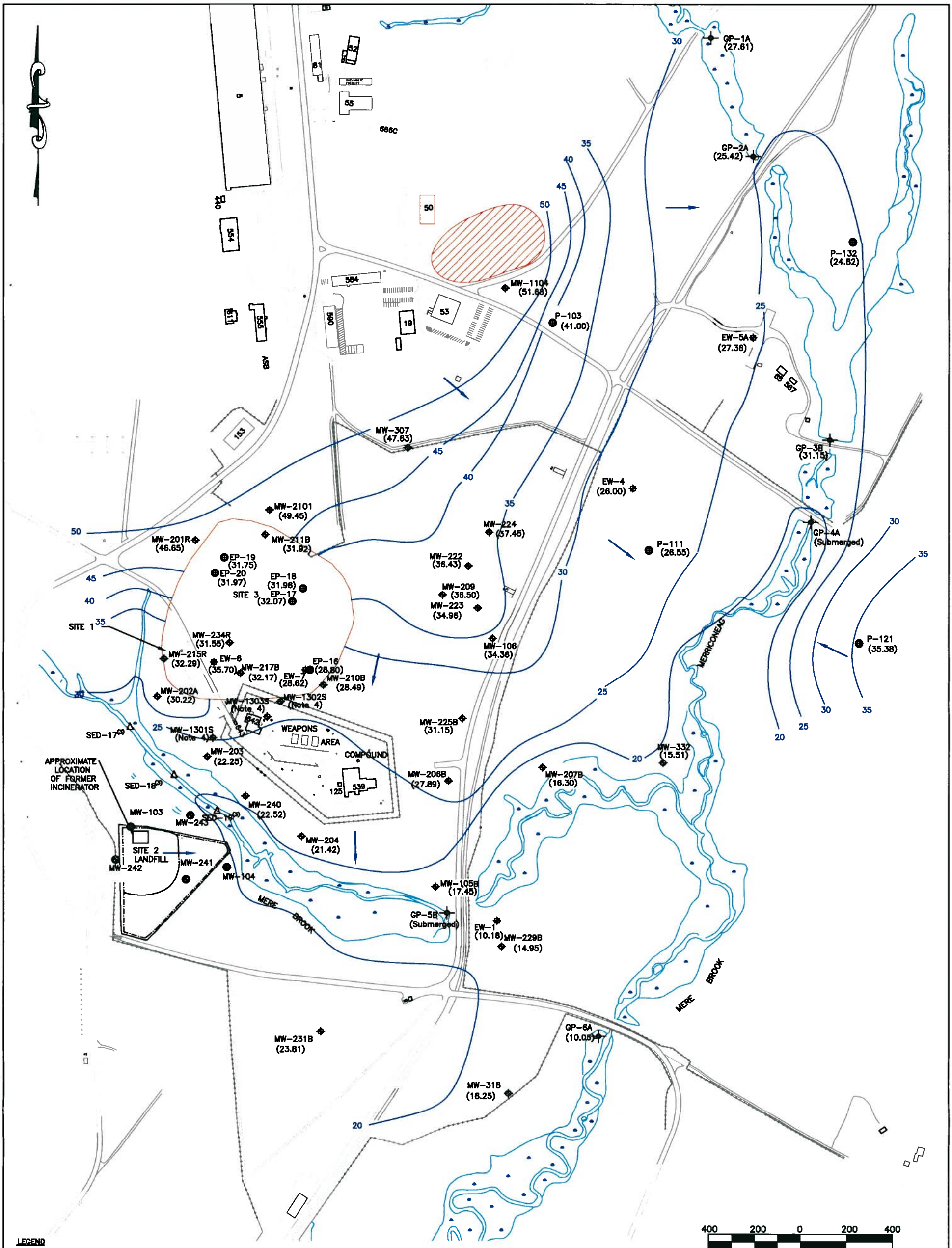
Figure 1-3

Long-Term Monitoring Sample Locations (September 2006)

Naval Air Station
Brunswick, Maine

C:\NAVY_GIS\TO07_Brunswick\Site1and3\MapDocuments\EP_Sept06\EP_Sept06Fig1-3_11X17.mxd

0 125 250 500 Feet



LEGEND

- MW-231B (20.84) SHALLOW MONITORING WELL (POTENTIOMETRIC SURFACE ELEVATION, FT MSL)
- EW-1 (18.43) EXTRACTION WELL (POTENTIOMETRIC SURFACE ELEVATION, FT MSL)
- EP-16 (25.32) SHALLOW PIEZOMETER (POTENTIOMETRIC SURFACE ELEVATION, FT MSL)
- GP-6 (34.22) SHALLOW PIEZOMETER (SURFACE WATER ELEVATION, FT MSL)
- FENCE
- APPROXIMATE LIMITS OF SLURRY WALL
- APPROXIMATE LIMITS OF SITES 1 & 3
- APPROXIMATE LIMITS OF EASTERN PLUME
- 27 GROUNDWATER CONTOUR (FT MSL) (DASHED WHERE INFERRED)
- INFERRED GROUNDWATER FLOW DIRECTION
- GWETS INFILTRATION GALLERY

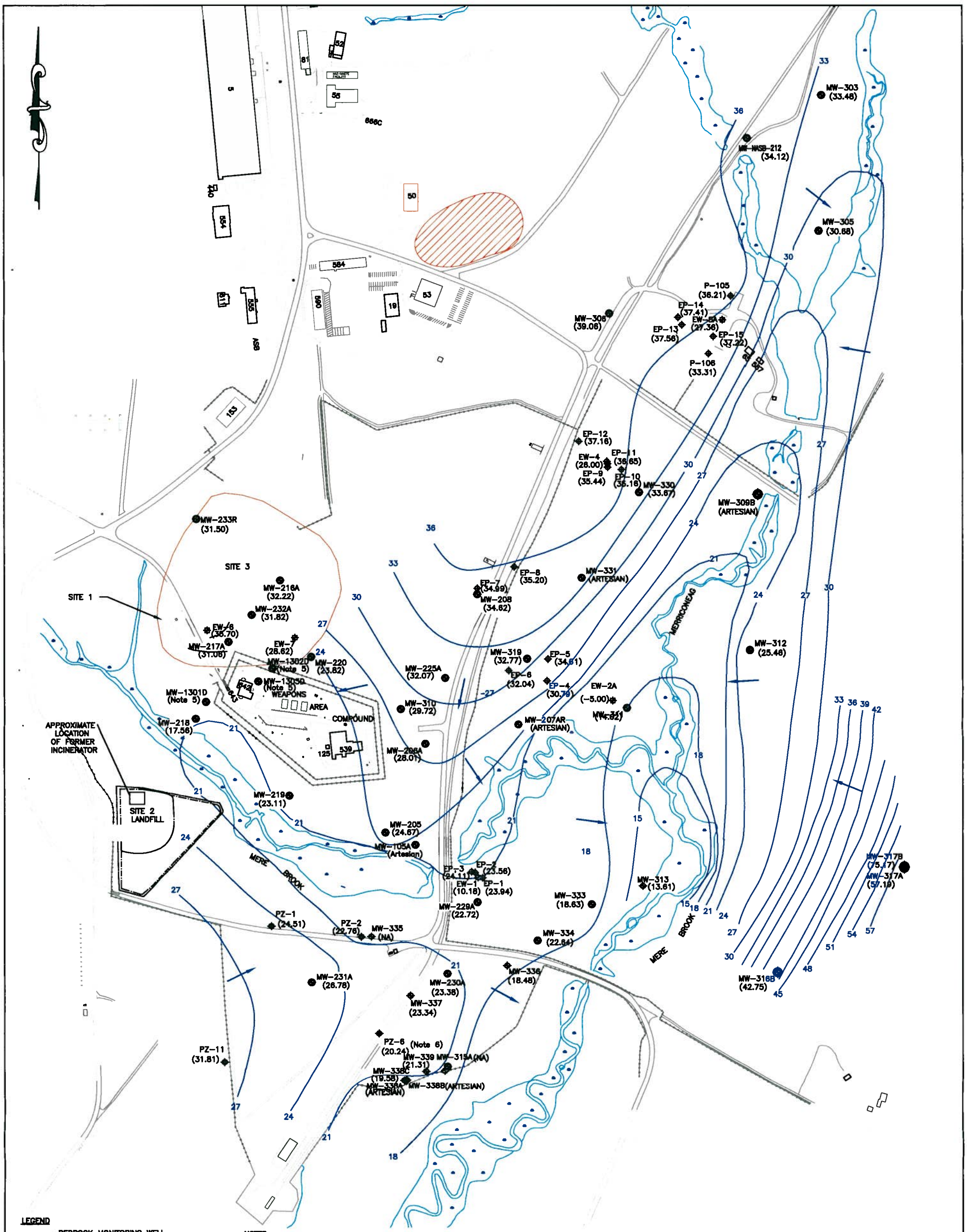
NOTE:

1. CONTOUR INTERVAL = 5 FT.
2. SITE PLAN TAKEN FROM THE INTERGRAPH VERSION 5 BASE-WIDE PLAN PROVIDED BY NAS BRUNSWICK PUBLIC WORKS DEPARTMENT ON 13 OCTOBER 1995. SITE PLAN UPDATED BASED ON BASE-WIDE PLAN PROVIDED BY NAS BRUNSWICK PUBLIC WORKS DEPARTMENT ON 13 JANUARY 2004.
3. CONTOURS REPRESENT EVALUATION OF PROBABLE CONDITIONS BASED ON PRESENTLY AVAILABLE DATA. SOME VARIATION FROM THESE CONDITIONS MUST BE EXPECTED.
4. GAUGING AT THE 1300 SERIES WELLS WAS PERFORMED. SURVEY DATA HAS NOT BEEN FINALIZED AT THIS TIME SO NO ELEVATION DATA IS PROVIDED. DATA WILL BE PROVIDED FOR THE NEXT MONITORING EVENT.

FIGURE 1-4
INTERPRETED SHALLOW GROUNDWATER POTENTIOMETRIC SURFACE CONTOUR MAP, SEPTEMBER 2006

SITES 1 AND 3 AND EASTERN PLUME
NAVAL AIR STATION, BRUNSWICK, MAINE

DATE JUNE 2007		PROJECT NUMBER 5700.007
DESIGNED BY EA Inc.		SCALE 1"=400'
UPDATED BY NTW		FILE NAME SITES1-3-EP.DWG
CHECKED BY DG		DRAWING NUMBER –
PROJECT MANAGER DG		SHEET NUMBER –



LEGEND

- MW-317B (56.71) BEDROCK MONITORING WELL (POTENTIOMETRIC SURFACE ELEVATION, FT MSL)
- MW-231A (24.01) DEEP MONITORING WELL (POTENTIOMETRIC SURFACE ELEVATION, FT MSL)
- EW-1 (19.43) EXTRACTION WELL (POTENTIOMETRIC SURFACE ELEVATION, FT MSL)
- EP-11 (30.22) DEEP PIEZOMETER (POTENTIOMETRIC SURFACE ELEVATION, FT MSL)
- PZ-11 (28.72) NEW PIEZOMETERS INSTALLED 29 JUNE 2001 (POTENTIOMETRIC SURFACE ELEVATION, FT MSL)
- FENCE
- APPROXIMATE LIMITS OF SLURRY WALL
- APPROXIMATE LIMITS OF SITES 1 & 3
- APPROXIMATE LIMITS OF EASTERN PLUME
- 27 GROUNDWATER CONTOUR (FT MSL) (DASHED WHERE INFERRED)
- INFERRED GROUNDWATER FLOW DIRECTION
- GWETS INFILTRATION GALLERY

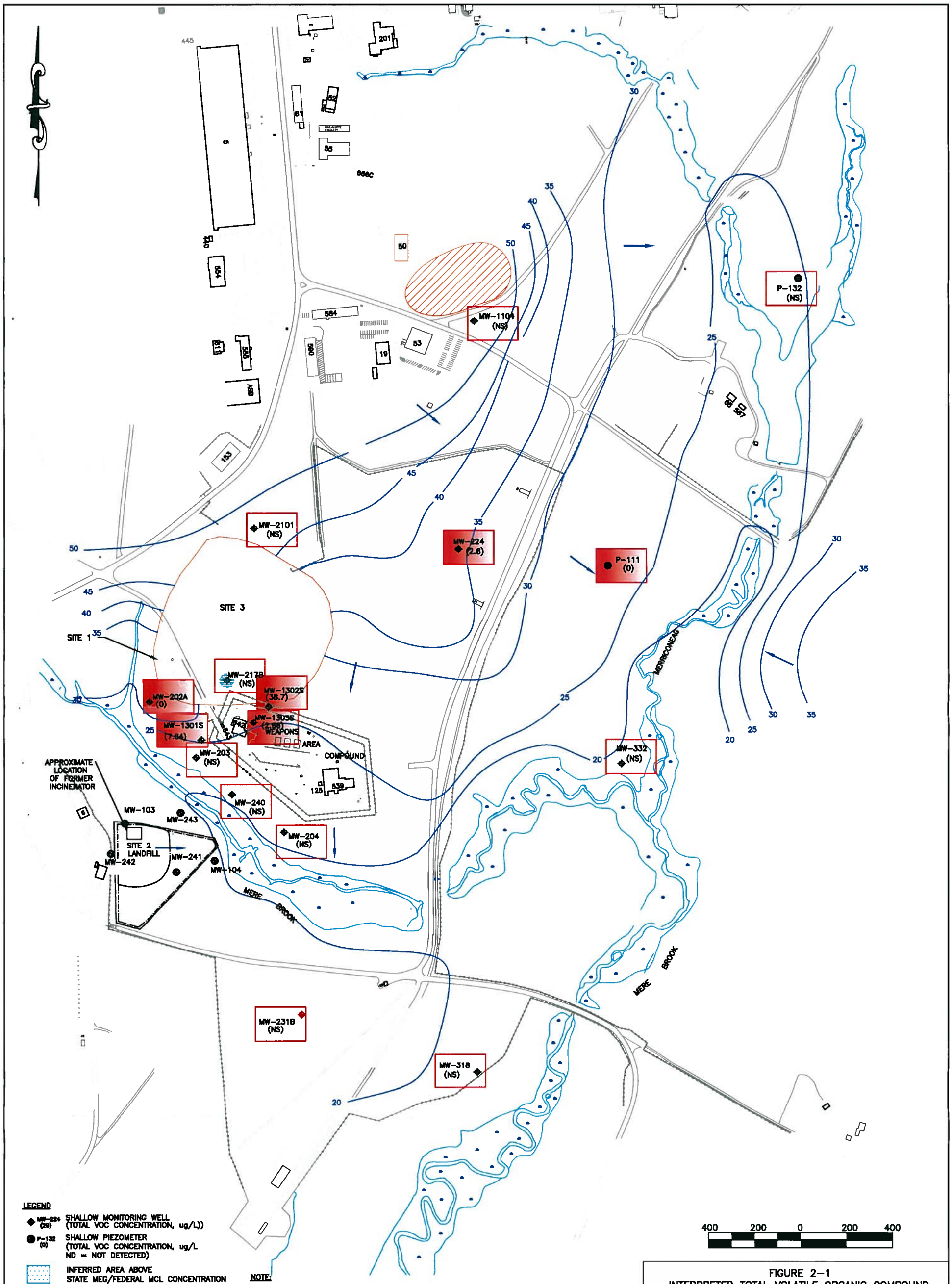
NOTES:

1. WATER LEVEL DATA COLLECTED APRIL 2005.
2. CONTOUR INTERVAL = 3 FT.
3. SITE PLAN TAKEN FROM THE INTERGRAPH VERSION 5 BASE-WIDE PLAN PROVIDED BY NAS BRUNSWICK PUBLIC WORKS DEPARTMENT ON 13 OCTOBER 1995. SITE PLAN UPDATED BASED ON BASE-WIDE PLAN PROVIDED BY NAS BRUNSWICK PUBLIC WORKS DEPARTMENT ON 13 JANUARY 2004.
4. CONTOURS REPRESENT EVALUATION OF PROBABLE CONDITIONS BASED ON PRESENTLY AVAILABLE DATA. SOME VARIATION FROM THESE CONDITIONS MUST BE EXPECTED.
5. GAUGING AT THE 1300 SERIES WELLS WAS PERFORMED. SURVEY DATA HAS NOT BEEN FINALIZED AT THIS TIME SO NO ELEVATION DATA IS PROVIDED. DATA WILL BE PROVIDED FOR THE NEXT MONITORING EVENT.
6. PZ-6 NOT USED IN DEVELOPMENT OF SURFACE CONTOUR.

FIGURE 1-5

INTERPRETED DEEP GROUNDWATER POTENTIOMETRIC SURFACE CONTOUR MAP, SEPTEMBER 2006
SITES 1 AND 3 AND EASTERN PLUME
NAVAL AIR STATION, BRUNSWICK, MAINE

DATE JUNE 2006		PROJECT NUMBER 5700.007
DESIGNED BY EA Inc.		SCALE 1"=400'
UPDATED BY NTW		FILE NAME SITES1-3-EP.DWG
CHECKED BY DG		DRAWING NUMBER –
PROJECT MANAGER DG		SHEET NUMBER –



LEGEND

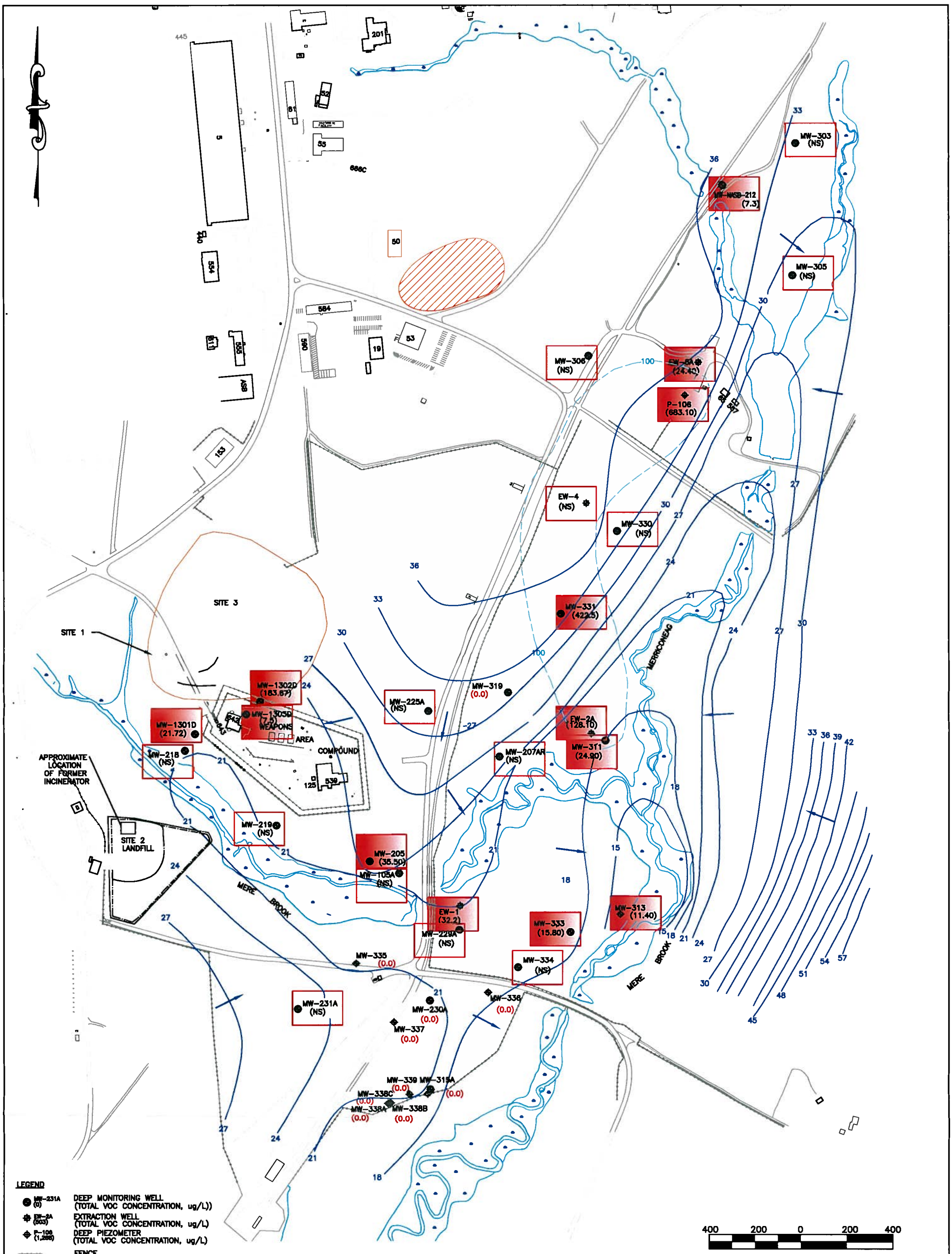
- MW-224 (29) SHALLOW MONITORING WELL (TOTAL VOC CONCENTRATION, ug/L))
- P-132 (0) SHALLOW PIEZOMETER (TOTAL VOC CONCENTRATION, ug/L ND = NOT DETECTED)
- INFERRED AREA ABOVE STATE MEG/FEDERAL MCL CONCENTRATION
- 100 ug/L TOTAL VOC CONTOUR (DASHED WHERE INFERRED)
- FENCE
- APPROXIMATE LIMITS OF SLURRY WALL
- APPROXIMATE LIMITS OF SITES 1 & 3
- APPROXIMATE LIMITS OF EASTERN PLUME
- 25 GROUNDWATER CONTOUR (FT MSL) FOR SEPTEMBER 2005 FROM FIGURE 1-4 (DASHED WHERE INFERRED)
- INFERRED GROUNDWATER FLOW DIRECTION
- GWETS INFILTRATION GALLERY

NOTE:

1. SITE PLAN TAKEN FROM THE INTERGRAPH VERSION 5 BASE-WIDE PLAN PROVIDED BY NAS BRUNSWICK PUBLIC WORKS DEPARTMENT ON 13 OCTOBER 1995. SITE PLAN UPDATED BASED ON BASE-WIDE PLAN PROVIDED BY NAS BRUNSWICK PUBLIC WORKS DEPARTMENT ON 13 JANUARY 2004.
2. CONTOURS REPRESENT EVALUATION OF PROBABLE CONDITIONS BASED ON PRESENTLY AVAILABLE DATA. SOME VARIATION FROM THESE CONDITIONS MUST BE EXPECTED.
3. SITE 2, TOTAL VOC CONCENTRATIONS ARE PROVIDED IN THE MONITORING EVENT 12 REPORT FOR SITE 2, SEPTEMBER 2005
4. RED BOXES INDICATE LTMP WELLS THAT WERE NOT SAMPLED. SHADED RED BOXES WERE SAMPLED AND THE TOTAL VOC VALUE IS INDICATED.

FIGURE 2-1
INTERPRETED TOTAL VOLATILE ORGANIC COMPOUND CONCENTRATION CONTOUR MAP
SHALLOW WELLS, MONITORING EVENT 29
SITES 1 AND 3 AND EASTERN PLUME
NAVAL AIR STATION, BRUNSWICK, MAINE

DATE SEPTEMBER 2005		PROJECT NUMBER 5700.007
DESIGNED BY EA Inc.		SCALE 1"=400'
UPDATED BY NTW		FILE NAME SITES1-3-EP.DWG
CHECKED BY DG		DRAWING NUMBER -
PROJECT MANAGER DG		SHEET NUMBER -



LEGEND

- MW-231A (0) — DEEP MONITORING WELL (TOTAL VOC CONCENTRATION, ug/L))
- EW-2A (503) — EXTRACTION WELL (TOTAL VOC CONCENTRATION, ug/L)
- P-106 (1,268) — DEEP PIEZOMETER (TOTAL VOC CONCENTRATION, ug/L)
- FENCE
- APPROXIMATE LIMITS OF SLURRY WALL
- APPROXIMATE LIMITS OF SITES 1 & 3
- APPROXIMATE LIMITS OF EASTERN PLUME
- INFERRED AREA ABOVE STATE MEG/FEDERAL MCL CONCENTRATION
- 100 — 100 ug/L TOTAL VOC CONTOUR (DASHED WHERE INFERRED)
- NS — NOT SAMPLED
- 25 — GROUNDWATER CONTOUR (FT MSL) FOR SEPTEMBER 2005 FROM FIGURE 1-5 (DASHED WHERE INFERRED)
- INFERRED GROUNDWATER FLOW DIRECTION
- GWETS INFILTRATION GALLERY

NOTE:

1. SITE PLAN TAKEN FROM THE INTERGRAPH VERSION 5 BASE-WIDE PLAN PROVIDED BY NAS BRUNSWICK PUBLIC WORKS DEPARTMENT ON 13 OCTOBER 1995. SITE PLAN UPDATED BASED ON BASE-WIDE PLAN PROVIDED BY NAS BRUNSWICK PUBLIC WORKS DEPARTMENT ON 13 JANUARY 2004.
2. CONTOURS REPRESENT EVALUATION OF PROBABLE CONDITIONS BASED ON PRESENTLY AVAILABLE DATA. SOME VARIATION FROM THESE CONDITIONS MUST BE EXPECTED.
3. HIGHEST VALUE SHOWN AT DUPLICATE SAMPLE LOCATIONS.
4. RED BOXES INDICATE LTMP WELLS THAT WERE NOT SAMPLED. SHADED RED BOXES WERE SAMPLED AND THE TOTAL VOC VALUE IS INDICATED.

FIGURE 2-2
INTERPRETED TOTAL VOLATILE ORGANIC COMPOUND CONCENTRATION CONTOUR MAP
DEEP WELLS, MONITORING EVENT 29
SITES 1 AND 3 AND EASTERN PLUME
NAVAL AIR STATION, BRUNSWICK, MAINE

DATE JUNE 2007		PROJECT NUMBER 5700.007
DESIGNED BY EA Inc.		SCALE 1"=400'
UPDATED BY NTW		FILE NAME SITES1-3-EP.DWG
CHECKED BY DG		DRAWING NUMBER –
PROJECT MANAGER DG		SHEET NUMBER –

APPENDIX A

Response to Comments from the Regulators on the Draft Report

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Responses to Comments Provided by the State of Maine Environmental Protection Agency on the Sites 1&3 Eastern Plume Monitoring Event 29 (September 2006) Report, July 2007 Naval Air Station, Brunswick, Maine

Reviewer: Ms. Claudia Sait, MEDEP Project Manager
Date: October 29, 2007
Respondent: Navy
Date: 4 March 2008

Comment #	Location	Comment	Response
1	General	The data for Monitoring Event (ME) 29 are generally consistent with previous rounds, notable exceptions are included in the specific comments below. The September 2006 monitoring event omitted several locations included in the approved 2000 Long-Term Monitoring Plan (LTMP), and the report (Section 1.0) notes that sampling followed the Draft 2004 Optimization Plan. This issue is being addressed under dispute resolution and will not be noted except where the omissions affect specific conclusions in the report. Based on the Data Quality Review in Appendix D all samples were qualified as needed and no systematic errors were apparent.	Please see the Navy's letter dated July 2, 2007 to the EPA for a full explanation of how we determined which wells to sample and at what frequency. In short, the Navy conducted the sampling at Sites 1&3 and Eastern Plume for Monitoring Event 27 according to the October 2004 optimization proposal agreed to by the stakeholders. The final Sites 1&3 and Eastern Plume LTMP should have included the November 2004 revised proposal. This oversight will be corrected in the revised Sites 1&3 and Eastern Plume LTMP, which is scheduled to be finalized prior to the Fall 2007 monitoring event. Based on trend graphs that the Navy has developed using monitoring data from before and after the missing data, it is with reasonable certainty that similar contaminant concentrations would have been detected.
2	General	In several cases the listed detection limit for cadmium (4 µg/L) exceeds the MEG of 3.5 µg/L. For MW-217B it is listed as 800, presumable due to interference from one of the other elevated metals detected in the sample. Where possible the contracted lab must have reporting limits at or below the relevant criteria. Use of ICP-MS Method 6020 may be necessary to achieve the required level for cadmium.	**Concur.** The laboratory was meeting the QAPP MEG limit of 5.0 ug/L. The laboratory will be directed to quantitatively achieve the cadmium MEG of 3.5 ug/L. For MW-217B the reporting limit was raised, because sample matrix issues required a 200X dilution.
3	General	In Appendix C many of the trend plots are not update through ME-29, please revise as needed, they are the quickest reference for relating the new data to historic values.	**Noted.** Appendix C trend plots will be reviewed for consistency.
4	Section 1.1, Paragraph 1	"However the Draft Final Long-Term Monitoring Report…" Does the Navy mean the Draft Final Long Term Monitoring Program? Please correct as necessary.	**Concur.** Required changes will be made to read "Long-Term Monitoring Program."

Comment #	Location	Comment	Response
5	Section 2.2 and Tables 1-2 and 1-4	The tables and figure offer conflicting notes as to whether staff gauge location GP-6A was damaged or measured. Please confirm its status in September 2006 and revise the report as needed.	**Concur.** Table 1-2 will be revised to show that the water level at staff gauge location GP-6A was measured.
6	Section 1.4, Section 2.4.5 and Table 1-1	Please revise the table and text to note that Sediment locations 15, 16, 17, 18, and 19 were sampled for metals and pesticides. Location SED-09, however, was not sampled as required.	**Noted.** The text will be revised to reflect that location SED-09 was not sampled.
7	Table 1-1, Table 1-3, Figure 1-4, and Figure 1-5	Based on the tables, the water levels were collected for the "1300" series wells this round, please add those elevations to the water elevation plots.	**Noted.** Water levels for the "1300" series will be added to the plots.
8	Section 2.2, Last Paragraph	*"The trigger elevations were established to prevent groundwater from infiltrating the cap."* The trigger elevations primarily assure that groundwater elevations are below the level of the majority of the waste in the landfill, in part confirming that precipitation is not infiltrating the cap. Please revise the text.	**Concur.** Text will be revised to read "groundwater elevations are below the level of the majority of the waste in the landfill."
9	Section 2.4.1	a.) MW-218 – Please re-label the tables for 2006 rather than 2007, and confirm the data area correct. b.) MW-217B – The 680 μg/L historic high result for arsenic is not indicated on the Appendix C figure (32 of 257). Please revise the table or figure with the correct result. It is notable that the ME29 result for arsenic (442 μg/L) is the highest or second-highest result since monitoring began.	a) Tables will be re-labeled to read 2006. b) The trend graph and table will be reconciled to determine the correct result for arsenic at MW-217B.
10	Section 2.4.3	Locations Seep-5 and Seep-9 spiked for numerous inorganics this round, many at historic high concentrations, however the turbidity at Seep-9 was >1000, so particulates were an issue there. Seep-5 turbidity was 110, indicating particulates were less of a factor. The influence of turbidity at the seeps and leachate seep locations make any trends in the data less significant unless increases or decreases persist for multiple rounds and a range of turbidities.	**Concur.**
11	Section 2.5.2 Appendix B-7 and Table 1-4	MW-331 has represented the central portion of the plume for a decade or so, and its TVOC concentration has steadily decreased from highs in the 1990s. MEDEP is somewhat concerned that this location has also been artesian for multiple rounds in recent years, while also having total VOC concentrations around 500 ppb. This situation is reminiscent of MW-311, however the concentrations are much lower at MW-331. MEDEP plotted historic water elevations at MW-331 and notes that they have generally increased since 1998, from a range of 28 to 29 feet MSL to artesian conditions (over the top of pvc at 30.54 feet MSL) in the last	**Noted.** This item was added to the agenda for the December 2007 Technical Meeting.

Comment #	Location	Comment	Response
		3 rounds. Stakeholders should consider if the well should be fitted with a cap, and whether a shallow monitoring location is needed to ensure that the overflow at MW-331 is not impacting the shallow groundwater. Also, the changing conditions warrant re-evaluation of the deep (and possibly the shallow) PDB interval, and perhaps re-development of the well. Please include this as an agenda item for the December technical meeting.	
12	Section 2.5.2 and Table B-7	MW-319 - Please revise the TVOC values for the Mid Diffusion and Deep Diffusion, they have been switched in the table.	**Noted.** TVOC values will be revised.
13	Section 2.5.4, Table B-9 and B-10	The text should reference Table B-9 for Sed-11 data and Table B-10 for the surface water data, please revise.	**Noted.** Text will be updated to reference Table B-9 for SED-11 data and Table B-10 for Surface Water Data.
14	Section 2.5.5 and Table B-8	The text should reference Table B-8 for the seep data, please revise.	**Noted.** Text will be updated to reference Table B-8 for the SEEP data.
15	Section 3.1	a.) Bullet 1: MEDEP supports an approach of targeting hotspots to improve the efficiency of the extraction network. If the EW-5B installation is successful, MEDEP supports building on that effort using monitoring/log data, results of the Mere Brook investigation, surface geophysics and the groundwater model to identify additional extraction well locations and/or reducing the screen length of existing extraction wells to target contaminated zones. b. Bullet 2: As noted previously MEDEP supports the use of pore water to identify where the plume is discharging to Mere Brook and Merriconeag Stream floodplains, and using that information to improve the delineation of the plume, improve our conceptual model and to help identify possible extraction well locations upgradient. c.) Bullet 4: MEDEP agrees that the extraction network has been successful in reducing VOC concentrations in some areas of the plume. The data from the Fall 2001 round (when the GWETS was shut down) suggest that the plume would be more widely dispersed without the operation of the extraction network. However, the migration of the southern and eastern boundaries of the plume to the surface waters and the detections of VOCs in bedrock at MW-308 indicate the extraction network maintains at best partial hydraulic control of the plume. d.) Bullet 5: MEDEP supports the optimization of the EW-1 location, and suggests that Navy propose a timetable to evaluate this option. The degree of control that this well has over migration of the plume to the south is an important consideration. Also, Stakeholders could evaluate	**a) Noted.** **b) Noted.** **c) Noted.** **d) Noted.** This was discussed during the December 2007 Technical Meeting

Comment #	Location	Comment	Response
		whether obtaining a depth profile of VOCs in the well would be useful enough to warrant a brief shutdown of the well, if it cannot be performed when the well is operating.	
16	Section 3.2	a.) Bullets 2 & 3 – MEDEP has identified a few potential data gaps related to zones downgradient of Landfills 1&3 and along various portions of the surface water channels adjacent the Eastern Plume. These comments were incorporated into reviews of the proposed Long Term Monitoring (LTM) Plans for each site, and until they are resolved MEDEP cannot fully agree with the conclusions as presented. b.) Bullet 4 – As previously noted by USEPA and MEDEP the capture zone of the extraction network has not been comprehensively evaluated since the initial system was installed, although the LTM data are generally sufficient to assess the effectiveness of the current network. The pending groundwater model and improvements to the monitoring of the plume's leading edge will improve stakeholders' understanding of the hydraulic control currently exerted by the system.	a) This was discussed in brief during the December 2007 Technical Meeting and the MEDEP mentioned the concern for potential data gaps downgradient of Landfill 1 and 3. It is recommended that the Technical Evaluation Group further discuss this topic. For this report Bullets 2 and 3 will be removed. b) Comment noted.
17	Appendix F	Blockage of the storm drain system on the landfill, particularly if it is impeding access to sample points, may be impacting the effectiveness of the cap system and should be remedied as soon as possible. MEDEP noted that in the ME-30 report the drains are reportedly clear of obstruction so this problem was resolved. Please confirm that any blockages were removed as needed to maintain the cap/monitoring at Sites 1&3.	**Concur.** Obstructions have been removed.
18	Table B-7, Figure 1-2, and Figure 1-3	The plume boundary for areas exceeding the maximum contaminant level/maximum exposure guideline (MCL/MEG) does not extend to MW-313, which had detections of 1,4 dioxane and 1,1 dichloroethene (DCE) that exceeded the MEG. Please revise the figures as needed.	**Concur.** Figures will be updated.
END OF COMMENTS			

March 7, 2008

Mr. Todd Bober
Department of Navy
Base Realignment and Closure
Program Management Office-Northeast
4911 South Broad Street
Philadelphia, PA 19112-1303

Re: Sites 1,3 & Eastern Plume, Monitoring Event 29 Report –September 2006
Naval Air Station, Brunswick, Maine

Dear Mr. Bober:

MEDEP has reviewed the Navy's responses dated March 4, 2008, to the Maine Department of Environmental Protection (MEDEP) comments, dated October 29, 2007, for Sites 1 & 3 and Eastern Plume Monitoring Event Report 29 – September 2006 (July 2007). Based on that review MEDEP has no further comments provided that:

- the proposed revisions and additions are incorporated into the final report along with regulator comments, responses and this letter; and
- that the salient points from the December 2007 Technical meeting discussion are added to response 15.d for inclusion in the final report.

Please contact me at (207) 287-7713 or claudia.b.sait@maine.gov, if you have any questions or comments.

Respectfully,

Claudia Sait
Project Manager-Federal Facilities
Bureau of Remediation & Waste Management

Cf: File
Mike Fagan-BNAS
Carolyn Lepage-Lepage Environmental
Ed Benedikt
Carol Warren-(email only)
Gina Calderone-ECC (email only)
Jackson Kiker-ECC (email only)
Amy Van Dercook-USN (email only)
Chris Evans-MEDEP
Mike Daly-EPA
Al Easterday–ECC
Jeff Donovan-ECC (email only)
Catherine Guido-ECC (email only)
David Chipman (email only)
Vicki Boundy-MRRA (email only)

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Responses to Comments Provided by the United States Environmental Protection Agency New England – Region 1 on the Sites 1&3 Eastern Plume Monitoring Event 29 (September 2006) Report, July 2007 Naval Air Station, Brunswick, Maine

Reviewer: Ms. Christine Williams, EPA Project Manager
Date: August 20, 2007
Respondent: Navy
Date: 4 March 2008

Comment #	Location	Comment	Response
1	General	The Navy did not sample the correct wells in accordance with the LTMP dated 2000 in this sampling round. EPA understands the Navy will be revising the LTMP prior to the Fall 2007 round.	Please see the Navy's letter dated July 2, 2007 to the EPA for a full explanation of how we determined which wells to sample and at what frequency. In short, the Navy conducted the sampling at Sites 1&3 and Eastern Plume for Monitoring Event 27 according to the November 2004 revised optimization proposal agreed to by the stakeholders. The final Sites 1&3 and Eastern Plume LTMP should have included this revised proposal. This oversight will be corrected in the revised Sites 1&3 and Eastern Plume LTMP, which is scheduled to be finalized prior to the Fall 2007 monitoring event. Based on trend graphs that the Navy has developed using monitoring data from before and after the missing data, it is with reasonable certainty that similar contaminant concentrations would have been detected.
2	General	Results from Event 29 are generally consistent with recent trends (see, e.g., Appendix C); changes from the previous round (Event 28), in particular, are small for all media, all samples, and all analytes. Notable exceptions include: Metals at MW-217B: Arsenic and barium "spiked" from the previous round (As from 10U ppb in ME28 to 442 ppb in ME29; Ba from ~200U ppb in ME28 to 1540 ppb in ME29). However, these values likely are strongly influenced by turbidity (170 NTU). TCE at MW-230A: TCE fell from a "spike" in the previous round (5.2J ppb in ME28 to 1U ppb in ME29), consistent with historical fluctuations occasionally exceeding the MCL.	**Noted.**

Comment #	Location	Comment	Response
3	General	The figures showing the historical records of water-quality parameters and analytes are of value because they enable rapid, visual interpretation of time-dependent trends. It would be equally useful for readers and/or reviewers of this and future monitoring reports to have access to the spreadsheets from which these plots were developed. Please consider adding these data as an appendix, on the CDs that are included with these monitoring reports, to be updated for each successive monitoring event. EPA requested electronic data informally in an e-mail on August 8, 2007 in regards to site 2 and has not yet heard from the Navy, please respond in the affirmative.	**Concur.** The water-quality stabilizing parameters will be provided in an excel spreadsheet electronically, as requested.
4	Page 1-1. Section 1.0, Paragraph 4	Should "… slurry wall upgradient and two surrounding disposal trenches …" read, "… slurry wall upgradient of, and surrounding, two disposal trenches … ?" Please check and edit as necessary.	**Noted**. The following will be inserted," Remedial action at Sites 1 and 3 included construction of a low permeability slurry wall to a depth of approximately 90 feet, which is upgradient of and surrounding tow disposal trenches."
5	Page 1-2, Section 1.1	The discussion of the recent evolution of the LTMP is informative, but does not state clearly which version was followed for the sampling and analysis reported in the current document (ME29). Please indicate what sampling plan was followed for ME29. (P. 1-1, sec. 1.0, para. 2 indicates that the October 2004 version was used. If so, this should be repeated in sec. 1.1 for completeness.)	**Concur.** The October 2004 version was used.
6	Page 1-4, Section 1.2	The text points to Table 1-5 for a summary of the pumping records for the extraction wells. A notable anomaly in the table is that EW-1 experienced large percentages of down time in July and August 2006. Please offer a brief explanation, either here or in sec. 2.1, where the low operational time is noted in the text.	**Noted.** The GWETS was operational for a percentage of 93.92 available hours. This weighted percentage reflects the periods of down time experienced by EW-1 in July and August. This low operation of EW-1 is further stated in Section 2.1, as the text states EW-1 was operational only 75.8% of available hours. For clarification, the following will be added to the text in Section 1.2 and 2.1 text," EW-1 experienced a period of low operational percentage in July and August".
7	Page 1-4, Section 1.3	*edit:* Please change "… six on the outside to include the newly installed monitoring wells couplets located south of the slurry wall opening were sampled" to, "… six on the outside, to include the newly installed monitoring well couplets located south of the slurry wall opening."	**Concur.**
8	Page 2-2, Section 2.2	This section does not point to Figures 1-4 and 1-5 for the interpretations of the shallow and deep potentiometric surfaces. Please add text to direct the reader to the figures.	**Noted.** Text will be added to reference Figures 1-4 and 1-5.
9	Page 2-2, Section 2.2, Figure 1-4	The interpretation of the shallow potential surface shown in Fig. 1-4 represents the discontinuity caused by the slurry wall around Sites 1 and 3, as per EPA comments on previous monitoring reports. Please note that all equipotentials that intersect the slurry wall should do so perpendicular	**Concur.** The figure will be updated.

Comment #	Location	Comment	Response
		to the wall; the 45-ft contour, in particular, should be adjusted to indicate that flow immediately adjacent to the wall is parallel to this boundary. Please also note that the 35-ft contour should swing to the downgradient side of MW-224, MW-222, and MW-209 in the area east of the slurry wall.	
10	Page 2-2, Section 2.2, Figure 1-5	The interpretation of the deep potential surface shown in Fig. 1-5 has some minor errors. The 24-ft contour should swing to the downgradient side of MW-205 SE of the Weapons Compound. The 21-ft contour apparently should "jog" between MW-339 and MW-338C, and then pass between MW-337 and PZ-6, before continuing to the south along the west side of Mere Brook. Finally, a segment of the 36-ft contour can be drawn upgradient of the 33-ft contour shown, as it is constrained by a number of wells that straddle it (i.e., showing water levels below or above 36 ft). Please edit the figure accordingly.	**Concur.** The figure will be updated.
11	Page 2-2, Section 2.2	The text states, "The trigger elevations were established to prevent groundwater from infiltrating the landfill cap." It might be more precise to state, "The trigger elevations were established to indicate water levels that approach the elevation of buried waste. Such an occurrence may suggest infiltration through the landfill cap," or something to this effect.	**Noted.** See MEDEP Comment 8.
12	Page 2-3, Section 2.4.1	The second paragraph states "reported metal concentrations of aluminum, iron, and manganese exceeded either the MCL or MEG in each of these 1300 series monitoring wells which is suspected to be associated with turbidity". Since the elevated metals concentration maybe due to the turbidity in the sample, does the Navy propose any changes to the sampling procedure to reduce the amount of turbidity in the samples? One way of reducing the turbidity in the monitoring well is to install the pump the day before the sampling event to allow any disturbed particles to settle out.	**Noted.** The 1300 series monitoring wells are purged in accordance with the Basewide QAPP sampling SOPs. A comparison of Spring 2006 to Fall 2006 turbidity levels shows that in MW-1301D a decrease from 500 NTU to 160 NTU. In this monitoring well the aluminum levels decreased comparing Spring to Fall, but other metals with MEG exceedances did not show a decrease proportional to the turbidly decrease. For Monitoring wells MW-1301S, 1303ASs, 1302S, and 1302D the turbidity was <10 NTU, and metal MEGS were exceeded in select monitoring wells. In MW-1303-AD the Fall 2006 turbidity increased to 29 NTU. Comparing the Spring and Fall 2006 results in the 1300 series monitoring wells, turbidity does not appear to be a causative factor of the high metal levels. The metal levels do appear to be showing some proportionality to sodium levels.
13	Page 2-3, Section 2.4.1	The text notes that the 1300-series wells, located immediately downgradient of the opening in the Sites 1 and 3 slurry wall, are not shown in Figures 2-1 and 2-2 or in tables within the text. Please include results from these wells in the graphics presented for future monitoring events, as a number of exceedances are being detected at MW-1301D and MW-1302D.	**Concur.** These wells will be included in the Figures.

<table>
<tr><th>Comment #</th><th>Location</th><th>Comment</th><th>Response</th></tr>
<tr><td>14</td><td>Page 2-3, Section 2.4.1</td><td>The text discusses vinyl chloride exceedances at MW-1301D and MW-1302D, and refers to both the federal MCL (2 ppb) and the Maine MEG (cited as 0.15 ppb). Because some of the reported results are in exceedance of both standards, and some are in exceedance only of the MEG, perhaps these reference values should be cited together, rather than in separate parenthetical notes. Please note that the Maine DHS/CDC table of MEGs dated August 7, 2006, shows the vinyl chloride MEG at 0.2 ppb. Please verify that the MEG cited here is the current value.</td><td>Noted. All MEGs cited will be verified to cite the most current value at the time of the report.</td></tr>
<tr><td>15</td><td>Page 2-4, Section 2.4.1</td><td>The paragraph following the table of results for MW-217B notes that turbidity was high in Events 24, 25, and 27, which may bear on the high metals concentrations observed. The same might be said for the current round; turbidity was recorded at 170 NTU, and metals are highly elevated (e.g., Fe at 6.21 ppt), characterized as a “spike” in the table.</td><td>Noted.</td></tr>
<tr><td>16</td><td>Page 2-4, Section 2.4.1</td><td>It is interesting to note that MW-217B and MW-1301D both yielded turbid samples, and show elevated Cr and Ni, reminiscent of historical detections at Site 2. A possible source is corrosion of stainless steel components in the wells (e.g., screen, pump, hose clamps, cable, etc.). As at Site 2, the mass-concentration ratio of Cr to Ni is approximately 1. The groundwater at these locations is very high in Na, and, correspondingly, is likely very high in Cl, as it is influenced by relict seawater in the underlying clay. This results in a highly corrosive environment. Although MW-1301D is a new well, Na is particularly high (198 mg/L). If the Na derives from NaCl, the corresponding Cl concentration would be 305 mg/L. 304 stainless steel is described as corrosion resistant up to Cl concentrations of ~200 mg/L.
<table>
<tr><th></th><th>MW-217B</th><th>MW-1301D</th></tr>
<tr><td>Cr (mg/L)</td><td>0.265</td><td>0.113</td></tr>
<tr><td>Ni (mg/L)</td><td>0.298</td><td>0.0819</td></tr>
<tr><td>Fe (mg/L)</td><td>6210</td><td>14.5</td></tr>
<tr><td>Na (mg/L)</td><td>52.1</td><td>198</td></tr>
<tr><td>ORP (mV)</td><td>16.0</td><td>217</td></tr>
<tr><td>Turbidity (NTU)</td><td>170</td><td>160</td></tr>
</table></td><td>Noted. Corrosion coupons were installed at the Site 2 wells and the results were negligible for metal corrosion. Well data will be continued to be monitored to determine if possible corrosion is due to the high metal levels or if these results are due to turbidity.</td></tr>
<tr><td>17</td><td>Page 2-8, Section 2.4.3</td><td>It is noted that the data for Leachate Seep SEEP-09 show large “spikes” relative to the previous round (ME28); for example Fe was detected at 180 mg/L in ME28, and at 2640 mg/L in ME29. Turbidity (>1000 NTU, Table 1-10) is again a likely strong influence on these results.</td><td>Noted.</td></tr>
<tr><td>18</td><td>Page 3-1, Section 3.1, 1st Bullet</td><td>typo: Please change, “1,1,1-TCE” to, “1,1,1-TCA.”</td><td>Concur. 1,1,1-TCE will be changed to 1,1,1-TCA</td></tr>
</table>

Comment #	Location	Comment	Response
19	Page 3-2, Section 3.1	The first bullet on this page states, "The extraction well network appears to have nearly complete effectiveness at maintaining hydraulic control … ." To the extent that there is considerable evidence of plume contaminants discharging to surface water along Merriconeag Stream and Mere Brook, it is not clear that the extraction wells achieve "nearly complete … hydraulic control."	**Noted**. This bullet will be re-written as follows: "The extraction well network appears to provide hydraulic control of the plume. The recent investigation at the Mere Brook and Merriconeag Stream confluence indicates that localized upwelling of contaminants may be occurring. Surface water results have been historically non-detect for VOCs.
20	Table 1-6	The locations of the 1300-series wells are given in this table as "Inside" the slurry wall. Should this read, "Outside?" Please check and edit accordingly.	**Concur.** The 1300 series monitoring wells are located outside of the slurry wall. Text will be revised.
21	Appendix B, Table B-1	The Table list for the samples collected for metal analyses that they were collected using the diffusion sampling method. Is this correct? If it is correct, identify the diffusion sampling method.	**Noted.** All metal samples were collected using the low-flow sampling method. Table will be revised to show the correct sample collection method for each analytical parameter.
22	Appendix B, Table B-1 and Table B-7	The Tables list data for 2-butanone, 2-hexanone, 4-methyl-2-pentanone and acetone. For the samples collected using diffusion samplers, this data needs to be qualified as "R" because the diffusion sampling procedure is not designed for these contaminants.	Concur. A footnote will be added to the tables that 2-butanone, 2-hexanone, 4-methyl-2-pentanone and acetone results from PDB samples are not usable.
23	Appendix G	The ECC Region 1 Data Review Sheet list "HCl" as a preservative for 1,4-dioxane. Is this a typo? 1,4-dioxane samples do not require HCl preservative. Note according to Appendix E the samplers preserved the 1,4-dioxane samples correctly (no HCl).	**Concur.** 1,4-Dioxane samples are un-preserved samples.
END OF COMMENTS			

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APPENDIX B

Laboratory Analytical Data Summary Tables

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Table B-1
Summary of Groundwater Results - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

			Station ID:	MW-1301D	MW-1301S	MW-1302D	MW-1302S	MW-1302S
			Field Sample ID*:	MW1301D	MW1301S	MW1302D	MW1302S	MWXD1
			Lab Sample ID:	M59258-3	M59258-2	M59258-1	M59258-7	M59258-8
			Sample Date:	9/13/2006	9/13/2006	9/13/2006	9/13/2006	9/13/2006
			Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest
			Field QC:	Original data	Original data	Original data	Original data	Field duplicates
			Sampling Method:	Low-Flow	Low-Flow	Low-Flow	Low-Flow	Low-Flow
	Units	**Federal MCL**	**Maine MEG**					
VOCs								
1,1,1-Trichloroethane	ug/l	200	200	1 U	1 U	13.9	1 U	1 U
1,1,2,2-Tetrachloroethane	ug/l	NA	1.8	1 U	1 U	1 U	1 UJ	0.74 J
1,1,2-Trichloroethane	ug/l	5	6	1 U	1 U	1 U	1 U	1 U
1,1-Dichloroethane	ug/l	NA	70	0.72 J	1 U	93.4	2.7	2.6
1,1-Dichloroethene	ug/l	7	1	1 U	1 U	1.6	1 U	1 U
1,2-Dichlorobenzene	ug/l	NA	NA	1 U	1 U	1 U	1 U	1 U
1,2-Dichloroethane	ug/l	5	4	1.3	1 U	1	1 U	1 U
1,2-Dichloroethene, total	ug/l	70	70	7.3	2.4	1.2	1 U	1 U
1,2-Dichloropropane	ug/l	5	5	2 U	2 U	2 U	2 U	2 U
1,3-Dichlorobenzene	ug/l	NA	NA	1 U	1 U	1 U	1 U	1 U
1,4-Dichlorobenzene	ug/l	NA	NA	1 U	1 U	1 U	1 U	1 U
1,4-Dioxane	ug/l	NA	NA	-	-	-	-	-
2-Butanone	ug/l	NA	NA	5 U	5 U	5 U	5 U	5 U
2-Hexanone	ug/l	NA	NA	5 U	5 U	5 U	5 U	5 U
4-Methyl-2-pentanone	ug/l	NA	NA	5 U	5 U	5 U	5 U	5 U
Acetone	ug/l	NA	6300	5 U	5 U	5 U	5 U	5 U
Benzene	ug/l	5	6	0.5 U	0.54	0.47 J	0.5 U	0.5 U
Bromodichloromethane	ug/l	NA	6	1 U	1 U	1 U	1 U	1 U
Bromoform	ug/l	NA	44	1 UJ	1 UJ	1 UJ	1 UJ	1 UJ
Bromomethane	ug/l	NA	10	2 U	2 U	2 U	2 U	2 U
Carbon disulfide	ug/l	NA	600	5 U	5 U	5 U	5 U	5 U
Carbon tetrachloride	ug/l	5	3	1 U	1 U	1 U	1 U	1 U
Chlorobenzene	ug/l	100	47	1 U	3	1.8	0.4 J	1 UJ

Table B-1
Summary of Groundwater Results - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

			Station ID:	MW-1301D	MW-1301S	MW-1302D	MW-1302S	MW-1302S
			Field Sample ID*:	MW1301D	MW1301S	MW1302D	MW1302S	MWXD1
			Lab Sample ID:	M59258-3	M59258-2	M59258-1	M59258-7	M59258-8
			Sample Date:	9/13/2006	9/13/2006	9/13/2006	9/13/2006	9/13/2006
			Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest
			Field QC:	Original data	Original data	Original data	Original data	Field duplicates
			Sampling Method:	Low-Flow	Low-Flow	Low-Flow	Low-Flow	Low-Flow
	Units	**Federal MCL**	**Maine MEG**					
VOCs								
Chloroethane	ug/l	NA	NA	2 U	2 U	68.1	35.6	39.8
Chloroform	ug/l	80	70	1 U	1 U	1 U	1 U	1 U
Chloromethane	ug/l	NA	3	2 U	2 U	2 U	2 U	2 U
cis-1,3-Dichloropropene	ug/l	NA	4	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
Dibromochloromethane	ug/l	NA	4	1 U	1 U	1 U	1 U	1 U
Ethylbenzene	ug/l	700	70	1 U	1 U	1 U	1 U	1 U
Methylene chloride	ug/l	5	47	2 U	2 U	2 U	2 U	2 U
Styrene	ug/l	100	140	5 U	5 U	5 U	5 U	5 U
Tetrachloroethene	ug/l	5	7	1 UJ	1 UJ	1 UJ	1 UJ	1 UJ
Toluene	ug/l	1000	1400	1 U	1 U	1 U	1 U	1 U
trans-1,3-Dichloropropene	ug/l	NA	4	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
Trichloroethene	ug/l	5	32	1.5	1.7	1 U	1 U	1 U
Vinyl Chloride	ug/l	2	0.2	**10.9**	1 U	**2.2**	1 U	1 U
Xylenes, Total	ug/l	10000	1400	1 U	1 U	1 U	1 U	1 U
Total VOC	ug/l	NA	NA	21.72	7.64	183.67	38.7	43.14
Metals								
Aluminum	ug/l	NA	1430	9840	65.1 J	1600	200 U	200 U
Antimony	ug/l	NA	NA	0.63 J	0.7 J	0.49 J	0.48 J	0.5 J
Arsenic	ug/l	10	10	2 U	2 U	3.1	2 UJ	2 J
Barium	ug/l	2000	2000	107 J	66.9 J	22.5 J	31.5 J	31.1 J
Beryllium	ug/l	4	NA	1.5 J	4 U	4 U	4 U	4 U
Cadmium	ug/l	5	3.5	4 U	4 U	1.2 J	4 U	4 U
Calcium	ug/l	NA	NA	123000	138000	68700	83500	80900

Table B-1
Summary of Groundwater Results - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

			Station ID:	MW-1301D	MW-1301S	MW-1302D	MW-1302S	MW-1302S
			Field Sample ID*:	MW1301D	MW1301S	MW1302D	MW1302S	MWXD1
			Lab Sample ID:	M59258-3	M59258-2	M59258-1	M59258-7	M59258-8
			Sample Date:	9/13/2006	9/13/2006	9/13/2006	9/13/2006	9/13/2006
			Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest
			Field QC:	Original data	Original data	Original data	Original data	Field duplicates
			Sampling Method:	Low-Flow	Low-Flow	Low-Flow	Low-Flow	Low-Flow
	Units	**Federal MCL**	**Maine MEG**					
Metals								
Chromium	ug/l	100	40	**113**	10 U	15.9	10 U	10 U
Cobalt	ug/l	NA	NA	11.6 J	2.6 J	3.4 J	50 U	50 U
Copper	ug/l	1300	1300	20.7 J	5.7 J	5.7 J	1.6 J	1.2 J
Iron	ug/l	NA	NA	14500	9850	2830	1380	1530
Lead	ug/l	15	10	5.2	0.65 J	1.8	0.19 J	0.16 J
Magnesium	ug/l	NA	NA	70100	64400	32200	5490	5370
Manganese	ug/l	NA	500	**1530**	**2410**	**4280**	384	373
Mercury	ug/l	NA	NA	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U
Nickel	ug/l	NA	140	81.9	10.3 J	13.5 J	14.3 J	14 J
Potassium	ug/l	NA	NA	14000	5810	6190	14800	14800
Selenium	ug/l	NA	NA	1.3 J	0.78 J	1.1 J	1.3 J	1.2 J
Silver	ug/l	NA	35	5 U	5 U	5 U	5 U	5 U
Sodium	ug/l	NA	20000	**198000**	**69400**	**43400**	3460 J	3450 J
Thallium	ug/l	NA	NA	1 U	1 U	0.24 J	0.22 J	1 UJ
Vanadium	ug/l	NA	NA	20.1 J	50 U	4 J	50 U	50 U
Zinc	ug/l	NA	2000	58.5 J	14.2 J	11.7 J	7.4 J	8.9 J

Table B-1
Summary of Groundwater Results - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

Station ID:		MW-1303A	MW-1303A	MW-1303A	MW-217B	MW-217B		
Field Sample ID*:		MW1303AD	MW1303A-S	MW1303A-S	MW217B-D	MW217B		
Lab Sample ID:		M59258-4	M59391-1	M59391-1	M59258-6	M59258-5		
Sample Date:		9/13/2006	9/20/2006	9/20/2006	9/13/2006	9/13/2006		
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest		
Field QC:		Original data	Original data	Original data	Original data	Original data		
Sampling Method:		Low Flow	Low Flow	Low Flow	Deep Diffusion	Low-Flow		
	Units							
VOCs								
1,1,1-Trichloroethane	ug/l	1 U	1 U	-	1 U	-	-	-
1,1,2,2-Tetrachloroethane	ug/l	1 U	1 U	-	1 U	-	-	-
1,1,2-Trichloroethane	ug/l	1 U	1 U	-	1 U	-	-	-
1,1-Dichloroethane	ug/l	1 U	1 U	-	1 U	-	-	-
1,1-Dichloroethene	ug/l	1 U	1 U	-	1 U	-	-	-
1,2-Dichlorobenzene	ug/l	1 U	1 U	-	1 U	-	-	-
1,2-Dichloroethane	ug/l	1.1	1 U	-	1 U	-	-	-
1,2-Dichloroethene, total	ug/l	1 U	1 U	-	1 U	-	-	-
1,2-Dichloropropane	ug/l	2 U	2 U	-	2 U	-	-	-
1,3-Dichlorobenzene	ug/l	1 U	1 U	-	1 U	-	-	-
1,4-Dichlorobenzene	ug/l	1 U	2.2	-	1 U	-	-	-
1,4-Dioxane	ug/l	-	25 U	-	-	-	-	-
2-Butanone	ug/l	5 U	5 U	-	5 U	-	-	-
2-Hexanone	ug/l	5 U	5 U	-	5 U	-	-	-
4-Methyl-2-pentanone	ug/l	5 U	5 U	-	5 U	-	-	-
Acetone	ug/l	15.4	5 U	-	11.7	-	-	-
Benzene	ug/l	0.5 U	0.5 U	-	0.5 U	-	-	-
Bromodichloromethane	ug/l	1 U	1 U	-	1 U	-	-	-
Bromoform	ug/l	1 UJ	1 U	-	1 UJ	-	-	-
Bromomethane	ug/l	2 U	2 U	-	2 U	-	-	-
Carbon disulfide	ug/l	5 U	5 U	-	5 U	-	-	-
Carbon tetrachloride	ug/l	1 U	1 U	-	1 U	-	-	-
Chlorobenzene	ug/l	1 U	1 U	-	2.1	-	-	-

Table B-1
Summary of Groundwater Results - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

Station ID:		MW-1303A	MW-1303A	MW-1303A	MW-217B	MW-217B		
Field Sample ID*:		MW1303AD	MW1303A-S	MW1303A-S	MW217B-D	MW217B		
Lab Sample ID:		M59258-4	M59391-1	M59391-1	M59258-6	M59258-5		
Sample Date:		9/13/2006	9/20/2006	9/20/2006	9/13/2006	9/13/2006		
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest		
Field QC:		Original data	Original data	Original data	Original data	Original data		
Sampling Method:		Low Flow	Low Flow	Low Flow	Deep Diffusion	Low-Flow		
	Units							
VOCs								
Chloroethane	ug/l	6.4	2 U	-	2 U	-	-	-
Chloroform	ug/l	1 U	1 U	-	1 U	-	-	-
Chloromethane	ug/l	2 U	2 U	-	2 U	-	-	-
cis-1,3-Dichloropropene	ug/l	0.5 U	0.5 U	-	0.5 U	-	-	-
Dibromochloromethane	ug/l	1 U	1 U	-	1 U	-	-	-
Ethylbenzene	ug/l	1 U	0.46 J	-	1 U	-	-	-
Methylene chloride	ug/l	2 U	2 U	-	2 U	-	-	-
Styrene	ug/l	5 U	5 U	-	5 U	-	-	-
Tetrachloroethene	ug/l	1 UJ	1 U	-	1 UJ	-	-	-
Toluene	ug/l	1 U	1 U	-	1 U	-	-	-
trans-1,3-Dichloropropene	ug/l	0.5 U	0.5 U	-	0.5 U	-	-	-
Trichloroethene	ug/l	1 U	1 U	-	1 U	-	-	-
Vinyl Chloride	ug/l	1 U	1 U	-	1.4	-	-	-
Xylenes, Total	ug/l	1 U	1 U	-	1 U	-	-	-
Total VOC	ug/l	7.5	2.66	-	3.5	-	-	-
Metals								
Aluminum	ug/l	1290	98.8 J	-	-	14000	-	-
Antimony	ug/l	0.55 J	4 U	-	-	4	-	-
Arsenic	ug/l	**47.5**	2 U	-	-	**442**	-	-
Barium	ug/l	23.5 J	14.8 J	-	-	1540	-	-
Beryllium	ug/l	4 U	4 U	-	-	4.7 J	-	-
Cadmium	ug/l	4 U	4 U	-	-	800 U	-	-
Calcium	ug/l	66900	32900	-	-	97600	-	-

Table B-1
Summary of Groundwater Results - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

Station ID:		MW-1303A	MW-1303A	MW-1303A	MW-217B	MW-217B		
Field Sample ID*:		MW1303AD	MW1303A-S	MW1303A-S	MW217B-D	MW217B		
Lab Sample ID:		M59258-4	M59391-1	M59391-1	M59258-6	M59258-5		
Sample Date:		9/13/2006	9/20/2006	9/20/2006	9/13/2006	9/13/2006		
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest		
Field QC:		Original data	Original data	Original data	Original data	Original data		
Sampling Method:		Low Flow	Low Flow	Low Flow	Deep Diffusion	Low-Flow		
	Units							
Metals								
Chromium	ug/l	8.8 J	1.8 J	-	-	**265**	-	-
Cobalt	ug/l	10.7 J	3.2 J	-	-	117	-	-
Copper	ug/l	2.4 J	1.2 J	-	-	403 J	-	-
Iron	ug/l	18400	612	-	-	6210000	-	-
Lead	ug/l	0.81 J	0.79 J	-	-	**22.3**	-	-
Magnesium	ug/l	31900	4640 J	-	-	19800	-	-
Manganese	ug/l	**1530**	**1890**	-	-	**3720**	-	-
Mercury	ug/l	0.2 U	0.2 UJ	-	-	0.2	-	-
Nickel	ug/l	10.2 J	10.2 J	-	-	**298**	-	-
Potassium	ug/l	4730 J	5070	-	-	6160 J	-	-
Selenium	ug/l	1.5 J	10 U	-	-	4.7 J	-	-
Silver	ug/l	5 U	5 U	-	-	16.6	-	-
Sodium	ug/l	**31200**	16700	-	-	**52100**	-	-
Thallium	ug/l	1 U	0.6 J	-	-	0.22 J	-	-
Vanadium	ug/l	2.2 J	50 U	-	-	713	-	-
Zinc	ug/l	18.1 J	9.3 J	-	-	**2390 J**	-	-

Table B-1

Notes:

MEG - obtained from State of Maine Department of Human Services Maximum Exposure Guidelines, Memorandum dated 23 October 1992.
MCL - obtained from 40 CFR Parts 141 and 142 (U.S. EPA 1998).
Screening Value - Risk Based Ecological Screening Values for Surface Water, Seep Water, and Sediment at the Naval Air Station Brunswick, EA Science and Technology, January, 2006
* Field Sample IDs begin with **BN-1&3-29-** for samples collected from Sites 1 and 3 or **BN-EP-29-** for samples collected from the Eastern Plume area.
VOCs analyzed by EPA Method 8260B.
Target Analyte List Metals analyzed by EPA 6000/7000 series methods.
Pesticides analyzed by EPA Method 8081A.

Acronyms:

-	Not sampled
EPA	U.S. Environmental Protection Agency
GWETS	Groundwater Extraction and Treatment System
ID	Identification
MCL	Maximum Contaminant Level
MEG	Maximum Exposure Guideline
mg/kg	milligrams per kilogram
mg/L	milligrams per liter
MNA	Monitored Natural Attenuation
NA	Criteria not applicable
VOC	Volatile Organic Compound
ug/L	micrograms per liter

Validation Qualifiers:

U	Not detected at or above the sample quantitation limit
J	Estimated concentration
UJ	Not detected. Sample quantitation limit is estimated.
R	Value rejected by data validator

Total VOC calculation does not include common laboratory contaminants (acetone, methylene chloride, 2-butanone), VOCs detected in the blank samples, or 1,4-dioxane.
Results for 2-butanone, 2-hexanone, 4-methyl-2-pentanone, and acetone are not usable when samples are collected by diffusion sampling.
Highlighted concentrations indicate exceedance of an MEG, MCL or screening level. The color of the highlight indicated which screening level was exceeded.
Refer to the Data Quality Review section for reporting limits and method detection limits for all analyzed compounds.

VOC Contaminants of Concern:
1,1-Dichloroethane
1,2-Dichloroethene, total
Chlorobenzene
Ethylbenzene
Methylene Chloride
Toluene
Vinyl Chloride
Xylenes, total

Metals Contaminants of Concern:
Aluminum
Arsenic
Barium
Chromium
Lead
Manganese
Nickel
Potassium

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Table B-2
Summary of Leachate Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

		Station ID:	SEEP-01	SEEP-03	SEEP-04	SEEP-05	SEEP-09	SEEP-09
		Field Sample ID*:	SEEP1	SEEP3	SEEP4	SEEP5	SEEP9	SEEP-XD1
		Lab Sample ID:	M59273-1	M59273-2	M59273-4	M59273-3	M59273-12	M59273-13
		Sample Date:	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006
		Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
		Field QC:	Original data	Original data	Original data	Original data	Original data	Field duplicates
		Sampling Method:	Grab	Grab	Grab	Grab	Grab	Grab
	Units	**Screening Value**						
VOCs								
1,1,1-Trichloroethane	ug/l	11	1 U	1.2	1 U	1 U	1 U	1 U
1,1,2,2-Tetrachloroethane	ug/l	610	1 U	1 U	1 U	1 U	1 U	1 U
1,1,2-Trichloroethane	ug/l	1200	1 U	1 U	1 U	1 U	1 U	1 U
1,1-Dichloroethane	ug/l	47	1 U	2.5	1 U	1 U	1 U	1 U
1,1-Dichloroethene	ug/l	25	1 U	1 U	1 U	1 U	1 U	1 U
1,2-Dichlorobenzene	ug/l	14	1 U	1 U	1 U	1 U	1 U	1 U
1,2-Dichloroethane	ug/l	910	1 U	1 U	1 U	1 U	1 U	1 U
1,2-Dichloroethene, total	ug/l	NA	1 U	3.2	1 U	1 U	1 U	1 U
1,2-Dichloropropane	ug/l	2160	2 U	2 U	2 U	2 U	2 U	2 U
1,3-Dichlorobenzene	ug/l	71	1 U	1 U	1 U	1 U	1 U	1 U
1,4-Dichlorobenzene	ug/l	15	1 U	1 U	1 U	1 U	1 U	1 U
2-Butanone	ug/l	14000	5 U	5 U	5 U	5 U	5 U	5 U
2-Hexanone	ug/l	99	5 U	5 U	5 U	5 U	5 U	5 U
4-Methyl-2-pentanone	ug/l	170	5 U	5 U	5 U	5 U	5 U	5 U
Acetone	ug/l	1500	5 U	5 U	11.4	32.8	5 U	5 U
Benzene	ug/l	130	0.5 U	0.44 J	0.5 U	0.5 U	0.5 U	0.5 U
Bromodichloromethane	ug/l	2610	1 U	1 U	1 U	1 U	1 U	1 U
Bromoform	ug/l	2300	1 U	1 U	1 U	1 U	1 U	1 U
Bromomethane	ug/l	9450	2 U	2 U	2 U	2 U	2 U	2 U
Carbon disulfide	ug/l	92	5 U	1.4 J	1.2 J	5.7	5 U	5 U
Carbon tetrachloride	ug/l	9.8	1 U	1 U	1 U	1 U	1 U	1 U
Chlorobenzene	ug/l	64	1 U	0.7 J	1 U	1 U	1 U	1 U

Table B-2
Summary of Leachate Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

		Station ID:	SEEP-01	SEEP-03	SEEP-04	SEEP-05	SEEP-09	SEEP-09
		Field Sample ID*:	SEEP1	SEEP3	SEEP4	SEEP5	SEEP9	SEEP-XD1
		Lab Sample ID:	M59273-1	M59273-2	M59273-4	M59273-3	M59273-12	M59273-13
		Sample Date:	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006
		Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
		Field QC:	Original data	Original data	Original data	Original data	Original data	Field duplicates
		Sampling Method:	Grab	Grab	Grab	Grab	Grab	Grab
	Units	**Screening Value**						
VOCs								
Chloroethane	ug/l	NA	2 U	2 U	2 U	2 U	2 U	2 U
Chloroform	ug/l	28	1 U	1 U	1 U	1 U	1 U	1 U
Chloromethane	ug/l	6000	2 UJ	2 UJ	2 UJ	2 UJ	2 UJ	2 UJ
cis-1,3-Dichloropropene	ug/l	0.085	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
Dibromochloromethane	ug/l	2510	1 U	1 U	1 U	1 U	1 U	1 U
Ethylbenzene	ug/l	7.3	1 U	1 U	1 U	1 U	1 U	1 U
Methylene chloride	ug/l	2200	2 U	2 U	2 U	2 U	2 U	2 U
Styrene	ug/l	300	5 U	5 U	5 U	5 U	5 UJ	5 U
Tetrachloroethene	ug/l	98	1 U	1 U	1 U	1 U	1 U	1 U
Toluene	ug/l	9.8	1 U	1 U	1 U	1 U	1 U	1 U
trans-1,3-Dichloropropene	ug/l	0.085	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
Trichloroethene	ug/l	47	1 U	1.7	1 U	1 U	1 U	1 U
Vinyl Chloride	ug/l	0.069	1 U	1 U	1 U	1 U	1 U	1 U
Xylenes, Total	ug/l	1.8	1 U	1 U	1 U	1 U	1 U	1 U
Total VOC	ug/l	NA	0	11.4	1.2	5.7	0	0
Metals								
Aluminum	ug/l	87	224	941	2870	28000	371000 J	273000 J
Antimony	ug/l	30	0.89 J	0.77 J	1.4 J	3.7 J	3.3 J	7.6 J
Arsenic	ug/l	150	2 U	3.2	8.5	1590	83.5 J	706 J
Barium	ug/l	3.9	28 J	49 J	73.8 J	177 J	2450 J	2070 J
Beryllium	ug/l	0.66	4 U	4 U	4 U	3.7 J	26.4	20.7
Cadmium	ug/l	0.08	4 U	4 U	8 U	20 U	83.9 J	8.8 J

Table B-2
Summary of Leachate Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

		Station ID:	SEEP-01	SEEP-03	SEEP-04	SEEP-05	SEEP-09	SEEP-09
		Field Sample ID*:	SEEP1	SEEP3	SEEP4	SEEP5	SEEP9	SEEP-XD1
		Lab Sample ID:	M59273-1	M59273-2	M59273-4	M59273-3	M59273-12	M59273-13
		Sample Date:	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006
		Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
		Field QC:	Original data	Original data	Original data	Original data	Original data	Field duplicates
		Sampling Method:	Grab	Grab	Grab	Grab	Grab	Grab
	Units	**Screening Value**						
Metals								
Calcium	ug/l	NA	69000	54300	72700	62500	290000 J	301000
Chromium	ug/l	11	2.7 J	20.2	107	39.7	387 J	287
Cobalt	ug/l	23	6.3 J	4 J	16.5 J	209	2060 J	1690 J
Copper	ug/l	2.36	0.99 J	11.1 J	24.8 J	58.6	576 J	358
Iron	ug/l	1000	1490	21200	221000	476000	2640000 J	1680000 J
Lead	ug/l	0.41	0.72 J	3.5	4.8	107	54.7 J	439 J
Magnesium	ug/l	NA	13700	10700	7180	15900	71200 J	58500 J
Manganese	ug/l	120	441	2580	80.8	9540	76800	58500
Mercury	ug/l	0.91	0.2 U	0.086 J	0.2 U	1	10.8	12.4
Nickel	ug/l	13.4	4.1 J	24.2 J	230	163	878 J	667 J
Potassium	ug/l	NA	4220 J	6200 J	16500 J	5190 J	39200 J	29900 J
Selenium	ug/l	5	10 U	10 U	4.3 J	5.1 J	50 UJ	22.9 J
Silver	ug/l	0.23	5 U	5 U	5 U	1.5 J	5.8 J	5.7 J
Sodium	ug/l	NA	36300	37400	6040	12400	25000 J	25900 J
Thallium	ug/l	12	1 U	0.3 J	0.36 J	1.6 J	4.9 J	10.7 J
Vanadium	ug/l	20	50 U	2.8 J	59.9	158	737 J	576
Zinc	ug/l	NA	8.8 J	37.3	13.6 J	169	1540	1190
Pesticides								
4,4'-DDD	ug/l	NA	0.022 UJ	0.022 UJ	0.02 UJ	0.19 J	0.19 J	0.37 J
4,4'-DDE	ug/l	NA	0.022 U	0.022 U	0.02 U	0.13	0.24 J	0.29 J
4,4'-DDT	ug/l	NA	0.022 UJ	0.022 UJ	0.02 UJ	0.091 J	0.2 J	0.62 J
Aldrin	ug/l	NA	0.022 U	0.022 U	0.02 U	0.021 U	0.029 U	0.025 U

Table B-2
Summary of Leachate Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

		Station ID:	SEEP-01	SEEP-03	SEEP-04	SEEP-05	SEEP-09	SEEP-09
		Field Sample ID*:	SEEP1	SEEP3	SEEP4	SEEP5	SEEP9	SEEP-XD1
		Lab Sample ID:	M59273-1	M59273-2	M59273-4	M59273-3	M59273-12	M59273-13
		Sample Date:	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006
		Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
		Field QC:	Original data	Original data	Original data	Original data	Original data	Field duplicates
		Sampling Method:	Grab	Grab	Grab	Grab	Grab	Grab
	Units	**Screening Value**						
Pesticides								
Alpha-BHC	ug/l	NA	0.022 U	0.0083 J	0.02 U	0.021 U	0.029 U	0.025 U
Alpha-chlordane	ug/l	NA	0.022 U	0.022 U	0.02 U	0.021 U	0.029 U	0.025 U
Beta-BHC	ug/l	NA	0.022 U	0.022 U	0.02 U	0.021 U	0.029 U	0.025 U
Delta-BHC	ug/l	NA	0.022 U	0.022 U	0.02 U	0.021 U	0.029 U	0.025 U
Dieldrin	ug/l	NA	0.022 U	0.013 J	0.02 U	0.021 U	0.029 U	0.025 U
Endosulfan I	ug/l	NA	0.022 U	0.022 U	0.02 U	0.021 U	0.029 U	0.014 J
Endosulfan II	ug/l	NA	0.022 U	0.022 U	0.02 U	0.021 U	0.029 U	0.025 U
Endosulfan Sulfate	ug/l	NA	0.022 U	0.022 U	0.02 U	0.021 U	0.029 U	0.025 U
Endrin	ug/l	NA	0.022 U	0.022 U	0.02 U	0.021 U	0.029 U	0.025 U
Endrin Aldehyde	ug/l	NA	0.022 U	0.022 U	0.02 U	0.021 U	0.029 U	0.025 U
Endrin Ketone	ug/l	NA	0.022 U	0.022 U	0.02 U	0.021 U	0.029 U	0.025 U
Gamma-BHC (Lindane)	ug/l	NA	0.022 U	0.12	0.02 U	0.021 U	0.029 U	0.025 U
Gamma-Chlordane	ug/l	NA	0.022 U	0.022 U	0.02 U	0.021 U	0.029 U	0.025 U
Heptachlor	ug/l	NA	0.022 UJ	0.022 UJ	0.02 UJ	0.021 UJ	0.029 U	0.025 U
Heptachlor Epoxide	ug/l	NA	0.022 U	0.022 U	0.02 U	0.021 U	0.029 U	0.025 U
Methoxychlor	ug/l	NA	0.022 UJ	0.022 UJ	0.02 UJ	0.021 UJ	0.029 U	0.025 U

Table B-2

Notes:

MEG - obtained from State of Maine Department of Human Services Maximum Exposure Guidelines, Memorandum dated 23 October 1992.
MCL - obtained from 40 CFR Parts 141 and 142 (U.S. EPA 1998).
Screening Value - Risk Based Ecological Screening Values for Surface Water, Seep Water, and Sediment at the Naval Air Station Brunswick, EA Science and Technology, January, 2006
* Field Sample IDs begin with **BN-1&3-29-** for samples collected from Sites 1 and 3 or **BN-EP-29-** for samples collected from the Eastern Plume area.
VOCs analyzed by EPA Method 8260B.
Target Analyte List Metals analyzed by EPA 6000/7000 series methods.
Pesticides analyzed by EPA Method 8081A.

Acronyms:

-	Not sampled
EPA	U.S. Environmental Protection Agency
GWETS	Groundwater Extraction and Treatment System
ID	Identification
MCL	Maximum Contaminant Level
MEG	Maximum Exposure Guideline
mg/kg	milligrams per kilogram
mg/L	milligrams per liter
MNA	Monitored Natural Attenuation
NA	Criteria not applicable
VOC	Volatile Organic Compound
ug/L	micrograms per liter

Validation Qualifiers:

U	Not detected at or above the sample quantitation limit
J	Estimated concentration
UJ	Not detected. Sample quantitation limit is estimated.
R	Value rejected by data validator

Total VOC calculation does not include common laboratory contaminants (acetone, methylene chloride, 2-butanone), VOCs detected in the blank samples, or 1,4-dioxane.
Highlighted concentrations indicate exceedance of an MEG, MCL or screening level. The color of the highlight indicated which screening level was exceeded.
Refer to the Data Quality Review section for reporting limits and method detection limits for all analyzed compounds.

VOC Contaminants of Concern:
1,1-Dichloroethane
1,2-Dichloroethene, total
Chlorobenzene
Ethylbenzene
Methylene Chloride
Toluene
Vinyl Chloride
Xylenes, total

Metals Contaminants of Concern:
Aluminum
Arsenic
Barium
Chromium
Lead
Manganese
Nickel
Potassium

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Table B-3
Summary of Leachate Station Sediment Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

		Station ID:	SEEP-01	SEEP-03	SEEP-04	SEEP-05	SEEP-09	SEEP-09
		Field Sample ID*:	LT1	LT3	LT4	LT5	LT9	LT-XD1
		Lab Sample ID:	M59298-3	M59298-6	M59298-4	M59298-5	M59298-1	M59298-2
		Sample Date:	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006
		Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
		Field QC:	Original data	Original data	Original data	Original data	Original data	Field duplicates
		Sampling Method:	Grab	Grab	Grab	Grab	Grab	Grab
	Units	**Screening Value**						
VOCs								
1,1,1-Trichloroethane	mg/kg	0.17	0.018 UJ	0.0113 J	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
1,1,2,2-Tetrachloroethane	mg/kg	0.94	0.018 UJ	0.0613 J	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
1,1,2-Trichloroethane	mg/kg	0.17	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
1,1-Dichloroethane	mg/kg	4.6	0.018 UJ	0.0189 J	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
1,1-Dichloroethene	mg/kg	4.8	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
1,2-Dichlorobenzene	mg/kg	0.34	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.32 J	0.148 J
1,2-Dichloroethane	mg/kg	4.4	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
1,2-Dichloroethene, total	mg/kg	NA	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
1,2-Dichloropropane	mg/kg	5.8	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
1,3-Dichlorobenzene	mg/kg	1.7	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
1,4-Dichlorobenzene	mg/kg	0.35	0.018 UJ	0.0359 J	0.266 J	1.12 J	0.143 J	0.0624 J
2-Butanone	mg/kg	2.9	0.045 UJ	0.025 UJ	0.015 UJ	0.062 UJ	0.045 UJ	0.022 UJ
2-Hexanone	mg/kg	4.4	0.045 UJ	0.025 UJ	0.015 UJ	0.062 UJ	0.045 UJ	0.022 UJ
4-Methyl-2-pentanone	mg/kg	0.026	0.045 UJ	0.025 UJ	0.015 UJ	0.062 UJ	0.045 UJ	0.022 UJ
Acetone	mg/kg	2.3	8.22 J	6.2 J	0.646 J	10.5 J	5.62 J	3.48 J
Benzene	mg/kg	0.057	0.0045 UJ	0.0047 J	0.0015 UJ	0.0062 UJ	0.0045 UJ	0.0022 UJ
Bromodichloromethane	mg/kg	7.7	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
Bromoform	mg/kg	12.2	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
Bromomethane	mg/kg	1.4	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
Carbon disulfide	mg/kg	0.0016	0.408 J	0.506 J	0.0742 J	0.383 J	0.255 J	0.485 J
Carbon tetrachloride	mg/kg	7.7	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
Chlorobenzene	mg/kg	0.82	0.018 UJ	0.0242 J	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ

Table B-3
Summary of Leachate Station Sediment Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

		Station ID:	SEEP-01	SEEP-03	SEEP-04	SEEP-05	SEEP-09	SEEP-09
		Field Sample ID*:	LT1	LT3	LT4	LT5	LT9	LT-XD1
		Lab Sample ID:	M59298-3	M59298-6	M59298-4	M59298-5	M59298-1	M59298-2
		Sample Date:	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006
		Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
		Field QC:	Original data	Original data	Original data	Original data	Original data	Field duplicates
		Sampling Method:	Grab	Grab	Grab	Grab	Grab	Grab
	Units	**Screening Value**						
VOCs								
Chloroethane	mg/kg	2.9	0.045 UJ	0.025 UJ	0.015 UJ	0.062 UJ	0.045 UJ	0.022 UJ
Chloroform	mg/kg	5.6	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
Chloromethane	mg/kg	2.1	0.045 UJ	0.025 UJ	0.015 UJ	0.062 UJ	0.045 UJ	0.022 UJ
cis-1,3-Dichloropropene	mg/kg	0.000023	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
Dibromochloromethane	mg/kg	9.9	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
Ethylbenzene	mg/kg	3.6	0.018 UJ	0.01 UJ	0.005 J	0.025 UJ	0.018 UJ	0.0087 UJ
Methylene chloride	mg/kg	3.7	0.103 J	0.0263 UJ	0.0061 UJ	0.025 UJ	0.0422 UJ	0.0087 UJ
Styrene	mg/kg	9.2	0.045 UJ	0.025 UJ	0.015 UJ	0.062 UJ	0.045 UJ	0.022 UJ
Tetrachloroethene	mg/kg	0.53	0.018 UJ	0.0504 J	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
Toluene	mg/kg	0.67	0.045 UJ	0.0152 J	0.0224 J	0.062 UJ	0.045 UJ	0.0057 J
trans-1,3-Dichloropropene	mg/kg	0.000023	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
Trichloroethene	mg/kg	1.4	0.018 UJ	0.0461 J	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
Vinyl Chloride	mg/kg	0.000016	0.018 UJ	0.01 UJ	0.0061 UJ	0.025 UJ	0.018 UJ	0.0087 UJ
Xylenes, Total	mg/kg	9.7	0.018 UJ	0.01 UJ	0.0027 J	0.025 UJ	0.018 UJ	0.0087 UJ
Total VOC	mg/kg	NA	0.408	0.774	0.3703	1.503	0.718	0.7011
Metals								
Aluminum	mg/kg	26000	3140 J	3010 J	1800 J	8220 J	7200 J	1670 J
Antimony	mg/kg	0.16	3.4 UJ	3.1 UJ	0.63 J	3 UJ	3.2 UJ	6.4 UJ
Arsenic	mg/kg	9.8	5.2	27.7	33.3	416 J	363 J	792 J
Barium	mg/kg	0.7	142	203	20.3 J	33.2	51.6	53.2
Beryllium	mg/kg	0.55	1.3	0.77	0.67 J	0.96	0.59 J	0.64 U
Cadmium	mg/kg	0.99	2.9	0.61 U	0.22 J	1.4	1.3 U	13 U

Table B-3
Summary of Leachate Station Sediment Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

		Station ID:	SEEP-01	SEEP-03	SEEP-04	SEEP-05	SEEP-09	SEEP-09
		Field Sample ID*:	LT1	LT3	LT4	LT5	LT9	LT-XD1
		Lab Sample ID:	M59298-3	M59298-6	M59298-4	M59298-5	M59298-1	M59298-2
		Sample Date:	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006
		Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
		Field QC:	Original data	Original data	Original data	Original data	Original data	Field duplicates
		Sampling Method:	Grab	Grab	Grab	Grab	Grab	Grab
	Units	**Screening Value**						
Metals								
Calcium	mg/kg	NA	16700 J	12900 J	4500 J	7800 J	10100 J	2710 J
Chromium	mg/kg	43.4	4.9	12.8	4.6	13.7	12.2	8 U
Cobalt	mg/kg	10	164	34.3	31.5	111	80.7	11.7
Copper	mg/kg	31.6	14.4	4.9	4 J	13.3	17	2.3 J
Iron	mg/kg	10000	52800	157000	9520	67800	127000	495000
Lead	mg/kg	35.8	21.6	25.8	14.7	44.1	21.4	8.5
Magnesium	mg/kg	NA	1260	855	333 J	2100	2190	509 J
Manganese	mg/kg	630	6140 J	15500 J	12.7 J	1170 J	774 J	939 J
Mercury	mg/kg	0.18	0.62 J	1.2 J	0.63 J	0.28 J	0.081 J	0.035 J
Nickel	mg/kg	22.7	60.8	13.3	54.4	27.7	32.3	3.6 J
Potassium	mg/kg	NA	666 J	289 J	146 J	487 J	812	800 U
Selenium	mg/kg	0.29	3.8 J	5 J	3.2 J	3.2 J	2.4 J	4 UJ
Silver	mg/kg	0.5	0.46 J	1.2 J	1 UJ	0.19 J	0.81 UJ	0.18 J
Sodium	mg/kg	NA	275 J	115 J	70.1 J	193 J	209 J	800 U
Thallium	mg/kg	NA	17 U	31 U	4.1 U	3 U	3.1 J	7.9
Vanadium	mg/kg	43	24.5	20.1	12.1	42.6	27.5	28.3
Zinc	mg/kg	NA	106	22.2	14.7	34.8	73.8	18.6

Table B-3

Notes:

MEG - obtained from State of Maine Department of Human Services Maximum Exposure Guidelines, Memorandum dated 23 October 1992.
MCL - obtained from 40 CFR Parts 141 and 142 (U.S. EPA 1998).
Screening Value - Risk Based Ecological Screening Values for Surface Water, Seep Water, and Sediment at the Naval Air Station Brunswick, EA Science and Technology, January, 2006
* Field Sample IDs begin with **BN-1&3-29-** for samples collected from Sites 1 and 3 or **BN-EP-29-** for samples collected from the Eastern Plume area.
VOCs analyzed by EPA Method 8260B.
Target Analyte List Metals analyzed by EPA 6000/7000 series methods.
Pesticides analyzed by EPA Method 8081A.

Acronyms:

-	Not sampled
EPA	U.S. Environmental Protection Agency
GWETS	Groundwater Extraction and Treatment System
ID	Identification
MCL	Maximum Contaminant Level
MEG	Maximum Exposure Guideline
mg/kg	milligrams per kilogram
mg/L	milligrams per liter
MNA	Monitored Natural Attenuation
NA	Criteria not applicable
VOC	Volatile Organic Compound
ug/L	micrograms per liter

Validation Qualifiers:

U	Not detected at or above the sample quantitation limit
J	Estimated concentration
UJ	Not detected. Sample quantitation limit is estimated.
R	Value rejected by data validator

Total VOC calculation does not include common laboratory contaminants (acetone, methylene chloride, 2-butanone), VOCs detected in the blank samples, or 1,4-dioxane.
Highlighted concentrations indicate exceedance of an MEG, MCL or screening level. The color of the highlight indicated which screening level was exceeded.
Refer to the Data Quality Review section for reporting limits and method detection limits for all analyzed compounds.

VOC Contaminants of Concern:
1,1-Dichloroethane
1,2-Dichloroethene, total
Chlorobenzene
Ethylbenzene
Methylene Chloride
Toluene
Vinyl Chloride
Xylenes, total

Metals Contaminants of Concern:
Aluminum
Arsenic
Barium
Chromium
Lead
Manganese
Nickel
Potassium

Table B-4
Summary of Sediment Station Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

		Station ID:	SED-15	SED-16	SED-17	SED-18	SED-19	SED-19
		Field Sample ID*:	SED15	SED16	SED17	SED18	SED19	SED-XD1
		Lab Sample ID:	M59294-3	M59294-4	M59294-5	M59294-6	M59294-1	M59294-2
		Sample Date:	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006
		Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
		Field QC:	Original data	Original data	Original data	Original data	Original data	Field duplicates
		Sampling Method:	Grab	Grab	Grab	Grab	Grab	Grab
	Units	**Screening Value**						
Metals								
Aluminum	mg/kg	26000	2620	3070	2640	3470	1700	2170
Antimony	mg/kg	0.16	2.7 U	2.7 U	2.6 U	2.4 U	2.7 U	2.5 U
Arsenic	mg/kg	9.8	2 J	2.2 J	2.6	2.2 J	3.1	4.1
Barium	mg/kg	0.7	16.5 J	20.5 J	21.8 J	16.5 J	19.1 J	26.1 J
Beryllium	mg/kg	0.55	0.23 J	0.24 J	0.23 J	0.28 J	0.19 J	0.26 J
Cadmium	mg/kg	0.99	0.54 U	0.54 U	0.52 U	0.48 U	0.54 U	0.5 U
Calcium	mg/kg	NA	416 J	513 J	387 J	951	287 J	463 J
Chromium	mg/kg	43.4	3.9	4.9	4.5	6.2	2.5 J	4.5 J
Cobalt	mg/kg	10	3.2 J	4 J	3.8 J	3.1 J	2.8 J	3.8 J
Copper	mg/kg	31.6	3.1 J	3.3 J	2.9 J	4	1.6 J	2 J
Iron	mg/kg	10000	5330	7040	6600	7200	5790	7450
Lead	mg/kg	35.8	2.7	3.4	3.8	4.9	2.9	3.8
Magnesium	mg/kg	NA	874	1070	923	1380	582 J	821
Manganese	mg/kg	630	416	186	756	112	506	720
Mercury	mg/kg	0.18	0.012 J	0.015 J	0.0087 J	0.01 J	0.014 J	0.0085 J
Nickel	mg/kg	22.7	5.7	6	6.2	6.2	4.1 J	5.5
Potassium	mg/kg	NA	365 J	458 J	363 J	660 J	220 J	251 J
Selenium	mg/kg	0.29	0.68 UJ	0.68 UJ	0.65 UJ	0.6 UJ	0.68 UJ	0.46 J
Silver	mg/kg	0.5	0.1 J	0.68 UJ	0.65 UJ	0.6 UJ	0.096 J	0.076 J
Sodium	mg/kg	NA	75.2 J	77.2 J	58.6 J	70.2 J	69.7 J	59.5 J
Thallium	mg/kg	NA	2.7 U	2.7 U	2.6 U	2.4 U	2.7 U	2.5 U
Vanadium	mg/kg	43	6.2 J	7.4	6.7	8.6	4.4 J	5.7 J
Zinc	mg/kg	NA	14.8	20.2	17.9	25.7	17.6	22

Table B-4
Summary of Sediment Station Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

		Station ID:	SED-15	SED-16	SED-17	SED-18	SED-19	SED-19
		Field Sample ID*:	SED15	SED16	SED17	SED18	SED19	SED-XD1
		Lab Sample ID:	M59294-3	M59294-4	M59294-5	M59294-6	M59294-1	M59294-2
		Sample Date:	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006
		Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
		Field QC:	Original data	Original data	Original data	Original data	Original data	Field duplicates
		Sampling Method:	Grab	Grab	Grab	Grab	Grab	Grab
	Units	**Screening Value**						
Pesticides								
4,4'-DDD	mg/kg	0.00488	0.0019 U	0.0018 U	0.0018 U	0.0018 U	0.0019 U	0.0018 U
4,4'-DDE	mg/kg	0.00316	0.0019 U	0.0018 U	0.0018 U	0.0018 U	0.0019 U	0.0018 U
4,4'-DDT	mg/kg	0.00416	0.0019 UJ	0.0018 UJ	0.0018 UJ	0.0018 UJ	0.0019 UJ	0.0018 UJ
Aldrin	mg/kg	0.002	0.0019 U	0.0018 U	0.0018 U	0.0018 U	0.0019 U	0.0018 U
Alpha-BHC	mg/kg	0.006	0.0019 U	0.0018 U	0.0018 U	0.0018 U	0.0019 U	0.0018 U
Beta-BHC	mg/kg	0.005	0.0019 U	0.0018 U	0.0018 U	0.0018 U	0.0019 U	0.0018 U
Chlordane	mg/kg	NA	0.019 U	0.018 U	0.018 U	0.018 U	0.019 U	0.018 U
Delta-BHC	mg/kg	0.0024	0.0019 U	0.0018 U	0.0018 U	0.0018 U	0.0019 U	0.0018 U
Dieldrin	mg/kg	0.0019	0.0019 U	0.0018 U	0.0018 U	0.0018 U	0.0019 U	0.0018 U
Endosulfan I	mg/kg	0.0055	0.0019 U	0.0042	0.0021	0.0018 U	0.002	0.0031
Endosulfan II	mg/kg	0.0055	0.0019 U	0.0018 U	0.0018 U	0.0018 U	0.0019 U	0.0018 U
Endosulfan Sulfate	mg/kg	0.0055	0.0019 U	0.0018 U	0.0018 U	0.0018 U	0.0019 U	0.0018 U
Endrin	mg/kg	0.0022	0.0019 U	0.0018 U	0.0018 U	0.0018 U	0.0019 U	0.0018 U
Endrin Aldehyde	mg/kg	0.0022	0.0019 U	0.0018 U	0.0018 U	0.0018 U	0.0019 U	0.0018 U
Gamma-BHC (Lindane)	mg/kg	0.0024	0.0019 U	0.0018 U	0.0018 U	0.0018 U	0.0019 U	0.0018 U
Heptachlor	mg/kg	0.0025	0.0019 U	0.0018 U	0.0018 U	0.0018 U	0.0019 U	0.0018 U
Heptachlor Epoxide	mg/kg	0.0025	0.0019 U	0.0018 U	0.0018 U	0.0018 U	0.0019 U	0.0018 U
Methoxychlor	mg/kg	0.019	0.0019 UJ	0.0018 UJ	0.0018 UJ	0.0018 UJ	0.0019 UJ	0.0018 UJ
Toxaphene	mg/kg	NA	0.094 U	0.092 U	0.089 U	0.091 U	0.093 U	0.091 U
MNA Parameters								
Total Organic Carbon	mg/kg	NA	1400 U	2450	1810	4310	1510	1300 U

Table B-4

Notes:

MEG - obtained from State of Maine Department of Human Services Maximum Exposure Guidelines, Memorandum dated 23 October 1992.
MCL - obtained from 40 CFR Parts 141 and 142 (U.S. EPA 1998).
Screening Value - Risk Based Ecological Screening Values for Surface Water, Seep Water, and Sediment at the Naval Air Station Brunswick, EA Science and Technology, January, 2006
* Field Sample IDs begin with **BN-1&3-29-** for samples collected from Sites 1 and 3 or **BN-EP-29-** for samples collected from the Eastern Plume area.
VOCs analyzed by EPA Method 8260B.
Target Analyte List Metals analyzed by EPA 6000/7000 series methods.
Pesticides analyzed by EPA Method 8081A.

Acronyms:

-	Not sampled
EPA	U.S. Environmental Protection Agency
GWETS	Groundwater Extraction and Treatment System
ID	Identification
MCL	Maximum Contaminant Level
MEG	Maximum Exposure Guideline
mg/kg	milligrams per kilogram
mg/L	milligrams per liter
MNA	Monitored Natural Attenuation
NA	Criteria not applicable
VOC	Volatile Organic Compound
ug/L	micrograms per liter

Validation Qualifiers:

U	Not detected at or above the sample quantitation limit
J	Estimated concentration
UJ	Not detected. Sample quantitation limit is estimated.
R	Value rejected by data validator

Total VOC calculation does not include common laboratory contaminants (acetone, methylene chloride, 2-butanone), VOCs detected in the blank samples, or 1,4-dioxane.
Highlighted concentrations indicate exceedance of an MEG, MCL or screening level. The color of the highlight indicated which screening level was exceeded.
Refer to the Data Quality Review section for reporting limits and method detection limits for all analyzed compounds.

VOC Contaminants of Concern:
1,1-Dichloroethane
1,2-Dichloroethene, total
Chlorobenzene
Ethylbenzene
Methylene Chloride
Toluene
Vinyl Chloride
Xylenes, total

Metals Contaminants of Concern:
Aluminum
Arsenic
Barium
Chromium
Lead
Manganese
Nickel
Potassium

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Table B-5
Summary of Surface Water Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

		Station ID:	SW-04	SW-07	SW-08	SW-09	SW-09	SW-15
		Field Sample ID*:	SW4	SW7	SW8	SW9	SW-XD1	SW15
		Lab Sample ID:	M59273-5	M59273-11	M59273-8	M59273-9	M59273-6	M59273-10
		Sample Date:	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006
		Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
		Field QC:	Original data	Original data	Original data	Original data	Field duplicates	Original data
		Sampling Method:	Grab	Grab	Grab	Grab	Grab	Grab
	Units	**Screening Value**						
VOCs								
1,1,1-Trichloroethane	ug/l	11	1 U	1 U	1 U	1 U	1 U	1 U
1,1,2,2-Tetrachloroethane	ug/l	610	1 U	1 U	1 U	1 U	1 U	1 U
1,1,2-Trichloroethane	ug/l	1200	1 U	1 U	1 U	1 U	1 U	1 U
1,1-Dichloroethane	ug/l	47	1 U	1 U	1 U	1 U	1 U	1 U
1,1-Dichloroethene	ug/l	25	1 U	1 U	1 U	1 U	1 U	1 U
1,2-Dichlorobenzene	ug/l	14	1 U	1 U	1 U	1 U	1 U	1 U
1,2-Dichloroethane	ug/l	910	1 U	1 U	1 U	1 U	1 U	1 U
1,2-Dichloroethene, total	ug/l	NA	1 U	1 U	1 U	1 U	1 U	1 U
1,2-Dichloropropane	ug/l	2160	2 U	2 U	2 U	2 U	2 U	2 U
1,3-Dichlorobenzene	ug/l	71	1 U	1 U	1 U	1 U	1 U	1 U
1,4-Dichlorobenzene	ug/l	15	1 U	1 U	1 U	1 U	1 U	1 U
2-Butanone	ug/l	14000	5 U	5 U	5 U	5 U	5 U	5 U
2-Hexanone	ug/l	99	5 U	5 U	5 U	5 U	5 U	5 U
4-Methyl-2-pentanone	ug/l	170	5 U	5 U	5 U	5 U	5 U	5 U
Acetone	ug/l	1500	5 U	5 U	5 U	5 U	5 U	5 U
Benzene	ug/l	130	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
Bromodichloromethane	ug/l	2610	1 U	1 U	1 U	1 U	1 U	1 U
Bromoform	ug/l	2300	1 U	1 U	1 U	1 U	1 U	1 U
Bromomethane	ug/l	9450	2 U	2 U	2 U	2 U	2 U	2 U
Carbon disulfide	ug/l	92	5 U	5 U	5 U	5 U	5 U	5 U
Carbon tetrachloride	ug/l	9.8	1 U	1 U	1 U	1 U	1 U	1 U
Chlorobenzene	ug/l	64	1 U	1 U	1 U	1 U	1 U	1 U
Chloroethane	ug/l	NA	2 U	2 U	2 U	2 U	2 U	2 U

Table B-5
Summary of Surface Water Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

		Station ID:	SW-04	SW-07	SW-08	SW-09	SW-09	SW-15
		Field Sample ID*:	SW4	SW7	SW8	SW9	SW-XD1	SW15
		Lab Sample ID:	M59273-5	M59273-11	M59273-8	M59273-9	M59273-6	M59273-10
		Sample Date:	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006
		Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
		Field QC:	Original data	Original data	Original data	Original data	Field duplicates	Original data
		Sampling Method:	Grab	Grab	Grab	Grab	Grab	Grab
	Units	**Screening Value**						
VOCs								
Chloroform	ug/l	28	1 U	1 U	1 U	1 U	1 U	1 U
Chloromethane	ug/l	6000	2 UJ	2 UJ	2 UJ	2 UJ	2 UJ	2 UJ
cis-1,3-Dichloropropene	ug/l	0.085	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
Dibromochloromethane	ug/l	2510	1 U	1 U	1 U	1 U	1 U	1 U
Ethylbenzene	ug/l	7.3	1 U	1 U	1 U	1 U	1 U	1 U
Methylene chloride	ug/l	2200	2 U	2 U	2 U	2 U	2 U	2 U
Styrene	ug/l	300	5 U	5 U	5 U	5 U	5 U	5 U
Tetrachloroethene	ug/l	98	1 U	1 U	1 U	1 U	1 U	1 U
Toluene	ug/l	9.8	1 U	1 U	1 U	1 U	1 U	1 U
trans-1,3-Dichloropropene	ug/l	0.085	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
Trichloroethene	ug/l	47	1 U	1 U	1 U	1 U	1 U	1 U
Vinyl Chloride	ug/l	0.069	1 U	1 U	1 U	1 U	1 U	1 U
Xylenes, Total	ug/l	1.8	1 U	1 U	1 U	1 U	1 U	1 U
Total VOC	ug/l	NA	0	0	0	0	0	0
Metals								
Aluminum	ug/l	87	91.2 J	68.5 J	66 J	41.2 J	90.6 J	55.8 J
Antimony	ug/l	30	0.84 J	0.56 J	0.58 J	0.61 J	0.57 J	0.63 J
Arsenic	ug/l	150	2 U	2 U	2 U	2 U	2 U	2 U
Barium	ug/l	3.9	25.4 J	28 J	22.3 J	22.4 J	26.3 J	26.1 J
Beryllium	ug/l	0.66	4 U	4 U	4 U	4 U	4 U	4 U
Cadmium	ug/l	0.08	4 U	4 U	4 U	4 U	4 U	4 U
Calcium	ug/l	NA	10100	11400	10300	11100	10400	10100
Chromium	ug/l	11	10 U	10 U	10 U	10 U	10 U	10 U

Table B-5
Summary of Surface Water Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

		Station ID:	SW-04	SW-07	SW-08	SW-09	SW-09	SW-15
		Field Sample ID*:	SW4	SW7	SW8	SW9	SW-XD1	SW15
		Lab Sample ID:	M59273-5	M59273-11	M59273-8	M59273-9	M59273-6	M59273-10
		Sample Date:	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006	9/14/2006
		Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
		Field QC:	Original data	Original data	Original data	Original data	Field duplicates	Original data
		Sampling Method:	Grab	Grab	Grab	Grab	Grab	Grab
	Units	**Screening Value**						
Metals								
Cobalt	ug/l	23	50 U	50 U	50 U	50 U	50 U	50 U
Copper	ug/l	2.36	25 U	0.85 J	25 U	25 U	25 U	25 U
Iron	ug/l	1000	983	965	906	875	1060	777
Lead	ug/l	0.41	0.49 J	0.33 J	0.36 J	0.27 J	0.42 J	0.35 J
Magnesium	ug/l	NA	2040 J	2290 J	2240 J	2290 J	2100 J	2050 J
Manganese	ug/l	120	203	223	296	193	204	128
Mercury	ug/l	0.91	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U	0.2 U
Nickel	ug/l	13.4	40 U	40 U	40 U	40 U	40 U	40 U
Potassium	ug/l	NA	1890 J	2020 J	1640 J	1940 J	1940 J	1830 J
Selenium	ug/l	5	10 U	10 U	10 U	10 U	10 U	10 U
Silver	ug/l	0.23	5 U	5 U	5 U	5 U	5 U	5 U
Sodium	ug/l	NA	20100	22000	19000	20400	20500	22000
Thallium	ug/l	12	1 UJ	1 U	1 U	1 U	0.57 J	0.21 J
Vanadium	ug/l	20	50 U	50 U	50 U	50 U	50 U	50 U
Zinc	ug/l	NA	7.4 J	6 J	9.6 J	6.1 J	7.5 J	7.3 J

Table B-5
Summary of Surface Water Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

Station ID:	SW-16
Field Sample ID*:	SW16
Lab Sample ID:	M59273-7
Sample Date:	9/14/2006
Lab Name:	Accutest
Field QC:	Original data
Sampling Method:	Grab

	Units							
VOCs								
1,1,1-Trichloroethane	ug/l	1 U	-	-	-	-	-	-
1,1,2,2-Tetrachloroethane	ug/l	1 U	-	-	-	-	-	-
1,1,2-Trichloroethane	ug/l	1 U	-	-	-	-	-	-
1,1-Dichloroethane	ug/l	1 U	-	-	-	-	-	-
1,1-Dichloroethene	ug/l	1 U	-	-	-	-	-	-
1,2-Dichlorobenzene	ug/l	1 U	-	-	-	-	-	-
1,2-Dichloroethane	ug/l	1 U	-	-	-	-	-	-
1,2-Dichloroethene, total	ug/l	1 U	-	-	-	-	-	-
1,2-Dichloropropane	ug/l	2 U	-	-	-	-	-	-
1,3-Dichlorobenzene	ug/l	1 U	-	-	-	-	-	-
1,4-Dichlorobenzene	ug/l	1 U	-	-	-	-	-	-
2-Butanone	ug/l	5 U	-	-	-	-	-	-
2-Hexanone	ug/l	5 U	-	-	-	-	-	-
4-Methyl-2-pentanone	ug/l	5 U	-	-	-	-	-	-
Acetone	ug/l	5 U	-	-	-	-	-	-
Benzene	ug/l	0.5 U	-	-	-	-	-	-
Bromodichloromethane	ug/l	1 U	-	-	-	-	-	-
Bromoform	ug/l	1 U	-	-	-	-	-	-
Bromomethane	ug/l	2 U	-	-	-	-	-	-
Carbon disulfide	ug/l	5 U	-	-	-	-	-	-
Carbon tetrachloride	ug/l	1 U	-	-	-	-	-	-
Chlorobenzene	ug/l	1 U	-	-	-	-	-	-
Chloroethane	ug/l	2 U	-	-	-	-	-	-

Table B-5
Summary of Surface Water Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

Station ID:	SW-16
Field Sample ID*:	SW16
Lab Sample ID:	M59273-7
Sample Date:	9/14/2006
Lab Name:	Accutest
Field QC:	Original data
Sampling Method:	Grab

	Units							
VOCs								
Chloroform	ug/l	1 U	-	-	-	-	-	-
Chloromethane	ug/l	2 UJ	-	-	-	-	-	-
cis-1,3-Dichloropropene	ug/l	0.5 U	-	-	-	-	-	-
Dibromochloromethane	ug/l	1 U	-	-	-	-	-	-
Ethylbenzene	ug/l	1 U	-	-	-	-	-	-
Methylene chloride	ug/l	2 U	-	-	-	-	-	-
Styrene	ug/l	5 U	-	-	-	-	-	-
Tetrachloroethene	ug/l	1 U	-	-	-	-	-	-
Toluene	ug/l	1 U	-	-	-	-	-	-
trans-1,3-Dichloropropene	ug/l	0.5 U	-	-	-	-	-	-
Trichloroethene	ug/l	1 U	-	-	-	-	-	-
Vinyl Chloride	ug/l	1 U	-	-	-	-	-	-
Xylenes, Total	ug/l	1 U	-	-	-	-	-	-
Total VOC	ug/l	0	-	-	-	-	-	-
Metals								
Aluminum	ug/l	101 J	-	-	-	-	-	-
Antimony	ug/l	0.59 J	-	-	-	-	-	-
Arsenic	ug/l	2 U	-	-	-	-	-	-
Barium	ug/l	25.7 J	-	-	-	-	-	-
Beryllium	ug/l	4 U	-	-	-	-	-	-
Cadmium	ug/l	4 U	-	-	-	-	-	-
Calcium	ug/l	10600	-	-	-	-	-	-
Chromium	ug/l	10 U	-	-	-	-	-	-

Table B-5
Summary of Surface Water Samples - Sites 1 and 3
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Sites 1 & 3

Station ID:	SW-16
Field Sample ID*:	SW16
Lab Sample ID:	M59273-7
Sample Date:	9/14/2006
Lab Name:	Accutest
Field QC:	Original data
Sampling Method:	Grab

	Units							
Metals								
Cobalt	ug/l	50 U	-	-	-	-	-	-
Copper	ug/l	25 U	-	-	-	-	-	-
Iron	ug/l	1020	-	-	-	-	-	-
Lead	ug/l	0.37 J	-	-	-	-	-	-
Magnesium	ug/l	2140 J	-	-	-	-	-	-
Manganese	ug/l	261	-	-	-	-	-	-
Mercury	ug/l	0.2 U	-	-	-	-	-	-
Nickel	ug/l	40 U	-	-	-	-	-	-
Potassium	ug/l	1990 J	-	-	-	-	-	-
Selenium	ug/l	10 U	-	-	-	-	-	-
Silver	ug/l	5 U	-	-	-	-	-	-
Sodium	ug/l	20400	-	-	-	-	-	-
Thallium	ug/l	0.18 J	-	-	-	-	-	-
Vanadium	ug/l	50 U	-	-	-	-	-	-
Zinc	ug/l	5.8 J	-	-	-	-	-	-

Table B-5

Notes:

MEG - obtained from State of Maine Department of Human Services Maximum Exposure Guidelines, Memorandum dated 23 October 1992.
MCL - obtained from 40 CFR Parts 141 and 142 (U.S. EPA 1998).
Screening Value - Risk Based Ecological Screening Values for Surface Water, Seep Water, and Sediment at the Naval Air Station Brunswick, EA Science and Technology, January, 2006
* Field Sample IDs begin with **BN-1&3-29-** for samples collected from Sites 1 and 3 or **BN-EP-29-** for samples collected from the Eastern Plume area.
VOCs analyzed by EPA Method 8260B.
Target Analyte List Metals analyzed by EPA 6000/7000 series methods.
Pesticides analyzed by EPA Method 8081A.

Acronyms:

-	Not sampled
EPA	U.S. Environmental Protection Agency
GWETS	Groundwater Extraction and Treatment System
ID	Identification
MCL	Maximum Contaminant Level
MEG	Maximum Exposure Guideline
mg/kg	milligrams per kilogram
mg/L	milligrams per liter
MNA	Monitored Natural Attenuation
NA	Criteria not applicable
VOC	Volatile Organic Compound
ug/L	micrograms per liter

Validation Qualifiers:

U	Not detected at or above the sample quantitation limit
J	Estimated concentration
UJ	Not detected. Sample quantitation limit is estimated.
R	Value rejected by data validator

Total VOC calculation does not include common laboratory contaminants (acetone, methylene chloride, 2-butanone), VOCs detected in the blank samples, or 1,4-dioxane.
Highlighted concentrations indicate exceedance of an MEG, MCL or screening level. The color of the highlight indicated which screening level was exceeded.
Refer to the Data Quality Review section for reporting limits and method detection limits for all analyzed compounds.

VOC Contaminants of Concern:
1,1-Dichloroethane
1,2-Dichloroethene, total
Chlorobenzene
Ethylbenzene
Methylene Chloride
Toluene
Vinyl Chloride
Xylenes, total

Metals Contaminants of Concern:
Aluminum
Arsenic
Barium
Chromium
Lead
Manganese
Nickel
Potassium

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Table B-6
Summary of Groundwater Results - Groundwater Extraction and Treatment System
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: GWETS

			Station ID:	Combined Effluent	Combined Effluent	Combined Effluent	Combined Effluent	Plume Raw Influent
			Field Sample ID*:	COMB EFFLUENT	EFFLUENT-XD1	COMB EFFLUENT	EFFLUENT-XD1	RAW INFLUENT
			Lab Sample ID:	M59141-20	M59141-21	M59141-20A	M59141-21A	M59141-19
			Sample Date:	9/7/2006	9/7/2006	9/7/2006	9/7/2006	9/7/2006
			Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest
			Field QC:	Original data	Field duplicates	Original data	Field duplicates	Original data
			Sampling Method:	Grab	Grab	Grab	Grab	Grab
	Units	**Federal MCL**	**Maine MEG**					
VOCs								
1,1,1-Trichloroethane	ug/l	200	200	1 UJ	1 U	-	-	45.1
1,1,2,2-Tetrachloroethane	ug/l	NA	1.8	1 UJ	1 U	-	-	1 U
1,1,2-Trichloroethane	ug/l	5	6	1 UJ	1 U	-	-	1 U
1,1-Dichloroethane	ug/l	NA	70	1 UJ	1 U	-	-	5
1,1-Dichloroethene	ug/l	7	1	1 UJ	1 U	-	-	**8**
1,2-Dichlorobenzene	ug/l	NA	NA	1 UJ	1 U	-	-	1 U
1,2-Dichloroethane	ug/l	5	4	1 UJ	1 U	-	-	1 U
1,2-Dichloroethene, total	ug/l	70	70	1 UJ	1 U	-	-	9.5
1,2-Dichloropropane	ug/l	5	5	2 UJ	2 U	-	-	2 U
1,3-Dichlorobenzene	ug/l	NA	NA	1 UJ	1 U	-	-	1 U
1,4-Dichlorobenzene	ug/l	NA	NA	1 UJ	1 U	-	-	1 U
1,4-Dioxane	ug/l	NA	NA	-	-	6.6	5.8	-
2-Butanone	ug/l	NA	NA	5 UJ	5 U	-	-	5 U
2-Hexanone	ug/l	NA	NA	5 UJ	5 U	-	-	5 U
4-Methyl-2-pentanone	ug/l	NA	NA	5 UJ	5 U	-	-	5 U
Acetone	ug/l	NA	6300	5 UJ	5 U	-	-	5 U
Benzene	ug/l	5	6	0.5 UJ	0.5 U	-	-	0.5 U
Bromodichloromethane	ug/l	NA	6	1 UJ	1 U	-	-	1 U
Bromoform	ug/l	NA	44	1 UJ	1 U	-	-	1 U
Bromomethane	ug/l	NA	10	2 UJ	2 U	-	-	2 U
Carbon disulfide	ug/l	NA	600	5 UJ	5 U	-	-	5 U
Carbon tetrachloride	ug/l	5	3	1 UJ	1 U	-	-	1 U
Chlorobenzene	ug/l	100	47	1 UJ	1 U	-	-	1 U

Table B-6
Summary of Groundwater Results - Groundwater Extraction and Treatment System
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: GWETS

			Station ID:	Combined Effluent	Combined Effluent	Combined Effluent	Combined Effluent	Plume Raw Influent
			Field Sample ID*:	COMB EFFLUENT	EFFLUENT-XD1	COMB EFFLUENT	EFFLUENT-XD1	RAW INFLUENT
			Lab Sample ID:	M59141-20	M59141-21	M59141-20A	M59141-21A	M59141-19
			Sample Date:	9/7/2006	9/7/2006	9/7/2006	9/7/2006	9/7/2006
			Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest
			Field QC:	Original data	Field duplicates	Original data	Field duplicates	Original data
			Sampling Method:	Grab	Grab	Grab	Grab	Grab
	Units	**Federal MCL**	**Maine MEG**					
VOCs								
Chloroethane	ug/l	NA	NA	2 UJ	2 U	-	-	2 U
Chloroform	ug/l	80	70	1 UJ	1 U	-	-	1 U
Chloromethane	ug/l	NA	3	2 UJ	2 U	-	-	2 U
cis-1,3-Dichloropropene	ug/l	NA	4	0.5 UJ	0.5 U	-	-	0.5 U
Dibromochloromethane	ug/l	NA	4	1 UJ	1 U	-	-	1 U
Ethylbenzene	ug/l	700	70	0.72 U	1 U	-	-	1 U
Methylene chloride	ug/l	5	47	2 UJ	2 U	-	-	2 U
Styrene	ug/l	100	140	5 UJ	5 U	-	-	5 U
Tetrachloroethene	ug/l	5	7	1 UJ	1 U	-	-	3.7
Toluene	ug/l	1000	1400	0.67 U	1 U	-	-	1 U
trans-1,3-Dichloropropene	ug/l	NA	4	0.5 UJ	0.5 U	-	-	0.5 U
Trichloroethene	ug/l	5	32	1 UJ	1 U	-	-	26.9
Vinyl Chloride	ug/l	2	0.2	1 UJ	1 U	-	-	1 U
Xylenes, Total	ug/l	10000	1400	3.3 U	1 U	-	-	1 U
Total VOC	ug/l	NA	NA	0	0	-	-	98.2

Table B-6
Summary of Groundwater Results - Groundwater Extraction and Treatment System
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: GWETS

Station ID:		EW-01	EW-02A	EW-05A				
Field Sample ID*:		EW1	EW2A	EW-5A				
Lab Sample ID:		M59141-37	M59141-38	M59391-11				
Sample Date:		9/12/2006	9/12/2006	9/20/2006				
Lab Name:		Accutest	Accutest	Accutest				
Field QC:		Original data	Original data	Original data				
Sampling Method:		Low-Flow	Low-Flow	Low-Flow				
	Units							
VOCs								
1,1,1-Trichloroethane	ug/l	5.9	54	7.1	-	-	-	-
1,1,2,2-Tetrachloroethane	ug/l	1 U	1 U	1 U	-	-	-	-
1,1,2-Trichloroethane	ug/l	1 U	1 U	1 U	-	-	-	-
1,1-Dichloroethane	ug/l	1 U	7	2.9	-	-	-	-
1,1-Dichloroethene	ug/l	1 U	**11.6**	2.7	-	-	-	-
1,2-Dichlorobenzene	ug/l	1 U	1 U	1 U	-	-	-	-
1,2-Dichloroethane	ug/l	1 U	1 U	1 U	-	-	-	-
1,2-Dichloroethene, total	ug/l	8.5	11.5	1.9	-	-	-	-
1,2-Dichloropropane	ug/l	2 U	2 U	2 U	-	-	-	-
1,3-Dichlorobenzene	ug/l	1 U	1 U	1 U	-	-	-	-
1,4-Dichlorobenzene	ug/l	1 U	1 U	1 U	-	-	-	-
1,4-Dioxane	ug/l	-	-	25 U	-	-	-	-
2-Butanone	ug/l	5 U	5 U	5 U	-	-	-	-
2-Hexanone	ug/l	5 U	5 U	5 U	-	-	-	-
4-Methyl-2-pentanone	ug/l	5 U	5 U	5 U	-	-	-	-
Acetone	ug/l	5 U	5 U	5 U	-	-	-	-
Benzene	ug/l	0.5 U	0.5 U	0.5 U	-	-	-	-
Bromodichloromethane	ug/l	1 U	1 U	1 U	-	-	-	-
Bromoform	ug/l	1 U	1 U	1 U	-	-	-	-
Bromomethane	ug/l	2 U	2 U	2 U	-	-	-	-
Carbon disulfide	ug/l	5 U	5 U	5 U	-	-	-	-
Carbon tetrachloride	ug/l	1 U	1 U	1 U	-	-	-	-
Chlorobenzene	ug/l	1 U	1 U	1 U	-	-	-	-

Table B-6
Summary of Groundwater Results - Groundwater Extraction and Treatment System
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: GWETS

Station ID:		EW-01	EW-02A	EW-05A				
Field Sample ID*:		EW1	EW2A	EW-5A				
Lab Sample ID:		M59141-37	M59141-38	M59391-11				
Sample Date:		9/12/2006	9/12/2006	9/20/2006				
Lab Name:		Accutest	Accutest	Accutest				
Field QC:		Original data	Original data	Original data				
Sampling Method:		Low-Flow	Low-Flow	Low-Flow				
	Units							
VOCs								
Chloroethane	ug/l	2 U	2 U	2 U	-	-	-	-
Chloroform	ug/l	1 U	1 U	1.2	-	-	-	-
Chloromethane	ug/l	2 U	2 U	2 U	-	-	-	-
cis-1,3-Dichloropropene	ug/l	0.5 U	0.5 U	0.5 U	-	-	-	-
Dibromochloromethane	ug/l	1 U	1 U	1 U	-	-	-	-
Ethylbenzene	ug/l	1 U	1 U	1 U	-	-	-	-
Methylene chloride	ug/l	2 U	2 U	2 U	-	-	-	-
Styrene	ug/l	5 U	5 U	5 U	-	-	-	-
Tetrachloroethene	ug/l	2.2	**8.4**	1 U	-	-	-	-
Toluene	ug/l	1 U	1 U	1 U	-	-	-	-
trans-1,3-Dichloropropene	ug/l	0.5 U	0.5 U	0.5 U	-	-	-	-
Trichloroethene	ug/l	15.6	**35.6**	8.6	-	-	-	-
Vinyl Chloride	ug/l	1 U	1 U	1 U	-	-	-	-
Xylenes, Total	ug/l	1 U	1 U	1 U	-	-	-	-
Total VOC	ug/l	32.2	128.1	24.4	-	-	-	-

Table B-6

Notes:

MEG - obtained from State of Maine Department of Human Services Maximum Exposure Guidelines, Memorandum dated 23 October 1992.
MCL - obtained from 40 CFR Parts 141 and 142 (U.S. EPA 1998).
Screening Value - Risk Based Ecological Screening Values for Surface Water, Seep Water, and Sediment at the Naval Air Station Brunswick, EA Science and Technology, January, 2006
* Field Sample IDs begin with **BN-1&3-29-** for samples collected from Sites 1 and 3 or **BN-EP-29-** for samples collected from the Eastern Plume area.
VOCs analyzed by EPA Method 8260B.
Target Analyte List Metals analyzed by EPA 6000/7000 series methods.
Pesticides analyzed by EPA Method 8081A.

Acronyms:

-	Not sampled
EPA	U.S. Environmental Protection Agency
GWETS	Groundwater Extraction and Treatment System
ID	Identification
MCL	Maximum Contaminant Level
MEG	Maximum Exposure Guideline
mg/kg	milligrams per kilogram
mg/L	milligrams per liter
MNA	Monitored Natural Attenuation
NA	Criteria not applicable
VOC	Volatile Organic Compound
ug/L	micrograms per liter

Validation Qualifiers:

U	Not detected at or above the sample quantitation limit
J	Estimated concentration
UJ	Not detected. Sample quantitation limit is estimated.
R	Value rejected by data validator

Total VOC calculation does not include common laboratory contaminants (acetone, methylene chloride, 2-butanone), VOCs detected in the blank samples, or 1,4-dioxane.
Highlighted concentrations indicate exceedance of an MEG, MCL or screening level. The color of the highlight indicated which screening level was exceeded.
Refer to the Data Quality Review section for reporting limits and method detection limits for all analyzed compounds.

VOC Contaminants of Concern:
1,1-Dichloroethane
1,2-Dichloroethene, total
Chlorobenzene
Ethylbenzene
Methylene Chloride
Toluene
Vinyl Chloride
Xylenes, total

Metals Contaminants of Concern:
Aluminum
Arsenic
Barium
Chromium
Lead
Manganese
Nickel
Potassium

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Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

			Station ID:	MW-205	MW-212	MW-212	MW-224	MW-224
			Field Sample ID*:	MW205-D	MW212-S	MW212	MW224-M	MW224
			Lab Sample ID:	M59391-6	M59303-2	M59303-1	M59391-7	M59391-8
			Sample Date:	9/20/2006	9/18/2006	9/18/2006	9/20/2006	9/20/2006
			Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest
			Field QC:	Original data	Original data	Original data	Original data	Original data
			Sampling Method:	Deep Diffusion	Shallow Diffusion	Low-Flow	Mid Diffusion	Low-Flow
	Units	**Federal MCL**	**Maine MEG**					
VOCs								
1,1,1-Trichloroethane	ug/l	200	200	9.2	1 U	-	1 U	1 U
1,1,2,2-Tetrachloroethane	ug/l	NA	1.8	1 U	1 U	-	1 U	1 U
1,1,2-Trichloroethane	ug/l	5	6	1 U	1 U	-	1 U	1 U
1,1-Dichloroethane	ug/l	NA	70	1 U	1 U	-	1 U	1 U
1,1-Dichloroethene	ug/l	7	1	1 U	1 U	-	1 U	1 U
1,2-Dichlorobenzene	ug/l	NA	NA	1 U	1 U	-	1 U	1 U
1,2-Dichloroethane	ug/l	5	4	1 U	1 U	-	1 U	1 U
1,2-Dichloroethene, total	ug/l	70	70	6.9	1 U	-	1 U	2.6 J
1,2-Dichloropropane	ug/l	5	5	2 U	2 U	-	2 U	2 U
1,3-Dichlorobenzene	ug/l	NA	NA	1 U	1 U	-	1 U	1 U
1,4-Dichlorobenzene	ug/l	NA	NA	1 U	1 U	-	1 U	1 U
1,4-Dioxane	ug/l	NA	NA	25 U	25 U	1 U	25 U	25 U
2-Butanone	ug/l	NA	NA	5 U	5 U	-	5 U	5 U
2-Hexanone	ug/l	NA	NA	5 U	5 U	-	5 U	5 U
4-Methyl-2-pentanone	ug/l	NA	NA	5 U	5 U	-	5 U	5 U
Acetone	ug/l	NA	6300	5 U	5 U	-	5 U	5 U
Benzene	ug/l	5	6	1.5	0.5 U	-	0.5 U	0.5 U
Bromodichloromethane	ug/l	NA	6	1 U	1 U	-	1 U	1 U
Bromoform	ug/l	NA	44	1 U	1 UJ	-	1 U	1 U
Bromomethane	ug/l	NA	10	2 U	2 U	-	2 U	2 U
Carbon disulfide	ug/l	NA	600	5 U	5 U	-	5 U	5 U
Carbon tetrachloride	ug/l	5	3	1 U	1 U	-	1 U	1 U
Chlorobenzene	ug/l	100	47	1 U	1 U	-	1 U	1 U

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

			Station ID:	MW-205	MW-212	MW-212	MW-224	MW-224
			Field Sample ID*:	MW205-D	MW212-S	MW212	MW224-M	MW224
			Lab Sample ID:	M59391-6	M59303-2	M59303-1	M59391-7	M59391-8
			Sample Date:	9/20/2006	9/18/2006	9/18/2006	9/20/2006	9/20/2006
			Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest
			Field QC:	Original data	Original data	Original data	Original data	Original data
			Sampling Method:	Deep Diffusion	Shallow Diffusion	Low-Flow	Mid Diffusion	Low-Flow
	Units	**Federal MCL**	**Maine MEG**					
VOCs								
Chloroethane	ug/l	NA	NA	2 U	2 U	-	2 U	2 U
Chloroform	ug/l	80	70	1 U	1 U	-	1 U	1 U
Chloromethane	ug/l	NA	3	2 U	2 U	-	2 U	2 U
cis-1,3-Dichloropropene	ug/l	NA	4	0.5 U	0.5 U	-	0.5 U	0.5 U
Dibromochloromethane	ug/l	NA	4	1 U	1 U	-	1 U	1 U
Ethylbenzene	ug/l	700	70	1 U	1 U	-	1 U	1 U
Methylene chloride	ug/l	5	47	2 U	2 U	-	2 U	2 U
Styrene	ug/l	100	140	5 U	5 U	-	5 U	5 U
Tetrachloroethene	ug/l	5	7	2.2	1 U	-	1 U	1 U
Toluene	ug/l	1000	1400	1 U	1 U	-	1 U	1 U
trans-1,3-Dichloropropene	ug/l	NA	4	0.5 U	0.5 U	-	0.5 U	0.5 U
Trichloroethene	ug/l	5	32	15.7	7.3	-	1 U	1 U
Vinyl Chloride	ug/l	2	0.2	1 U	1 U	-	1 U	1 U
Xylenes, Total	ug/l	10000	1400	1 U	1 U	-	1 U	1 U
Total VOC	ug/l	NA	NA	35.5	7.3	-	2.6	2.6

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

Station ID:		MW-224	MW-224	MW-229A	MW-229B	MW-230A	MW-306	MW-311
Field Sample ID*:		MW-XD1	MW224	MW229A	MW229B	MW230A-D	MW306	MW311-M
Lab Sample ID:		M59391-9	M59391-8A	M59141-35	M59141-36	M59391-5	M59141-40	M59303-7
Sample Date:		9/20/2006	9/20/2006	9/12/2006	9/12/2006	9/20/2006	9/13/2006	9/18/2006
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
Field QC:		Field duplicates	Original data	Original data	Original data	Original data	Original data	Original data
Sampling Method:		Low-Flow	Low-Flow	Low-Flow	Low-Flow	Deep Diffusion	Low-Flow	Mid Diffusion
	Units							
VOCs								
1,1,1-Trichloroethane	ug/l	1 U	-	-	-	1 U	-	4.2
1,1,2,2-Tetrachloroethane	ug/l	1 U	-	-	-	1 U	-	1 U
1,1,2-Trichloroethane	ug/l	1 U	-	-	-	1 U	-	1 U
1,1-Dichloroethane	ug/l	1 U	-	-	-	1 U	-	1 U
1,1-Dichloroethene	ug/l	1 U	-	-	-	1 U	-	1 U
1,2-Dichlorobenzene	ug/l	1 U	-	-	-	1 U	-	1 U
1,2-Dichloroethane	ug/l	1 U	-	-	-	1 U	-	1 U
1,2-Dichloroethene, total	ug/l	2.6 J	-	-	-	1 U	-	1 U
1,2-Dichloropropane	ug/l	2 U	-	-	-	2 U	-	2 U
1,3-Dichlorobenzene	ug/l	1 U	-	-	-	1 U	-	1 U
1,4-Dichlorobenzene	ug/l	1 U	-	-	-	1 U	-	1 U
1,4-Dioxane	ug/l	25 U	1 U	2	1 U	25 U	1 U	25 U
2-Butanone	ug/l	5 U	-	-	-	5 U	-	5 U
2-Hexanone	ug/l	5 U	-	-	-	5 U	-	5 U
4-Methyl-2-pentanone	ug/l	5 U	-	-	-	5 U	-	5 U
Acetone	ug/l	5 U	-	-	-	5 U	-	5 U
Benzene	ug/l	0.5 U	-	-	-	0.5 U	-	0.5 U
Bromodichloromethane	ug/l	1 U	-	-	-	1 U	-	1 U
Bromoform	ug/l	1 U	-	-	-	1 U	-	1 UJ
Bromomethane	ug/l	2 U	-	-	-	2 U	-	2 U
Carbon disulfide	ug/l	5 U	-	-	-	5 U	-	5 U
Carbon tetrachloride	ug/l	1 U	-	-	-	1 U	-	1 U
Chlorobenzene	ug/l	1 U	-	-	-	1 U	-	1 U

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

Station ID:		MW-224	MW-224	MW-229A	MW-229B	MW-230A	MW-306	MW-311
Field Sample ID*:		MW-XD1	MW224	MW229A	MW229B	MW230A-D	MW306	MW311-M
Lab Sample ID:		M59391-9	M59391-8A	M59141-35	M59141-36	M59391-5	M59141-40	M59303-7
Sample Date:		9/20/2006	9/20/2006	9/12/2006	9/12/2006	9/20/2006	9/13/2006	9/18/2006
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
Field QC:		Field duplicates	Original data	Original data	Original data	Original data	Original data	Original data
Sampling Method:		Low-Flow	Low-Flow	Low-Flow	Low-Flow	Deep Diffusion	Low-Flow	Mid Diffusion
	Units							
VOCs								
Chloroethane	ug/l	2 U	-	-	-	2 U	-	2 U
Chloroform	ug/l	1 U	-	-	-	1 U	-	1 U
Chloromethane	ug/l	2 U	-	-	-	2 U	-	2 U
cis-1,3-Dichloropropene	ug/l	0.5 U	-	-	-	0.5 U	-	0.5 U
Dibromochloromethane	ug/l	1 U	-	-	-	1 U	-	1 U
Ethylbenzene	ug/l	1 U	-	-	-	1 U	-	1 U
Methylene chloride	ug/l	2 U	-	-	-	2 U	-	2 U
Styrene	ug/l	5 U	-	-	-	5 U	-	5 U
Tetrachloroethene	ug/l	1 U	-	-	-	1 U	-	**14.9**
Toluene	ug/l	1 U	-	-	-	1 U	-	1 U
trans-1,3-Dichloropropene	ug/l	0.5 U	-	-	-	0.5 U	-	0.5 U
Trichloroethene	ug/l	1 U	-	-	-	1 U	-	3.6
Vinyl Chloride	ug/l	1 U	-	-	-	1 U	-	1 U
Xylenes, Total	ug/l	1 U	-	-	-	1 U	-	1 U
Total VOC	ug/l	2.6	-	-	-	0	-	24.9

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

Station ID:		MW-311	MW-311	MW-313	MW-313	MW-313	MW-315A	MW-319
Field Sample ID*:		MW311-D	MW-XD2	MW313-D	MW313	MW-XD3	MW315A-D	MW319D
Lab Sample ID:		M59303-8	M59303-9	M59141-26	M59141-30	M59141-31	M59391-4	M59303-4
Sample Date:		9/18/2006	9/18/2006	9/12/2006	9/12/2006	9/12/2006	9/20/2006	9/18/2006
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
Field QC:		Original data	Field duplicates	Original data	Original data	Field duplicates	Original data	Original data
Sampling Method:		Deep Diffusion	Mid Diffusion	Deep Diffusion	Low-Flow	Low-Flow	Deep Diffusion	Deep Diffusion
	Units							
VOCs								
1,1,1-Trichloroethane	ug/l	4.5	4.6	1 U	-	-	1 U	1 U
1,1,2,2-Tetrachloroethane	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
1,1,2-Trichloroethane	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
1,1-Dichloroethane	ug/l	1 U	1 U	6	-	-	1 U	1 U
1,1-Dichloroethene	ug/l	1 U	1 U	5.4	-	-	1 U	1 U
1,2-Dichlorobenzene	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
1,2-Dichloroethane	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
1,2-Dichloroethene, total	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
1,2-Dichloropropane	ug/l	2 U	2 U	2 U	-	-	2 U	2 U
1,3-Dichlorobenzene	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
1,4-Dichlorobenzene	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
1,4-Dioxane	ug/l	25 U	25 U	-	69 J	70.6	25 U	25 U
2-Butanone	ug/l	5 U	5 U	5 U	-	-	5 U	5 U
2-Hexanone	ug/l	5 U	5 U	5 U	-	-	5 U	5 U
4-Methyl-2-pentanone	ug/l	5 U	5 U	5 U	-	-	5 U	5 U
Acetone	ug/l	5 U	5 U	5 U	-	-	5 U	5 U
Benzene	ug/l	0.5 U	0.5 U	0.5 U	-	-	0.5 U	0.5 U
Bromodichloromethane	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
Bromoform	ug/l	1 UJ	1 UJ	1 U	-	-	1 U	1 UJ
Bromomethane	ug/l	2 U	2 U	2 U	-	-	2 U	2 U
Carbon disulfide	ug/l	5 U	5 U	5 U	-	-	5 U	5 U
Carbon tetrachloride	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
Chlorobenzene	ug/l	1 U	1 U	1 U	-	-	1 U	1 U

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

Station ID:		MW-311	MW-311	MW-313	MW-313	MW-313	MW-315A	MW-319
Field Sample ID*:		MW311-D	MW-XD2	MW313-D	MW313	MW-XD3	MW315A-D	MW319D
Lab Sample ID:		M59303-8	M59303-9	M59141-26	M59141-30	M59141-31	M59391-4	M59303-4
Sample Date:		9/18/2006	9/18/2006	9/12/2006	9/12/2006	9/12/2006	9/20/2006	9/18/2006
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
Field QC:		Original data	Field duplicates	Original data	Original data	Field duplicates	Original data	Original data
Sampling Method:		Deep Diffusion	Mid Diffusion	Deep Diffusion	Low-Flow	Low-Flow	Deep Diffusion	Deep Diffusion
	Units							
VOCs								
Chloroethane	ug/l	2 U	2 U	2 U	-	-	2 U	2 U
Chloroform	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
Chloromethane	ug/l	2 U	2 U	2 U	-	-	2 U	2 U
cis-1,3-Dichloropropene	ug/l	0.5 U	0.5 U	0.5 U	-	-	0.5 U	0.5 U
Dibromochloromethane	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
Ethylbenzene	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
Methylene chloride	ug/l	2 U	2 U	2 U	-	-	2 U	2 U
Styrene	ug/l	5 U	5 U	5 U	-	-	5 U	5 U
Tetrachloroethene	ug/l	**17**	**15.3**	1 U	-	-	1 U	**25.7**
Toluene	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
trans-1,3-Dichloropropene	ug/l	0.5 U	0.5 U	0.5 U	-	-	0.5 U	0.5 U
Trichloroethene	ug/l	3.4	3.8	1 U	-	-	1 U	1 U
Vinyl Chloride	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
Xylenes, Total	ug/l	1 U	1 U	1 U	-	-	1 U	1 U
Total VOC	ug/l	22.7	23.7	11.4	-	-	0	25.7

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

Station ID:		MW-319	MW-319	MW-330	MW-331	MW-331	MW-332	MW-333
Field Sample ID*:		MW319-M	MW-XD4	MW330	MW331-M	MW331	MW332	MW333-M
Lab Sample ID:		M59303-5	M59303-6	M59141-25	M59141-23	M59141-22	M59303-3	M59141-27
Sample Date:		9/18/2006	9/18/2006	9/12/2006	9/12/2006	9/12/2006	9/18/2006	9/12/2006
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
Field QC:		Original data	Field duplicates	Original data	Original data	Original data	Original data	Original data
Sampling Method:		Mid Diffusion	Mid Diffusion	Low-Flow	Mid Diffusion	Low-Flow	Low-Flow	Mid Diffusion
	Units							
VOCs								
1,1,1-Trichloroethane	ug/l	1 U	1 U	-	183	-	-	1 U
1,1,2,2-Tetrachloroethane	ug/l	1 U	1 U	-	1 U	-	-	1 U
1,1,2-Trichloroethane	ug/l	1 U	1 U	-	1 U	-	-	1 U
1,1-Dichloroethane	ug/l	1 U	1 U	-	19.6	-	-	7.2
1,1-Dichloroethene	ug/l	1 U	1 U	-	**22.5**	-	-	**8.6**
1,2-Dichlorobenzene	ug/l	1 U	1 U	-	1 U	-	-	1 U
1,2-Dichloroethane	ug/l	1 U	1 U	-	1 U	-	-	1 U
1,2-Dichloroethene, total	ug/l	1 U	1 U	-	**94.7**	-	-	1 U
1,2-Dichloropropane	ug/l	2 U	2 U	-	2 U	-	-	2 U
1,3-Dichlorobenzene	ug/l	1 U	1 U	-	1 U	-	-	1 U
1,4-Dichlorobenzene	ug/l	1 U	1 U	-	1 U	-	-	1 U
1,4-Dioxane	ug/l	25 U	25 U	1 U	-	45.5 J	1 U	-
2-Butanone	ug/l	5 U	5 U	-	5 U	-	-	5 U
2-Hexanone	ug/l	5 U	5 U	-	5 U	-	-	5 U
4-Methyl-2-pentanone	ug/l	5 U	5 U	-	5 U	-	-	5 U
Acetone	ug/l	5 U	5 U	-	5 U	-	-	5 U
Benzene	ug/l	0.5 U	0.5 U	-	0.5 U	-	-	0.5 U
Bromodichloromethane	ug/l	1 U	1 U	-	1 U	-	-	1 U
Bromoform	ug/l	1 UJ	1 UJ	-	1 U	-	-	1 U
Bromomethane	ug/l	2 U	2 U	-	2 U	-	-	2 U
Carbon disulfide	ug/l	5 U	5 U	-	5 U	-	-	5 U
Carbon tetrachloride	ug/l	1 U	1 U	-	1 U	-	-	1 U
Chlorobenzene	ug/l	1 U	1 U	-	1 U	-	-	1 U

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

Station ID:		MW-319	MW-319	MW-330	MW-331	MW-331	MW-332	MW-333
Field Sample ID*:		MW319-M	MW-XD4	MW330	MW331-M	MW331	MW332	MW333-M
Lab Sample ID:		M59303-5	M59303-6	M59141-25	M59141-23	M59141-22	M59303-3	M59141-27
Sample Date:		9/18/2006	9/18/2006	9/12/2006	9/12/2006	9/12/2006	9/18/2006	9/12/2006
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
Field QC:		Original data	Field duplicates	Original data	Original data	Original data	Original data	Original data
Sampling Method:		Mid Diffusion	Mid Diffusion	Low-Flow	Mid Diffusion	Low-Flow	Low-Flow	Mid Diffusion
	Units							
VOCs								
Chloroethane	ug/l	2 U	2 U	-	2 U	-	-	2 U
Chloroform	ug/l	1 U	1 U	-	1 U	-	-	1 U
Chloromethane	ug/l	2 U	2 U	-	2 U	-	-	2 U
cis-1,3-Dichloropropene	ug/l	0.5 U	0.5 U	-	0.5 U	-	-	0.5 U
Dibromochloromethane	ug/l	1 U	1 U	-	1 U	-	-	1 U
Ethylbenzene	ug/l	1 U	1 U	-	1 U	-	-	1 U
Methylene chloride	ug/l	2 U	2 U	-	2 U	-	-	2 U
Styrene	ug/l	5 U	5 U	-	5 U	-	-	5 U
Tetrachloroethene	ug/l	1 U	1 U	-	2.7	-	-	1 U
Toluene	ug/l	1 U	1 U	-	1 U	-	-	1 U
trans-1,3-Dichloropropene	ug/l	0.5 U	0.5 U	-	0.5 U	-	-	0.5 U
Trichloroethene	ug/l	1 U	1 U	-	**100**	-	-	1 U
Vinyl Chloride	ug/l	1 U	1 U	-	1 U	-	-	1 U
Xylenes, Total	ug/l	1 U	1 U	-	1 U	-	-	1 U
Total VOC	ug/l	0	0	-	422.5	-	-	15.8

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

Station ID:		MW-333	MW-335	MW-335	MW-336	MW-336	MW-336	MW-337
Field Sample ID*:		MW333	MW335-M	MW335	MW336-S	MW336	MW-XD1	MW337-M
Lab Sample ID:		M59141-32	M59141-28	M59141-33	M59391-2	M59391-3	M59391-9	M59141-29
Sample Date:		9/12/2006	9/12/2006	9/12/2006	9/20/2006	9/20/2006	9/20/2006	9/12/2006
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
Field QC:		Original data	Original data	Original data	Original data	Original data	Field duplicates	Original data
Sampling Method:		Low-Flow	Mid Diffusion	Low-Flow	Shallow Diffusion	Low-Flow	Shallow Diffusion	Mid Diffusion
	Units							
VOCs								
1,1,1-Trichloroethane	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
1,1,2,2-Tetrachloroethane	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
1,1,2-Trichloroethane	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
1,1-Dichloroethane	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
1,1-Dichloroethene	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
1,2-Dichlorobenzene	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
1,2-Dichloroethane	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
1,2-Dichloroethene, total	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
1,2-Dichloropropane	ug/l	-	2 U	2 U	2 U	2 U	-	2 U
1,3-Dichlorobenzene	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
1,4-Dichlorobenzene	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
1,4-Dioxane	ug/l	56.8	-	-	25 U	25 U	-	-
2-Butanone	ug/l	-	5 U	5 U	5 U	5 U	-	5 U
2-Hexanone	ug/l	-	5 U	5 U	5 U	5 U	-	5 U
4-Methyl-2-pentanone	ug/l	-	5 U	5 U	5 U	5 U	-	5 U
Acetone	ug/l	-	5 U	5 U	5 U	5 U	-	5 U
Benzene	ug/l	-	0.5 U	0.5 U	0.5 U	0.5 U	-	0.5 U
Bromodichloromethane	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
Bromoform	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
Bromomethane	ug/l	-	2 U	2 U	2 U	2 U	-	2 U
Carbon disulfide	ug/l	-	5 U	5 U	5 U	5 U	-	5 U
Carbon tetrachloride	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
Chlorobenzene	ug/l	-	1 U	1 U	1 U	1 U	-	1 U

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

Station ID:		MW-333	MW-335	MW-335	MW-336	MW-336	MW-336	MW-337
Field Sample ID*:		MW333	MW335-M	MW335	MW336-S	MW336	MW-XD1	MW337-M
Lab Sample ID:		M59141-32	M59141-28	M59141-33	M59391-2	M59391-3	M59391-9	M59141-29
Sample Date:		9/12/2006	9/12/2006	9/12/2006	9/20/2006	9/20/2006	9/20/2006	9/12/2006
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
Field QC:		Original data	Original data	Original data	Original data	Original data	Field duplicates	Original data
Sampling Method:		Low-Flow	Mid Diffusion	Low-Flow	Shallow Diffusion	Low-Flow	Shallow Diffusion	Mid Diffusion
	Units							
VOCs								
Chloroethane	ug/l	-	2 U	2 U	2 U	2 U	-	2 U
Chloroform	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
Chloromethane	ug/l	-	2 U	2 U	2 U	2 U	-	2 U
cis-1,3-Dichloropropene	ug/l	-	0.5 U	0.5 U	0.5 U	0.5 U	-	0.5 U
Dibromochloromethane	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
Ethylbenzene	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
Methylene chloride	ug/l	-	2 U	2 U	2 U	2 U	-	2 U
Styrene	ug/l	-	5 U	5 U	5 U	5 U	-	5 U
Tetrachloroethene	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
Toluene	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
trans-1,3-Dichloropropene	ug/l	-	0.5 U	0.5 U	0.5 U	0.5 U	-	0.5 U
Trichloroethene	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
Vinyl Chloride	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
Xylenes, Total	ug/l	-	1 U	1 U	1 U	1 U	-	1 U
Total VOC	ug/l	-	0	0	0	0	-	0

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

Station ID:		MW-337	MW-338A	MW-338A	MW-338A	MW-338B	MW-338B	MW-338C
Field Sample ID*:		MW337	MW338A	MW338A-S	MW338A	MW338B	MW338B-M	MW338C-M
Lab Sample ID:		M59141-34	M59141-13	M59141-14	M59141-13A	M59141-11	M59141-12	M59141-17
Sample Date:		9/12/2006	9/11/2006	9/11/2006	9/11/2006	9/11/2006	9/11/2006	9/11/2006
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
Field QC:		Original data	Original data	Original data	Original data	Original data	Original data	Original data
Sampling Method:		Low-Flow	Low-Flow	Shallow Diffusion	Low-Flow	Low-Flow	Mid Diffusion	Mid Diffusion
	Units							
VOCs								
1,1,1-Trichloroethane	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
1,1,2,2-Tetrachloroethane	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
1,1,2-Trichloroethane	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
1,1-Dichloroethane	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
1,1-Dichloroethene	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
1,2-Dichlorobenzene	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
1,2-Dichloroethane	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
1,2-Dichloroethene, total	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
1,2-Dichloropropane	ug/l	2 U	2 U	2 U	-	2 U	2 U	2 U
1,3-Dichlorobenzene	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
1,4-Dichlorobenzene	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
1,4-Dioxane	ug/l	-	-	-	1 U	-	-	-
2-Butanone	ug/l	5 U	5 U	5 U	-	5 U	5 U	5 U
2-Hexanone	ug/l	5 U	5 U	5 U	-	5 U	5 U	5 U
4-Methyl-2-pentanone	ug/l	5 U	5 U	5 U	-	5 U	5 U	5 U
Acetone	ug/l	5 U	5 U	10.4 U	-	5 U	9.9 U	13.6 U
Benzene	ug/l	0.5 U	0.5 U	0.5 U	-	0.5 U	0.5 U	0.5 U
Bromodichloromethane	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
Bromoform	ug/l	1 U	1 UJ	1 UJ	-	1 UJ	1 UJ	1 UJ
Bromomethane	ug/l	2 U	2 U	2 U	-	2 U	2 U	2 U
Carbon disulfide	ug/l	5 U	5 U	5 U	-	5 U	5 U	5 U
Carbon tetrachloride	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 UJ
Chlorobenzene	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

Station ID:		MW-337	MW-338A	MW-338A	MW-338A	MW-338B	MW-338B	MW-338C
Field Sample ID*:		MW337	MW338A	MW338A-S	MW338A	MW338B	MW338B-M	MW338C-M
Lab Sample ID:		M59141-34	M59141-13	M59141-14	M59141-13A	M59141-11	M59141-12	M59141-17
Sample Date:		9/12/2006	9/11/2006	9/11/2006	9/11/2006	9/11/2006	9/11/2006	9/11/2006
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
Field QC:		Original data	Original data	Original data	Original data	Original data	Original data	Original data
Sampling Method:		Low-Flow	Low-Flow	Shallow Diffusion	Low-Flow	Low-Flow	Mid Diffusion	Mid Diffusion
	Units							
VOCs								
Chloroethane	ug/l	2 U	2 U	2 U	-	2 U	2 U	2 U
Chloroform	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
Chloromethane	ug/l	2 U	2 U	2 U	-	2 U	2 U	2 U
cis-1,3-Dichloropropene	ug/l	0.5 U	0.5 U	0.5 U	-	0.5 U	0.5 U	0.5 U
Dibromochloromethane	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
Ethylbenzene	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 UJ
Methylene chloride	ug/l	2 U	2 U	2 U	-	2 U	2 U	2 U
Styrene	ug/l	5 U	5 U	5 U	-	5 U	5 U	5 U
Tetrachloroethene	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
Toluene	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
trans-1,3-Dichloropropene	ug/l	0.5 U	0.5 U	0.5 U	-	0.5 U	0.5 U	0.5 U
Trichloroethene	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
Vinyl Chloride	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 U
Xylenes, Total	ug/l	1 U	1 U	1 U	-	1 U	1 U	1 UJ
Total VOC	ug/l	0	0	0	-	0	0	0

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

Station ID:		MW-338C	MW-339	MW-339	P-106	P-106	P-106	P-106
Field Sample ID*:		MW338C	MW339	MW339-D	P106	MW-XD5	P106	MW-XD5
Lab Sample ID:		M59141-18	M59141-15	M59141-16	M59141-41	M59141-42	M59141-41A	M59141-42A
Sample Date:		9/11/2006	9/11/2006	9/11/2006	9/13/2006	9/13/2006	9/13/2006	9/13/2006
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
Field QC:		Original data	Original data	Original data	Original data	Field duplicates	Original data	Field duplicates
Sampling Method:		Low-Flow	Low-Flow	Deep Diffusion	Low-Flow	Low-Flow	Low-Flow	Low-Flow
	Units							
VOCs								
1,1,1-Trichloroethane	ug/l	-	1 U	1 U	**352**	**377**	-	-
1,1,2,2-Tetrachloroethane	ug/l	-	1 U	1 U	1 U	1 U	-	-
1,1,2-Trichloroethane	ug/l	-	1 U	1 U	1 U	1 U	-	-
1,1-Dichloroethane	ug/l	-	1 U	1 U	13.9	14.8	-	-
1,1-Dichloroethene	ug/l	-	1 U	1 U	**56.9**	**60.9**	-	-
1,2-Dichlorobenzene	ug/l	-	1 U	1 U	1 U	1 U	-	-
1,2-Dichloroethane	ug/l	-	1 U	1.2	1 U	1 U	-	-
1,2-Dichloroethene, total	ug/l	-	1 U	1 U	8.3	8.5	-	-
1,2-Dichloropropane	ug/l	-	2 U	2 U	2 U	2 U	-	-
1,3-Dichlorobenzene	ug/l	-	1 U	1 U	1 U	1 U	-	-
1,4-Dichlorobenzene	ug/l	-	1 U	1 U	1 U	1 U	-	-
1,4-Dioxane	ug/l	1 U	-	-	-	-	16.1 J	19 J
2-Butanone	ug/l	-	5 U	5 U	5 U	5 U	-	-
2-Hexanone	ug/l	-	5 U	5 U	5 U	5 U	-	-
4-Methyl-2-pentanone	ug/l	-	5 U	5 U	5 U	5 U	-	-
Acetone	ug/l	-	5 U	10 U	5 U	5 U	-	-
Benzene	ug/l	-	0.5 U	0.5 U	0.5 U	0.5 U	-	-
Bromodichloromethane	ug/l	-	1 U	1 U	1 U	1 U	-	-
Bromoform	ug/l	-	1 UJ	1 UJ	1 U	1 U	-	-
Bromomethane	ug/l	-	2 U	2 U	2 U	2 U	-	-
Carbon disulfide	ug/l	-	5 U	5 U	5 U	5 U	-	-
Carbon tetrachloride	ug/l	-	1 UJ	1 U	1 U	1 U	-	-
Chlorobenzene	ug/l	-	1 U	1 U	1 U	1 U	-	-

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

Station ID:		MW-338C	MW-339	MW-339	P-106	P-106	P-106	P-106
Field Sample ID*:		MW338C	MW339	MW339-D	P106	MW-XD5	P106	MW-XD5
Lab Sample ID:		M59141-18	M59141-15	M59141-16	M59141-41	M59141-42	M59141-41A	M59141-42A
Sample Date:		9/11/2006	9/11/2006	9/11/2006	9/13/2006	9/13/2006	9/13/2006	9/13/2006
Lab Name:		Accutest	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
Field QC:		Original data	Original data	Original data	Original data	Field duplicates	Original data	Field duplicates
Sampling Method:		Low-Flow	Low-Flow	Deep Diffusion	Low-Flow	Low-Flow	Low-Flow	Low-Flow
	Units							
VOCs								
Chloroethane	ug/l	-	2 U	2 U	2 U	2 U	-	-
Chloroform	ug/l	-	1 U	1 U	1 U	1 U	-	-
Chloromethane	ug/l	-	2 U	2 U	2 UJ	2 UJ	-	-
cis-1,3-Dichloropropene	ug/l	-	0.5 U	0.5 U	0.5 U	0.5 U	-	-
Dibromochloromethane	ug/l	-	1 U	1 U	1 U	1 U	-	-
Ethylbenzene	ug/l	-	1 UJ	1 U	1 U	1 U	-	-
Methylene chloride	ug/l	-	2 U	2 J	2 U	2 U	-	-
Styrene	ug/l	-	5 U	5 U	5 U	5 U	-	-
Tetrachloroethene	ug/l	-	1 U	1 U	7	6.9	-	-
Toluene	ug/l	-	1 U	1 U	1 U	1 U	-	-
trans-1,3-Dichloropropene	ug/l	-	0.5 U	0.5 U	0.5 U	0.5 U	-	-
Trichloroethene	ug/l	-	1 U	1 U	**245**	**254**	-	-
Vinyl Chloride	ug/l	-	1 U	1 U	1 U	1 U	-	-
Xylenes, Total	ug/l	-	1 UJ	1 U	1 U	1 U	-	-
Total VOC	ug/l	-	0	1.2	683.1	722.1	-	-

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

Station ID:	P-111
Field Sample ID*:	P111
Lab Sample ID:	M59141-24
Sample Date:	9/12/2006
Lab Name:	Accutest
Field QC:	Original data
Sampling Method:	Low-Flow

	Units							
VOCs								
1,1,1-Trichloroethane	ug/l	1 U	-	-	-	-	-	-
1,1,2,2-Tetrachloroethane	ug/l	1 U	-	-	-	-	-	-
1,1,2-Trichloroethane	ug/l	1 U	-	-	-	-	-	-
1,1-Dichloroethane	ug/l	1 U	-	-	-	-	-	-
1,1-Dichloroethene	ug/l	1 U	-	-	-	-	-	-
1,2-Dichlorobenzene	ug/l	1 U	-	-	-	-	-	-
1,2-Dichloroethane	ug/l	1 U	-	-	-	-	-	-
1,2-Dichloroethene, total	ug/l	1 U	-	-	-	-	-	-
1,2-Dichloropropane	ug/l	2 U	-	-	-	-	-	-
1,3-Dichlorobenzene	ug/l	1 U	-	-	-	-	-	-
1,4-Dichlorobenzene	ug/l	1 U	-	-	-	-	-	-
1,4-Dioxane	ug/l	-	-	-	-	-	-	-
2-Butanone	ug/l	5 U	-	-	-	-	-	-
2-Hexanone	ug/l	5 U	-	-	-	-	-	-
4-Methyl-2-pentanone	ug/l	5 U	-	-	-	-	-	-
Acetone	ug/l	5 U	-	-	-	-	-	-
Benzene	ug/l	0.5 U	-	-	-	-	-	-
Bromodichloromethane	ug/l	1 U	-	-	-	-	-	-
Bromoform	ug/l	1 U	-	-	-	-	-	-
Bromomethane	ug/l	2 U	-	-	-	-	-	-
Carbon disulfide	ug/l	5 U	-	-	-	-	-	-
Carbon tetrachloride	ug/l	1 U	-	-	-	-	-	-
Chlorobenzene	ug/l	1 U	-	-	-	-	-	-

Table B-7
Summary of Groundwater Results - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

Station ID:	P-111
Field Sample ID*:	P111
Lab Sample ID:	M59141-24
Sample Date:	9/12/2006
Lab Name:	Accutest
Field QC:	Original data
Sampling Method:	Low-Flow

	Units							
VOCs								
Chloroethane	ug/l	2 U	-	-	-	-	-	-
Chloroform	ug/l	1 U	-	-	-	-	-	-
Chloromethane	ug/l	2 U	-	-	-	-	-	-
cis-1,3-Dichloropropene	ug/l	0.5 U	-	-	-	-	-	-
Dibromochloromethane	ug/l	1 U	-	-	-	-	-	-
Ethylbenzene	ug/l	1 U	-	-	-	-	-	-
Methylene chloride	ug/l	2 U	-	-	-	-	-	-
Styrene	ug/l	5 U	-	-	-	-	-	-
Tetrachloroethene	ug/l	1 U	-	-	-	-	-	-
Toluene	ug/l	1 U	-	-	-	-	-	-
trans-1,3-Dichloropropene	ug/l	0.5 U	-	-	-	-	-	-
Trichloroethene	ug/l	1 U	-	-	-	-	-	-
Vinyl Chloride	ug/l	1 U	-	-	-	-	-	-
Xylenes, Total	ug/l	1 U	-	-	-	-	-	-
Total VOC	ug/l	0	-	-	-	-	-	-

Table B-7

Notes:

MEG - obtained from State of Maine Department of Human Services Maximum Exposure Guidelines, Memorandum dated 23 October 1992.
MCL - obtained from 40 CFR Parts 141 and 142 (U.S. EPA 1998).
Screening Value - Risk Based Ecological Screening Values for Surface Water, Seep Water, and Sediment at the Naval Air Station Brunswick, EA Science and Technology, January, 2006
* Field Sample IDs begin with **BN-1&3-29-** for samples collected from Sites 1 and 3 or **BN-EP-29-** for samples collected from the Eastern Plume area.
VOCs analyzed by EPA Method 8260B.
Target Analyte List Metals analyzed by EPA 6000/7000 series methods.
Pesticides analyzed by EPA Method 8081A.

Acronyms:

-	Not sampled
EPA	U.S. Environmental Protection Agency
GWETS	Groundwater Extraction and Treatment System
ID	Identification
MCL	Maximum Contaminant Level
MEG	Maximum Exposure Guideline
mg/kg	milligrams per kilogram
mg/L	milligrams per liter
MNA	Monitored Natural Attenuation
NA	Criteria not applicable
VOC	Volatile Organic Compound
ug/L	micrograms per liter

Validation Qualifiers:

U	Not detected at or above the sample quantitation limit
J	Estimated concentration
UJ	Not detected. Sample quantitation limit is estimated.
R	Value rejected by data validator

Total VOC calculation does not include common laboratory contaminants (acetone, methylene chloride, 2-butanone), VOCs detected in the blank samples, or 1,4-dioxane.
Results for 2-butanone, 2-hexanone, 4-methyl-2-pentanone, and acetone are not usable when samples are collected by diffusion sampling.
Highlighted concentrations indicate exceedance of an MEG, MCL or screening level. The color of the highlight indicated which screening level was exceeded.
Refer to the Data Quality Review section for reporting limits and method detection limits for all analyzed compounds.

VOC Contaminants of Concern:
1,1-Dichloroethane
1,2-Dichloroethene, total
Chlorobenzene
Ethylbenzene
Methylene Chloride
Toluene
Vinyl Chloride
Xylenes, total

Metals Contaminants of Concern:
Aluminum
Arsenic
Barium
Chromium
Lead
Manganese
Nickel
Potassium

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Table B-8
Summary of Leachate Seep Samples - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

		Station ID:	SEEP-10	SEEP-11	SEEP-11			
		Field Sample ID*:	SEEP10	SEEP11	SEEP-XD1			
		Lab Sample ID:	M59141-10	M59141-8	M59141-9			
		Sample Date:	9/8/2006	9/8/2006	9/8/2006			
		Lab Name:	Accutest	Accutest	Accutest			
		Field QC:	Original data	Original data	Field duplicates			
		Sampling Method:	Grab	Grab	Grab			
	Units	**Screening Value**						
VOCs								
1,1,1-Trichloroethane	ug/l	11	1 U	1.1 J	1.1 J	-	-	-
1,1,2,2-Tetrachloroethane	ug/l	610	1 U	1 U	1 U	-	-	-
1,1,2-Trichloroethane	ug/l	1200	1 U	1 U	1 U	-	-	-
1,1-Dichloroethane	ug/l	47	1 U	1 U	1 U	-	-	-
1,1-Dichloroethene	ug/l	25	1 U	1 U	1 U	-	-	-
1,2-Dichlorobenzene	ug/l	14	1 U	1 U	1 U	-	-	-
1,2-Dichloroethane	ug/l	910	1 U	1 U	1 U	-	-	-
1,2-Dichloroethene, total	ug/l	NA	1 U	1 U	1 U	-	-	-
1,2-Dichloropropane	ug/l	2160	2 U	2 U	2 U	-	-	-
1,3-Dichlorobenzene	ug/l	71	1 U	1 U	1 U	-	-	-
1,4-Dichlorobenzene	ug/l	15	1 U	1 U	1 U	-	-	-
2-Butanone	ug/l	14000	5 U	5 U	5 U	-	-	-
2-Hexanone	ug/l	99	5 U	5 U	5 U	-	-	-
4-Methyl-2-pentanone	ug/l	170	5 U	5 U	5 U	-	-	-
Acetone	ug/l	1500	22.2 U	5 U	5 U	-	-	-
Benzene	ug/l	130	0.5 U	0.5 U	0.5 U	-	-	-
Bromodichloromethane	ug/l	2610	1 U	1 U	1 U	-	-	-
Bromoform	ug/l	2300	1 UJ	1 UJ	1 UJ	-	-	-
Bromomethane	ug/l	9450	2 U	2 U	2 U	-	-	-
Carbon disulfide	ug/l	92	5 U	5 U	5 U	-	-	-
Carbon tetrachloride	ug/l	9.8	1 U	1 U	1 U	-	-	-
Chlorobenzene	ug/l	64	1 U	1 U	1 U	-	-	-
Chloroethane	ug/l	NA	2 U	2 U	2 U	-	-	-

Table B-8
Summary of Leachate Seep Samples - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

		Station ID:	SEEP-10	SEEP-11	SEEP-11			
		Field Sample ID*:	SEEP10	SEEP11	SEEP-XD1			
		Lab Sample ID:	M59141-10	M59141-8	M59141-9			
		Sample Date:	9/8/2006	9/8/2006	9/8/2006			
		Lab Name:	Accutest	Accutest	Accutest			
		Field QC:	Original data	Original data	Field duplicates			
		Sampling Method:	Grab	Grab	Grab			
	Units	**Screening Value**						
VOCs								
Chloroform	ug/l	28	1 U	1 U	1 U	-	-	-
Chloromethane	ug/l	6000	2 U	2 U	2 UJ	-	-	-
cis-1,3-Dichloropropene	ug/l	0.085	0.5 U	0.5 U	0.5 U	-	-	-
Dibromochloromethane	ug/l	2510	1 U	1 U	1 U	-	-	-
Ethylbenzene	ug/l	7.3	1 U	1 U	1 U	-	-	-
Methylene chloride	ug/l	2200	2 U	2 U	2 U	-	-	-
Styrene	ug/l	300	5 U	5 U	5 U	-	-	-
Tetrachloroethene	ug/l	98	1 U	1.4	1.4	-	-	-
Toluene	ug/l	9.8	0.73 U	1 U	1 U	-	-	-
trans-1,3-Dichloropropene	ug/l	0.085	0.5 U	0.5 U	0.5 U	-	-	-
Trichloroethene	ug/l	47	1 U	1.6	1.7	-	-	-
Vinyl Chloride	ug/l	0.069	1 U	1 U	1 U	-	-	-
Xylenes, Total	ug/l	1.8	1 U	1 U	1 U	-	-	-
Total VOC	ug/l	NA	0	4.1	4.2	-	-	-

Table B-8

Notes:

MEG - obtained from State of Maine Department of Human Services Maximum Exposure Guidelines, Memorandum dated 23 October 1992.
MCL - obtained from 40 CFR Parts 141 and 142 (U.S. EPA 1998).
Screening Value - Risk Based Ecological Screening Values for Surface Water, Seep Water, and Sediment at the Naval Air Station Brunswick, EA Science and Technology, January, 2006
* Field Sample IDs begin with **BN-1&3-29-** for samples collected from Sites 1 and 3 or **BN-EP-29-** for samples collected from the Eastern Plume area.
VOCs analyzed by EPA Method 8260B.
Target Analyte List Metals analyzed by EPA 6000/7000 series methods.
Pesticides analyzed by EPA Method 8081A.

Acronyms:

-	Not sampled
EPA	U.S. Environmental Protection Agency
GWETS	Groundwater Extraction and Treatment System
ID	Identification
MCL	Maximum Contaminant Level
MEG	Maximum Exposure Guideline
mg/kg	milligrams per kilogram
mg/L	milligrams per liter
MNA	Monitored Natural Attenuation
NA	Criteria not applicable
VOC	Volatile Organic Compound
ug/L	micrograms per liter

Validation Qualifiers:

U	Not detected at or above the sample quantitation limit
J	Estimated concentration
UJ	Not detected. Sample quantitation limit is estimated.
R	Value rejected by data validator

Total VOC calculation does not include common laboratory contaminants (acetone, methylene chloride, 2-butanone), VOCs detected in the blank samples, or 1,4-dioxane.
Highlighted concentrations indicate exceedance of an MEG, MCL or screening level. The color of the highlight indicated which screening level was exceeded.
Refer to the Data Quality Review section for reporting limits and method detection limits for all analyzed compounds.

VOC Contaminants of Concern:
1,1-Dichloroethane
1,2-Dichloroethene, total
Chlorobenzene
Ethylbenzene
Methylene Chloride
Toluene
Vinyl Chloride
Xylenes, total

Metals Contaminants of Concern:
Aluminum
Arsenic
Barium
Chromium
Lead
Manganese
Nickel
Potassium

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Table 9
Summary of Sediment Samples - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

		Station ID:	SED-11	SED-11				
		Field Sample ID*:	SED11	SED-XD1				
		Lab Sample ID:	M59141-6	M59141-7				
		Sample Date:	9/8/2006	9/8/2006				
		Lab Name:	Accutest	Accutest				
		Field QC:	Original data	Field duplicates				
		Sampling Method:	Grab	Grab				
	Units	**Screening Value**						
Metals								
Aluminum	mg/kg	26000	5070	5560	-	-	-	-
Antimony	mg/kg	0.16	1.8 UJ	2.1 UJ	-	-	-	-
Arsenic	mg/kg	9.8	3.7	5	-	-	-	-
Barium	mg/kg	0.7	36.7	38.8	-	-	-	-
Beryllium	mg/kg	0.55	0.37	0.4 J	-	-	-	-
Cadmium	mg/kg	0.99	0.37 U	0.43 U	-	-	-	-
Calcium	mg/kg	NA	866	943	-	-	-	-
Chromium	mg/kg	43.4	9.3	10	-	-	-	-
Cobalt	mg/kg	10	5.3	5.7	-	-	-	-
Copper	mg/kg	31.6	7	7.7	-	-	-	-
Iron	mg/kg	10000	18300	20900	-	-	-	-
Lead	mg/kg	35.8	22.9	25	-	-	-	-
Magnesium	mg/kg	NA	1600	1770	-	-	-	-
Manganese	mg/kg	630	505	518	-	-	-	-
Mercury	mg/kg	0.18	0.022 J	0.037 J	-	-	-	-
Nickel	mg/kg	22.7	8.4	9.2	-	-	-	-
Potassium	mg/kg	NA	691	767	-	-	-	-
Selenium	mg/kg	0.29	0.55 J	0.69 J	-	-	-	-
Silver	mg/kg	0.5	0.46 U	0.54 U	-	-	-	-
Sodium	mg/kg	NA	68.3 J	81 J	-	-	-	-
Thallium	mg/kg	NA	1.8 UJ	2.1 UJ	-	-	-	-
Vanadium	mg/kg	43	17.3	19.1	-	-	-	-
Zinc	mg/kg	NA	51.3	57	-	-	-	-

Table 9
Summary of Sediment Samples - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

		Station ID:	SED-11	SED-11				
		Field Sample ID*:	SED11	SED-XD1				
		Lab Sample ID:	M59141-6	M59141-7				
		Sample Date:	9/8/2006	9/8/2006				
		Lab Name:	Accutest	Accutest				
		Field QC:	Original data	Field duplicates				
		Sampling Method:	Grab	Grab				
	Units	**Screening Value**						
Pesticides								
4,4'-DDD	mg/kg	0.00488	0.0115 J	0.0144 J	-	-	-	-
4,4'-DDE	mg/kg	0.00316	0.0024 U	0.00096 J	-	-	-	-
4,4'-DDT	mg/kg	0.00416	0.0024 UJ	0.0039 J	-	-	-	-
Aldrin	mg/kg	0.002	0.0024 U	0.0026 U	-	-	-	-
Alpha-BHC	mg/kg	0.006	0.0024 U	0.0026 U	-	-	-	-
Beta-BHC	mg/kg	0.005	0.0024 U	0.0026 U	-	-	-	-
Chlordane	mg/kg	NA	0.024 U	0.026 U	-	-	-	-
Delta-BHC	mg/kg	0.0024	0.0024 U	0.0026 U	-	-	-	-
Dieldrin	mg/kg	0.0019	0.0024 U	0.0026 U	-	-	-	-
Endosulfan I	mg/kg	0.0055	0.0024 U	0.0076 J	-	-	-	-
Endosulfan II	mg/kg	0.0055	0.0024 U	0.0026 U	-	-	-	-
Endosulfan Sulfate	mg/kg	0.0055	0.0024 U	0.0026 U	-	-	-	-
Endrin	mg/kg	0.0022	0.0024 U	0.0026 U	-	-	-	-
Endrin Aldehyde	mg/kg	0.0022	0.0024 U	0.0026 U	-	-	-	-
Gamma-BHC (Lindane)	mg/kg	0.0024	0.0024 U	0.0026 U	-	-	-	-
Heptachlor	mg/kg	0.0025	0.0024 U	0.0026 U	-	-	-	-
Heptachlor Epoxide	mg/kg	0.0025	0.0024 U	0.0026 U	-	-	-	-
Methoxychlor	mg/kg	0.019	0.0024 UJ	0.0026 UJ	-	-	-	-
Toxaphene	mg/kg	NA	0.12 U	0.13 U	-	-	-	-
MNA Parameters								
Total Organic Carbon	mg/kg	NA	28900	-	-	-	-	-

Table B-9

Notes:

MEG - obtained from State of Maine Department of Human Services Maximum Exposure Guidelines, Memorandum dated 23 October 1992.
MCL - obtained from 40 CFR Parts 141 and 142 (U.S. EPA 1998).
Screening Value - Risk Based Ecological Screening Values for Surface Water, Seep Water, and Sediment at the Naval Air Station Brunswick, EA Science and Technology, January, 2006
* Field Sample IDs begin with **BN-1&3-29-** for samples collected from Sites 1 and 3 or **BN-EP-29-** for samples collected from the Eastern Plume area.
VOCs analyzed by EPA Method 8260B.
Target Analyte List Metals analyzed by EPA 6000/7000 series methods.
Pesticides analyzed by EPA Method 8081A.

Acronyms:

-	Not sampled
EPA	U.S. Environmental Protection Agency
GWETS	Groundwater Extraction and Treatment System
ID	Identification
MCL	Maximum Contaminant Level
MEG	Maximum Exposure Guideline
mg/kg	milligrams per kilogram
mg/L	milligrams per liter
MNA	Monitored Natural Attenuation
NA	Criteria not applicable
VOC	Volatile Organic Compound
ug/L	micrograms per liter

Validation Qualifiers:

U	Not detected at or above the sample quantitation limit
J	Estimated concentration
UJ	Not detected. Sample quantitation limit is estimated.
R	Value rejected by data validator

Total VOC calculation does not include common laboratory contaminants (acetone, methylene chloride, 2-butanone), VOCs detected in the blank samples, or 1,4-dioxane.
Highlighted concentrations indicate exceedance of an MEG, MCL or screening level. The color of the highlight indicated which screening level was exceeded.
Refer to the Data Quality Review section for reporting limits and method detection limits for all analyzed compounds.

VOC Contaminants of Concern:
1,1-Dichloroethane
1,2-Dichloroethene, total
Chlorobenzene
Ethylbenzene
Methylene Chloride
Toluene
Vinyl Chloride
Xylenes, total

Metals Contaminants of Concern:
Aluminum
Arsenic
Barium
Chromium
Lead
Manganese
Nickel
Potassium

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Table B-10
Summary of Surface Water Samples - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

		Station ID:	SW-010	SW-011	SW-012	SW-013	SW-014	SW-014
		Field Sample ID*:	SW10	SW11	SW12	SW13	SW14	SW-XD1
		Lab Sample ID:	M59141-1	M59141-2	M59141-39	M59141-3	M59141-4	M59141-5
		Sample Date:	9/8/2006	9/8/2006	9/12/2006	9/8/2006	9/8/2006	9/8/2006
		Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
		Field QC:	Original data	Original data	Original data	Original data	Original data	Field duplicates
		Sampling Method:	Grab	Grab	Grab	Grab	Grab	Grab
	Units	**Screening Value**						
VOCs								
1,1,1-Trichloroethane	ug/l	11	1 U	1 U	1 U	1 U	1 U	1 U
1,1,2,2-Tetrachloroethane	ug/l	610	1 U	1 U	1 U	1 U	1 U	1 U
1,1,2-Trichloroethane	ug/l	1200	1 U	1 U	1 U	1 U	1 U	1 U
1,1-Dichloroethane	ug/l	47	1 U	1 U	1 U	1 U	1 U	1 U
1,1-Dichloroethene	ug/l	25	1 U	1 U	1 U	1 U	1 U	1 U
1,2-Dichlorobenzene	ug/l	14	1 U	1 U	1 U	1 U	1 U	1 U
1,2-Dichloroethane	ug/l	910	1 U	1 U	1 U	1 U	1 U	1 U
1,2-Dichloroethene, total	ug/l	NA	1 U	1 U	1 U	1 U	1 U	1 U
1,2-Dichloropropane	ug/l	2160	2 U	2 U	2 U	2 U	2 U	2 U
1,3-Dichlorobenzene	ug/l	71	1 U	1 U	1 U	1 U	1 U	1 U
1,4-Dichlorobenzene	ug/l	15	1 U	1 U	1 U	1 U	1 U	1 U
2-Butanone	ug/l	14000	5 U	5 U	5 U	5 U	5 U	5 U
2-Hexanone	ug/l	99	5 U	5 U	5 U	5 U	5 U	5 U
4-Methyl-2-pentanone	ug/l	170	5 U	5 U	5 U	5 U	5 U	5 U
Acetone	ug/l	1500	5 U	5 U	5 U	5 U	5 U	5 U
Benzene	ug/l	130	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
Bromodichloromethane	ug/l	2610	1 U	1 U	1 U	1 U	1 U	1 U
Bromoform	ug/l	2300	1 U	1 U	1 U	1 U	1 U	1 UJ
Bromomethane	ug/l	9450	2 U	2 U	2 U	2 U	2 U	2 U
Carbon disulfide	ug/l	92	5 U	5 U	5 U	5 U	5 U	5 U
Carbon tetrachloride	ug/l	9.8	1 U	1 U	1 U	1 U	1 U	1 U
Chlorobenzene	ug/l	64	1 U	1 U	1 U	1 U	1 U	1 U
Chloroethane	ug/l	NA	2 U	2 U	2 U	2 U	2 U	2 U

Table B-10
Summary of Surface Water Samples - Eastern Plume
September 2006 (Monitoring Event 29)
Naval Air Station, Brunswick, Maine

Site Name: Eastern Plume

		Station ID:	SW-010	SW-011	SW-012	SW-013	SW-014	SW-014
		Field Sample ID*:	SW10	SW11	SW12	SW13	SW14	SW-XD1
		Lab Sample ID:	M59141-1	M59141-2	M59141-39	M59141-3	M59141-4	M59141-5
		Sample Date:	9/8/2006	9/8/2006	9/12/2006	9/8/2006	9/8/2006	9/8/2006
		Lab Name:	Accutest	Accutest	Accutest	Accutest	Accutest	Accutest
		Field QC:	Original data	Original data	Original data	Original data	Original data	Field duplicates
		Sampling Method:	Grab	Grab	Grab	Grab	Grab	Grab
	Units	**Screening Value**						
VOCs								
Chloroform	ug/l	28	1 U	1 U	1 U	1 U	1 U	1 U
Chloromethane	ug/l	6000	2 U	2 U	2 U	2 U	2 U	2 U
cis-1,3-Dichloropropene	ug/l	0.085	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
Dibromochloromethane	ug/l	2510	1 U	1 U	1 U	1 U	1 U	1 U
Ethylbenzene	ug/l	7.3	1 U	1 U	1 U	1 U	1 U	1 U
Methylene chloride	ug/l	2200	2 U	2 U	2 U	2 U	2 U	2 U
Styrene	ug/l	300	5 U	5 U	5 U	5 U	5 U	5 U
Tetrachloroethene	ug/l	98	1 U	1 U	1 U	1 U	1 U	1 U
Toluene	ug/l	9.8	1 U	1 U	1 U	1 U	1 U	1 U
trans-1,3-Dichloropropene	ug/l	0.085	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U	0.5 U
Trichloroethene	ug/l	47	1 U	1 U	1 U	1 U	1 U	1 U
Vinyl Chloride	ug/l	0.069	1 U	1 U	1 U	1 U	1 U	1 U
Xylenes, Total	ug/l	1.8	1 U	1 U	1 U	1 U	1 U	1 U
Total VOC	ug/l	NA	0	0	0	0	0	0

Table B-10

Notes:

MEG - obtained from State of Maine Department of Human Services Maximum Exposure Guidelines, Memorandum dated 23 October 1992.
MCL - obtained from 40 CFR Parts 141 and 142 (U.S. EPA 1998).
Screening Value - Risk Based Ecological Screening Values for Surface Water, Seep Water, and Sediment at the Naval Air Station Brunswick, EA Science and Technology, January, 2006
* Field Sample IDs begin with **BN-1&3-29-** for samples collected from Sites 1 and 3 or **BN-EP-29-** for samples collected from the Eastern Plume area.
VOCs analyzed by EPA Method 8260B.
Target Analyte List Metals analyzed by EPA 6000/7000 series methods.
Pesticides analyzed by EPA Method 8081A.

Acronyms:

-	Not sampled
EPA	U.S. Environmental Protection Agency
GWETS	Groundwater Extraction and Treatment System
ID	Identification
MCL	Maximum Contaminant Level
MEG	Maximum Exposure Guideline
mg/kg	milligrams per kilogram
mg/L	milligrams per liter
MNA	Monitored Natural Attenuation
NA	Criteria not applicable
VOC	Volatile Organic Compound
ug/L	micrograms per liter

Validation Qualifiers:

U	Not detected at or above the sample quantitation limit
J	Estimated concentration
UJ	Not detected. Sample quantitation limit is estimated.
R	Value rejected by data validator

Total VOC calculation does not include common laboratory contaminants (acetone, methylene chloride, 2-butanone), VOCs detected in the blank samples, or 1,4-dioxane.
Highlighted concentrations indicate exceedance of an MEG, MCL or screening level. The color of the highlight indicated which screening level was exceeded.
Refer to the Data Quality Review section for reporting limits and method detection limits for all analyzed compounds.

VOC Contaminants of Concern:
1,1-Dichloroethane
1,2-Dichloroethene, total
Chlorobenzene
Ethylbenzene
Methylene Chloride
Toluene
Vinyl Chloride
Xylenes, total

Metals Contaminants of Concern:
Aluminum
Arsenic
Barium
Chromium
Lead
Manganese
Nickel
Potassium

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APPENDIX C

Temporal Trend Graphs

Appendix C.1

Long-Term Monitoring Trend Results
Sites 1 and 3

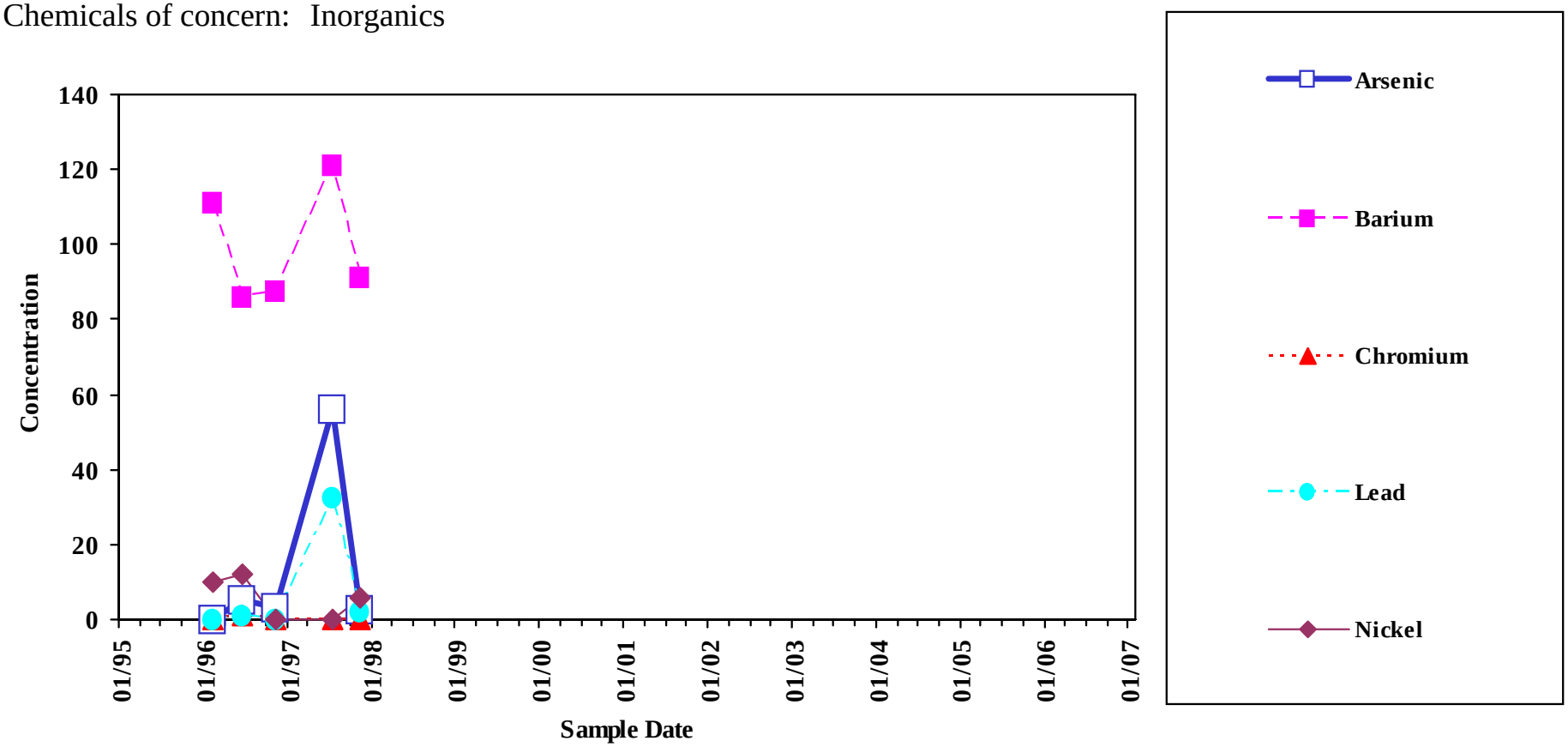
- Extraction Well Data (EW)
- Leachate Sediment Data (LT)
- Groundwater Data (MW)
- Stream Sediment Data (SED)
- Leachate Seep Data (SEEP)
- Extraction System Influent – Sites 1 and 3
- Surface Water (SW)

Sample Location:

EW-06

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

Chromium	Lead	Nickel
100	15	--

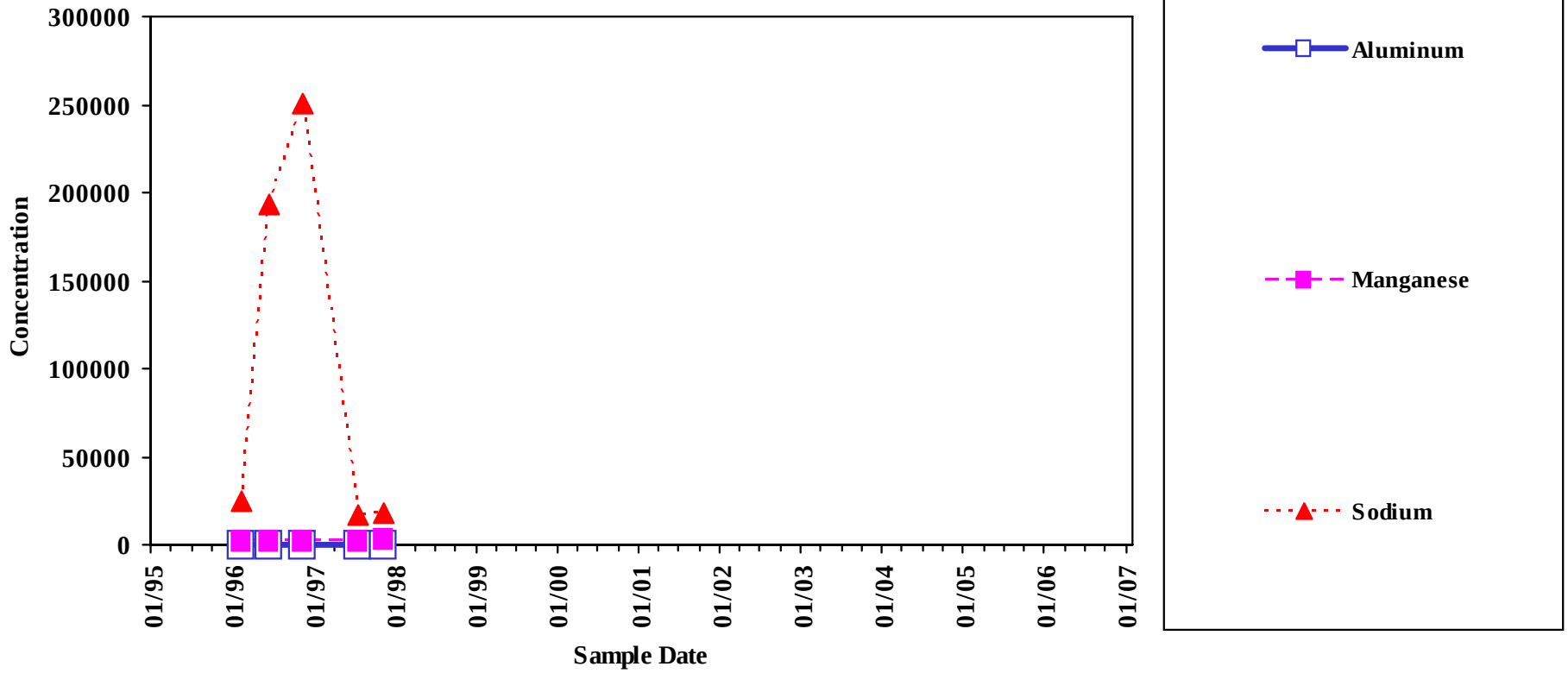
MCL	Arsenic	Barium
	10	2000

Sample Location:

EW-06

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

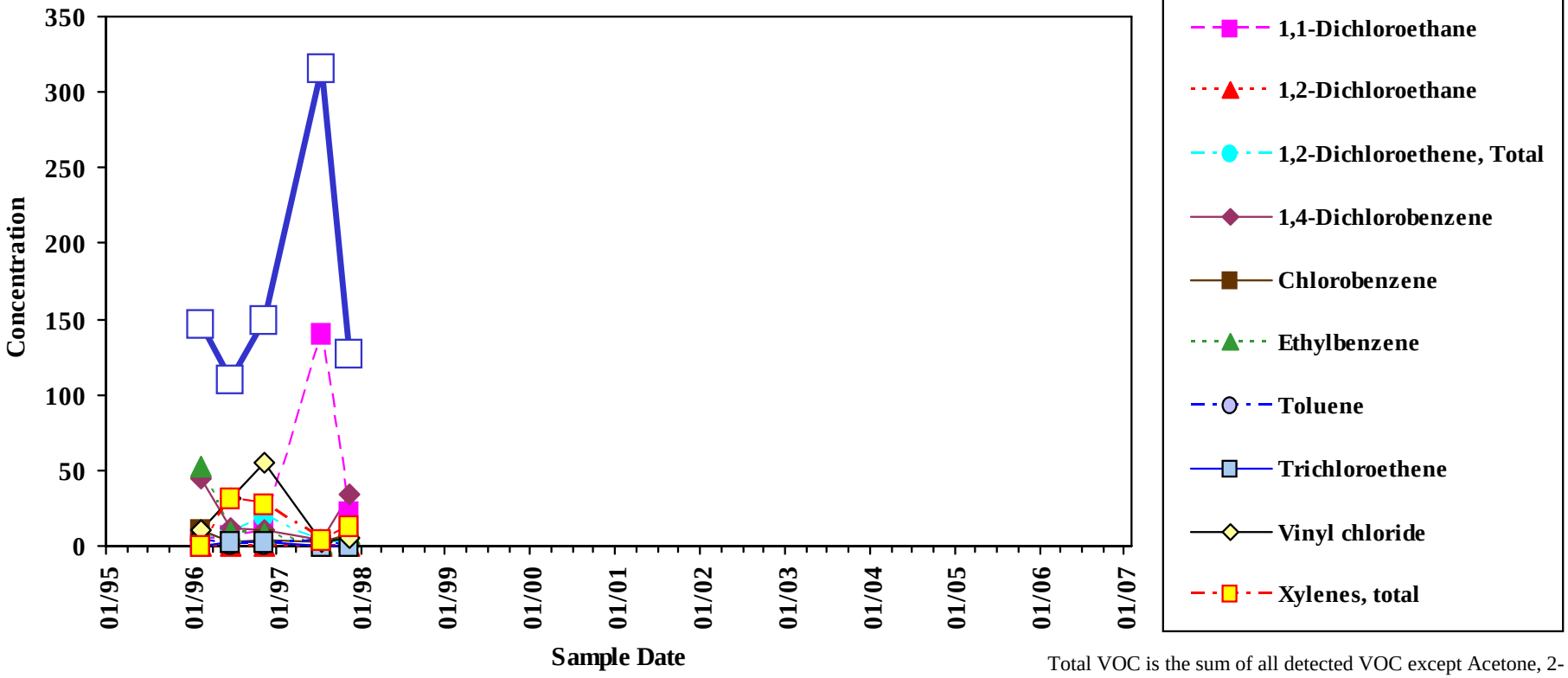
MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

Sample Location:

EW-06

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

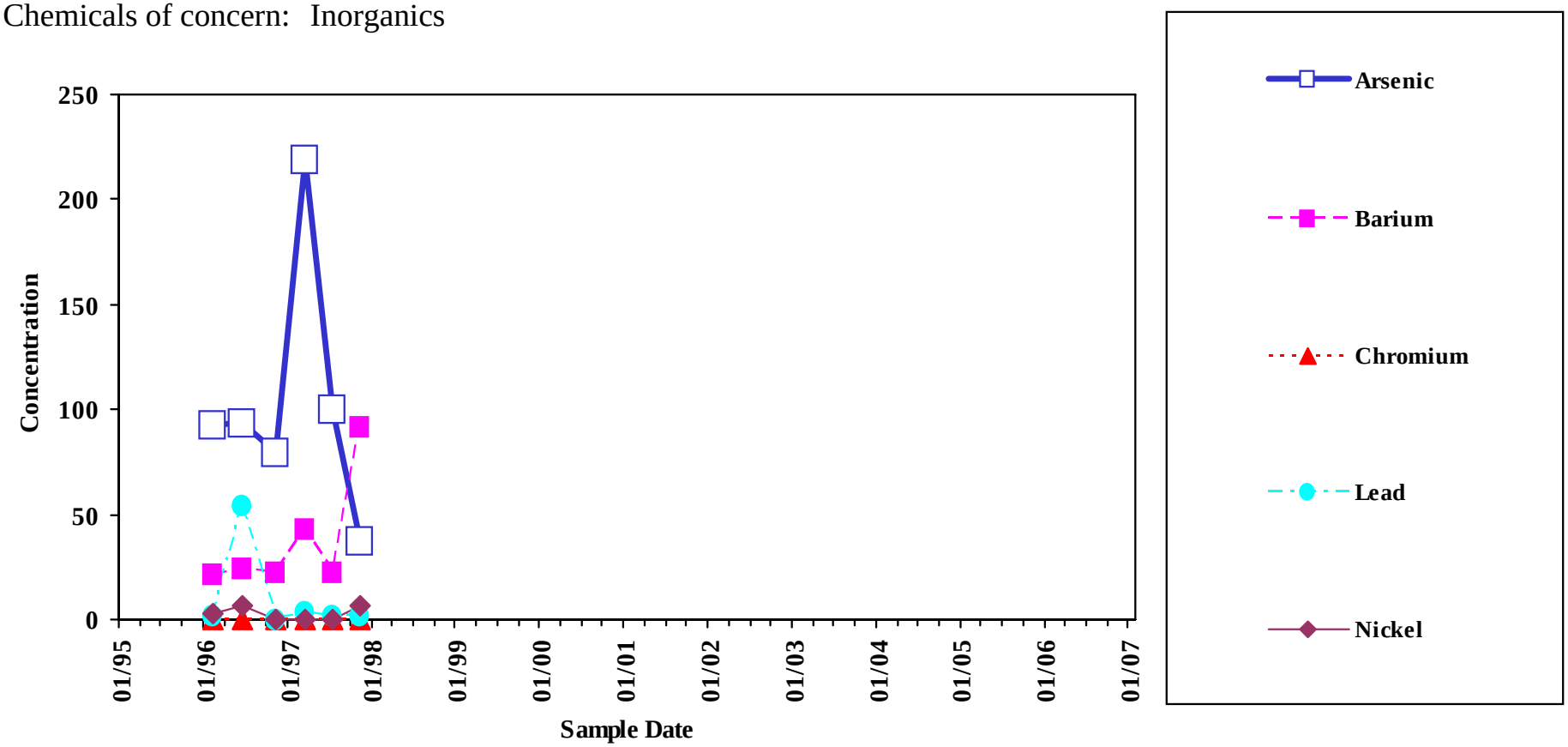
MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

Sample Location:

EW-07

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

Chromium	Lead	Nickel
100	15	--

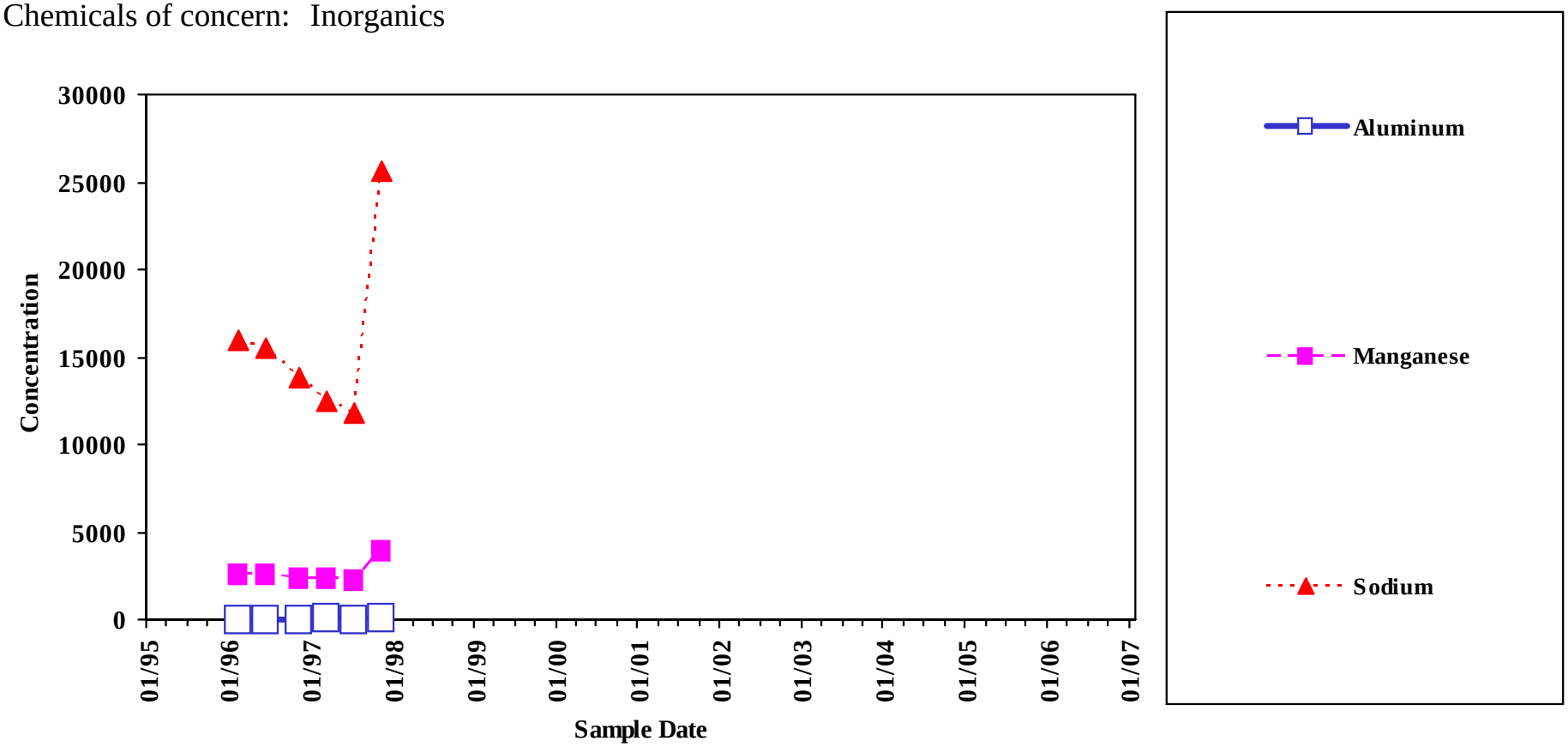
MCL	Arsenic	Barium
	10	2000

Sample Location:

EW-07

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

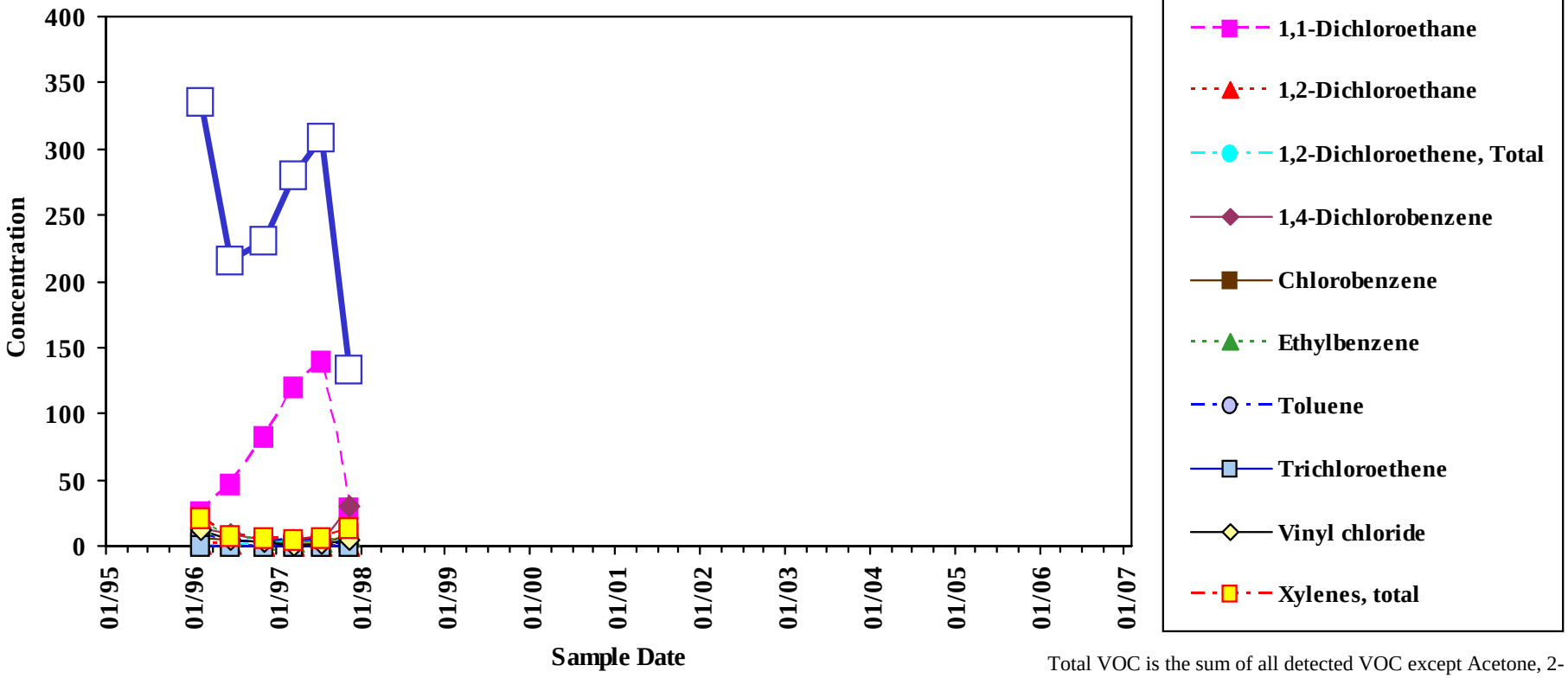
MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

Sample Location:

EW-07

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

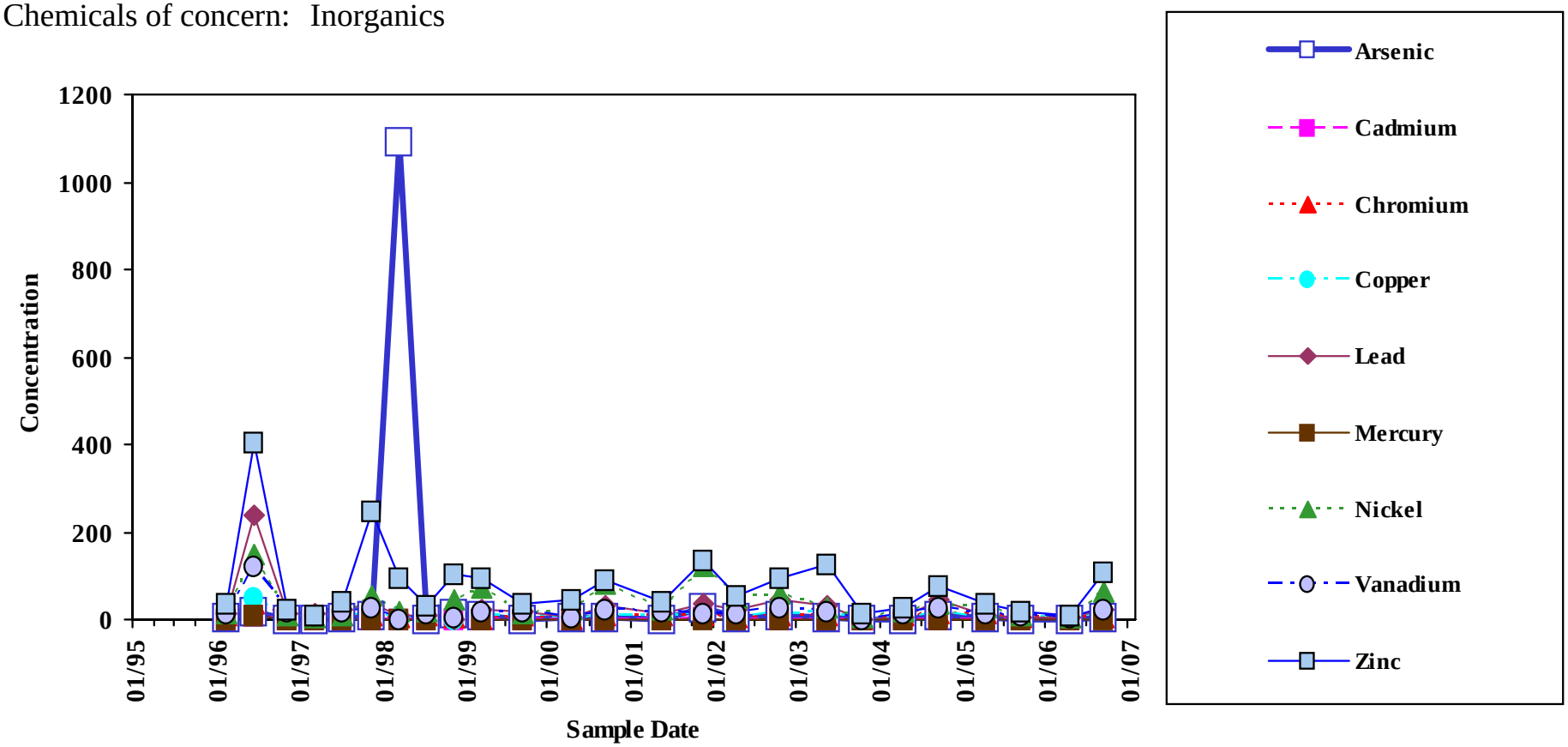
MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

Sample Location:

LT-01

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

Zinc
--

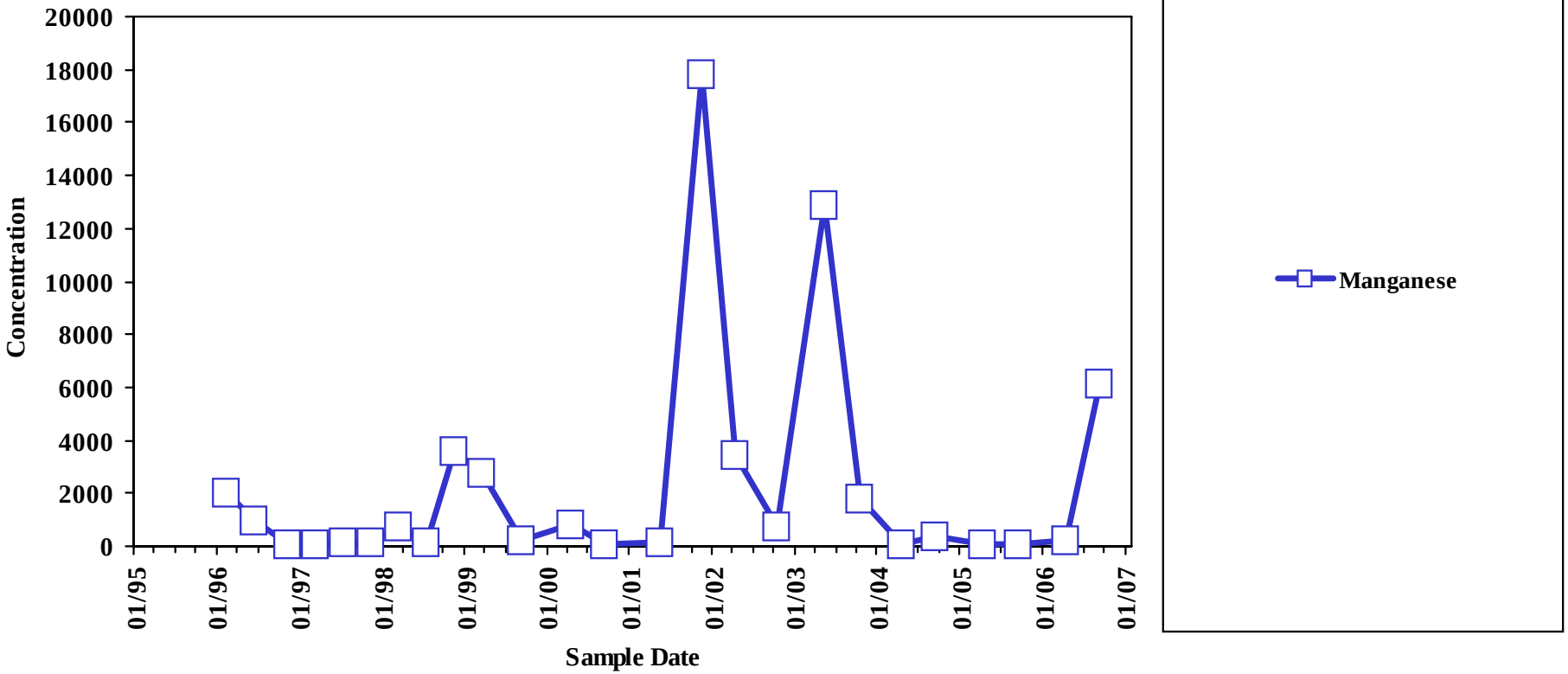
Sample Location:

LT-01

Sites 1 & 3

Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

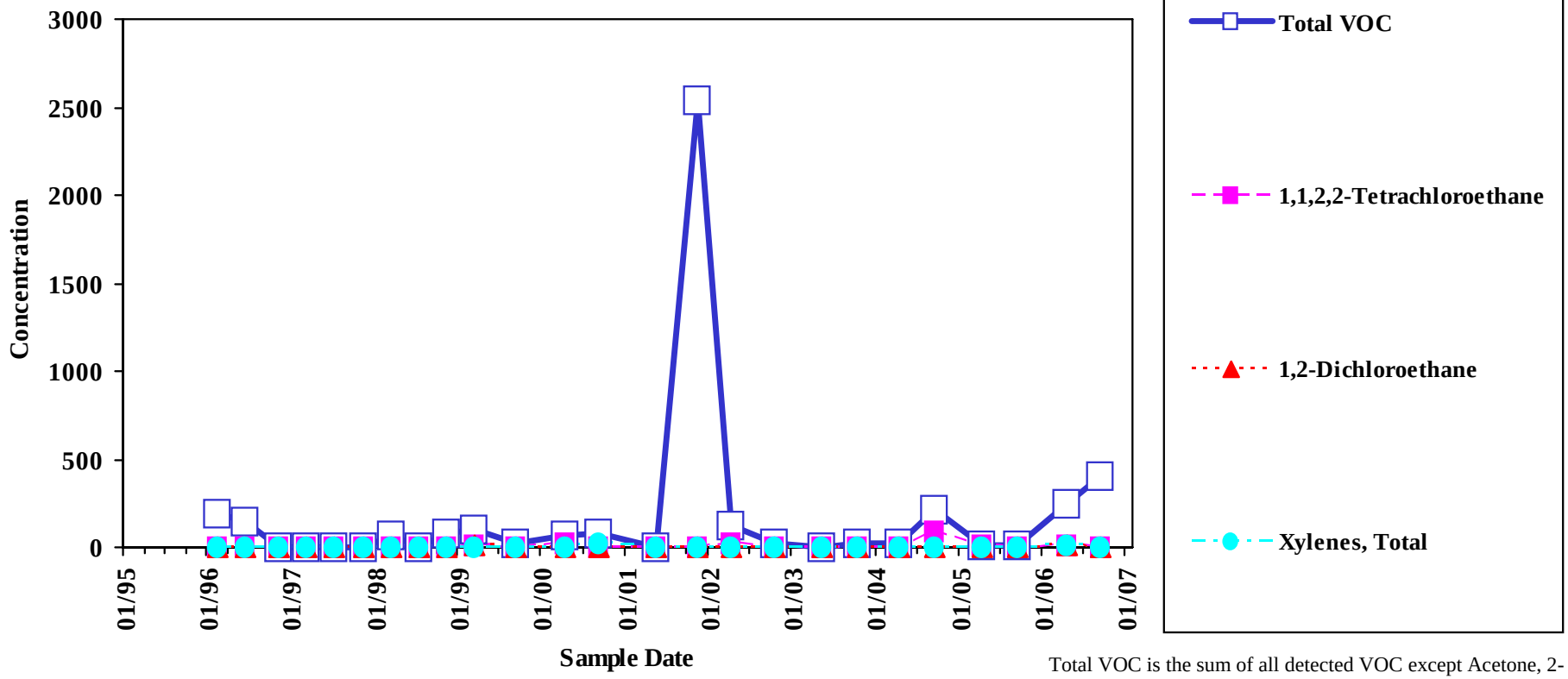
Clean-up Standard	Manganese
	630

Sample Location:

LT-01

Sites 1 & 3
Sediment

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/Kg

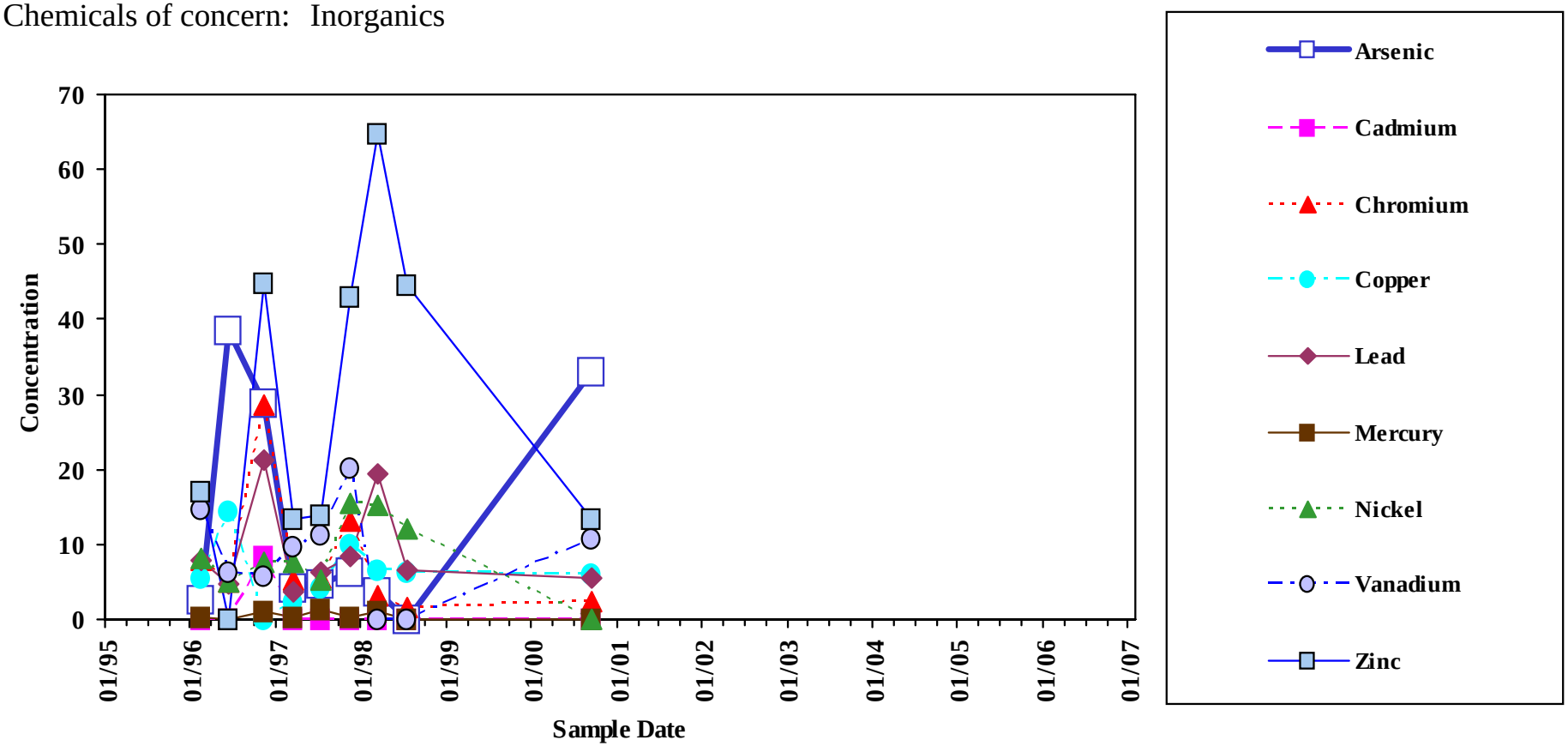
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,2-Dichloroethane	Xylenes, Total
	0.94	4.4	9.7

Sample Location:

LT-02

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

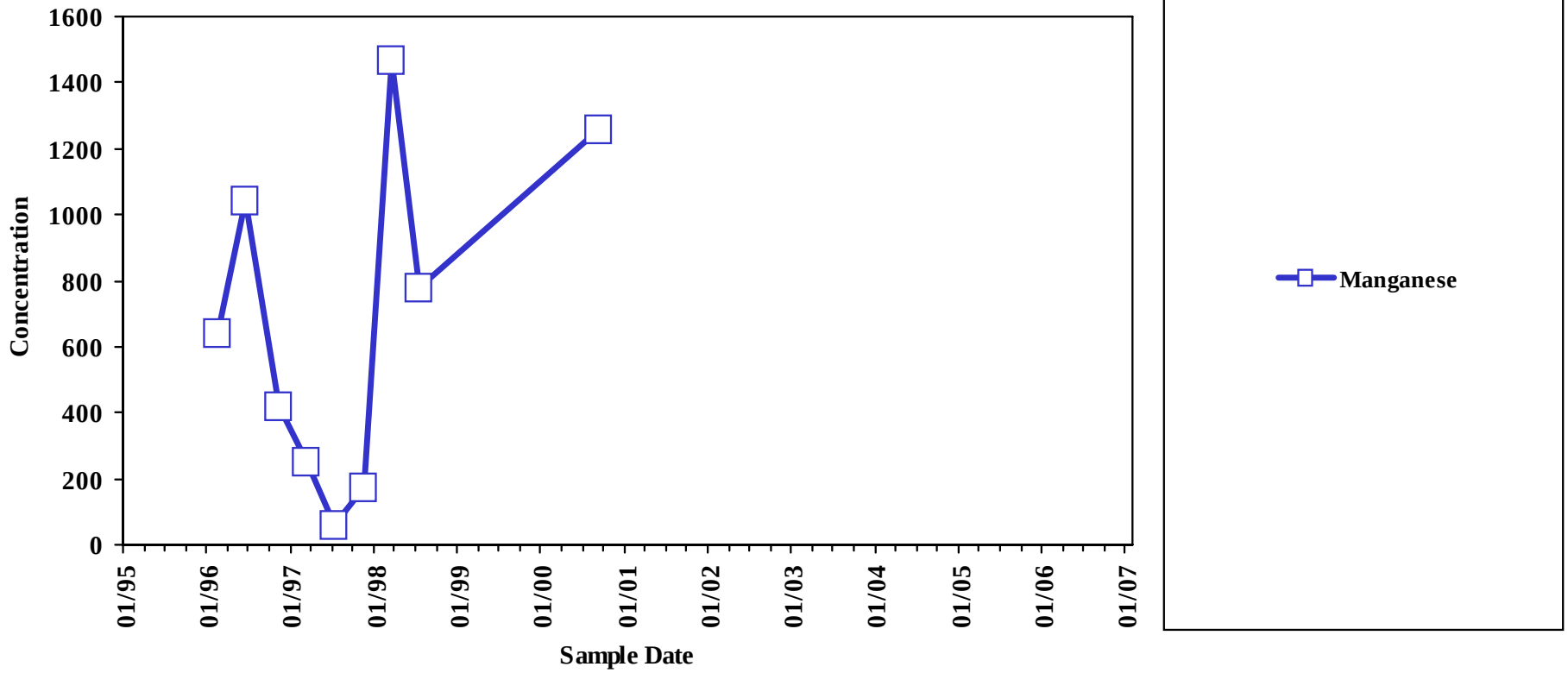
Zinc
--

Sample Location:

LT-02

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

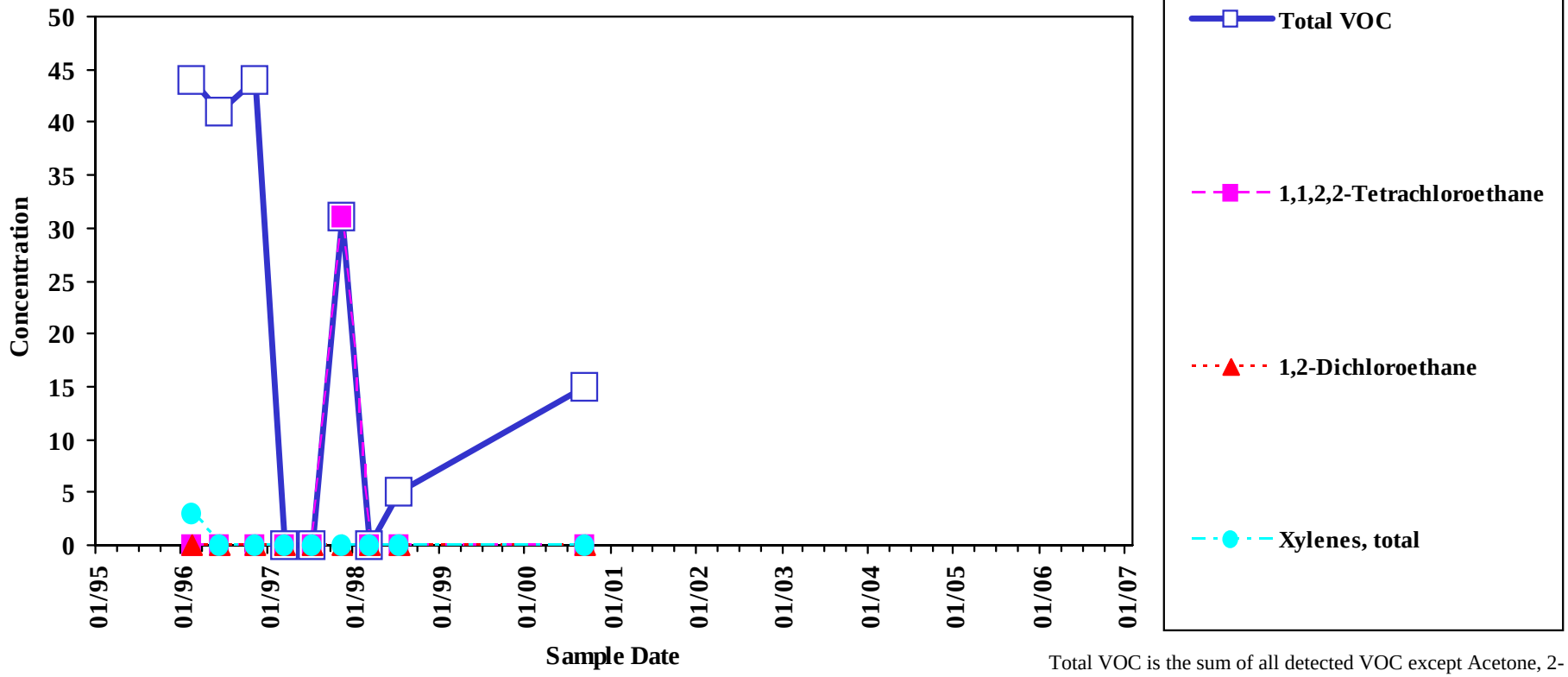
Clean-up Standard	Manganese
	630

Sample Location:

LT-02

Sites 1 & 3
Sediment

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/Kg

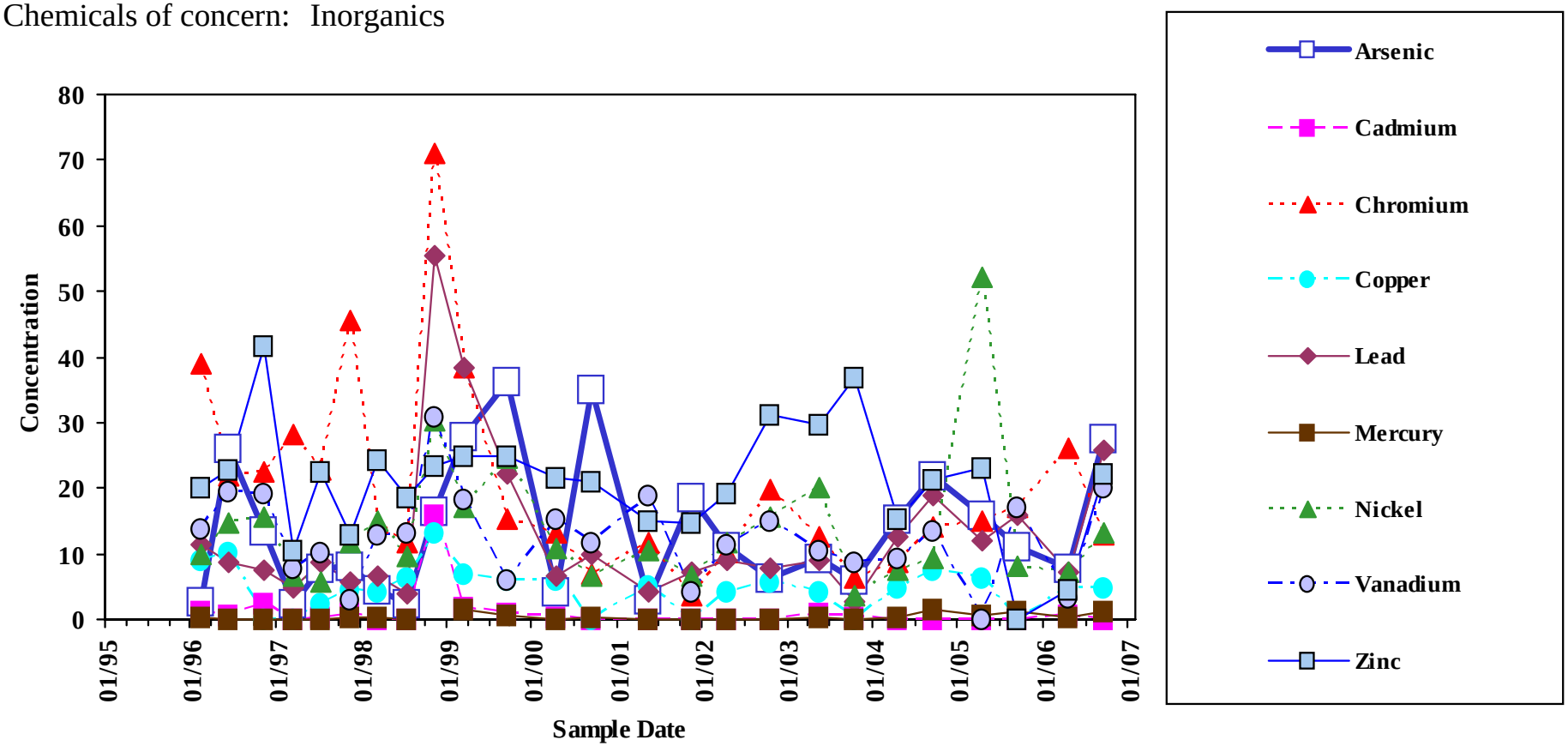
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,2-Dichloroethane	Xylenes, Total
	0.94	4.4	9.7

Sample Location:

LT-03

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

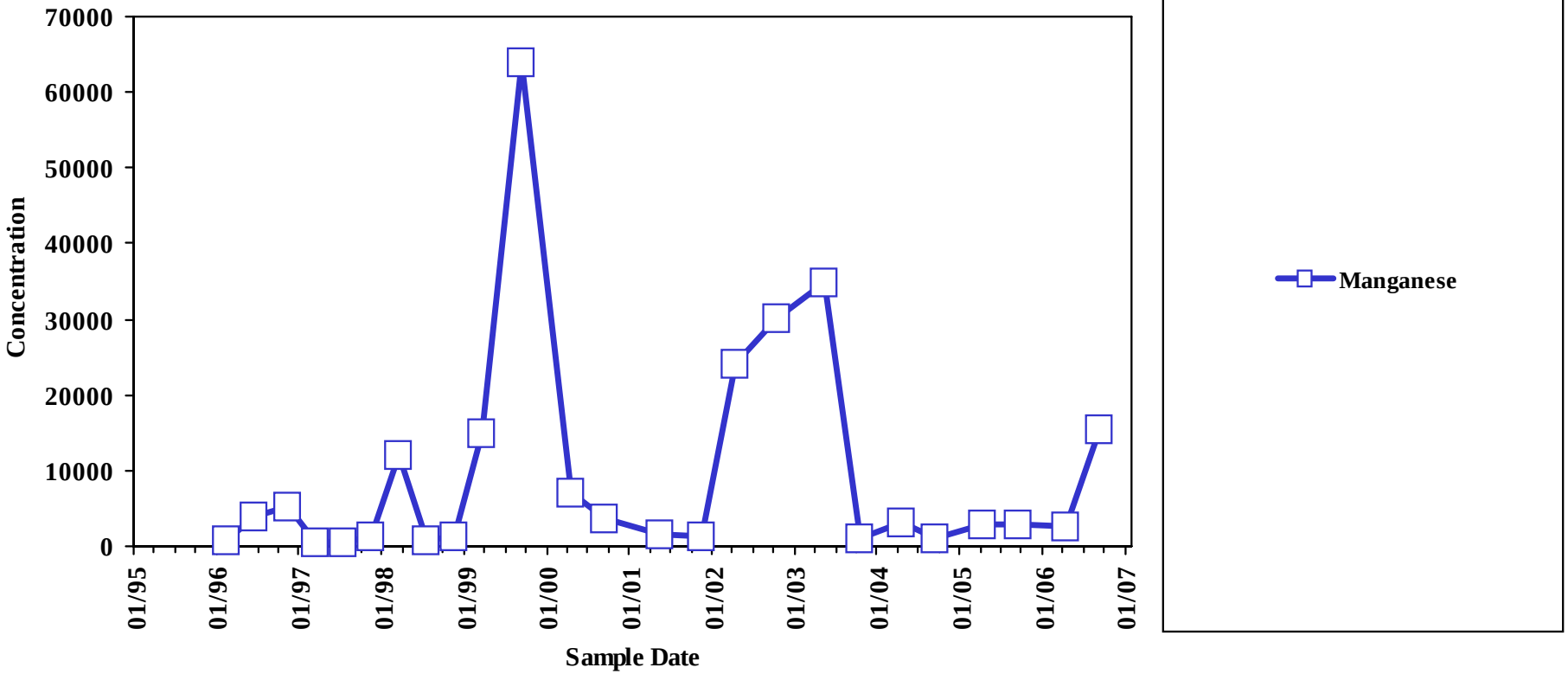
Zinc
--

Sample Location:

LT-03

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Manganese
	630

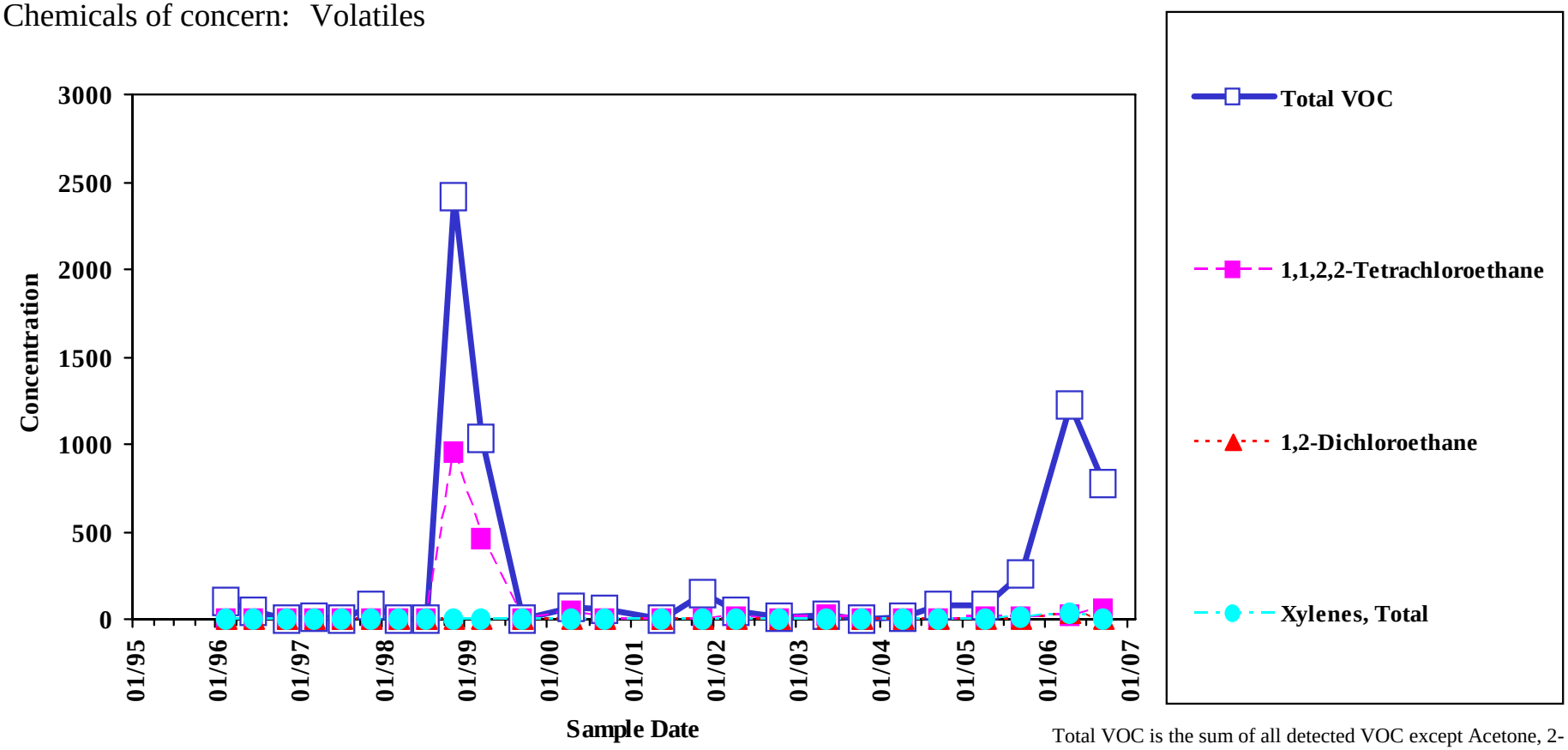
Sample Location:

LT-03

Sites 1 & 3

Sediment

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/Kg

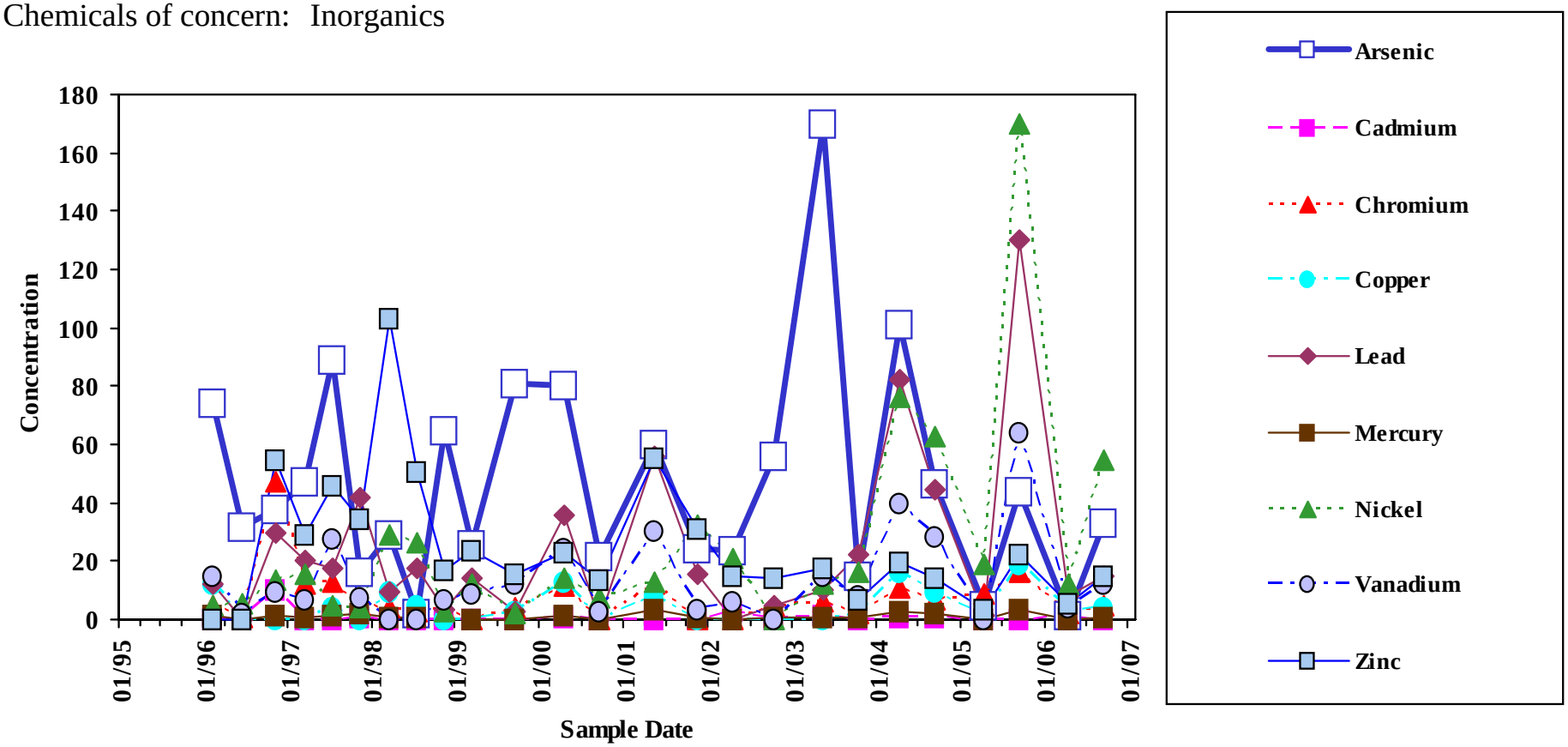
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,2-Dichloroethane	Xylenes, Total
	0.94	4.4	9.7

Sample Location:

LT-04

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

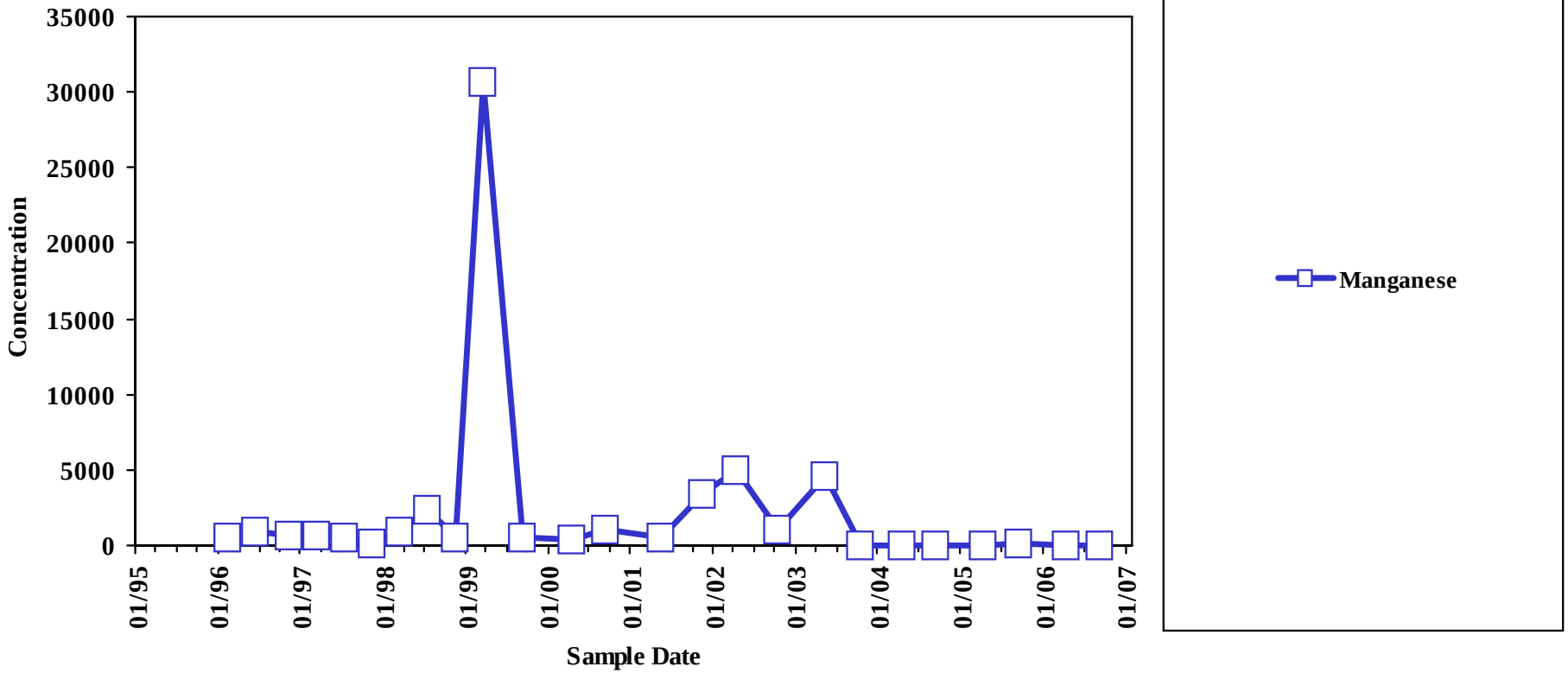
Zinc
--

Sample Location:

LT-04

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

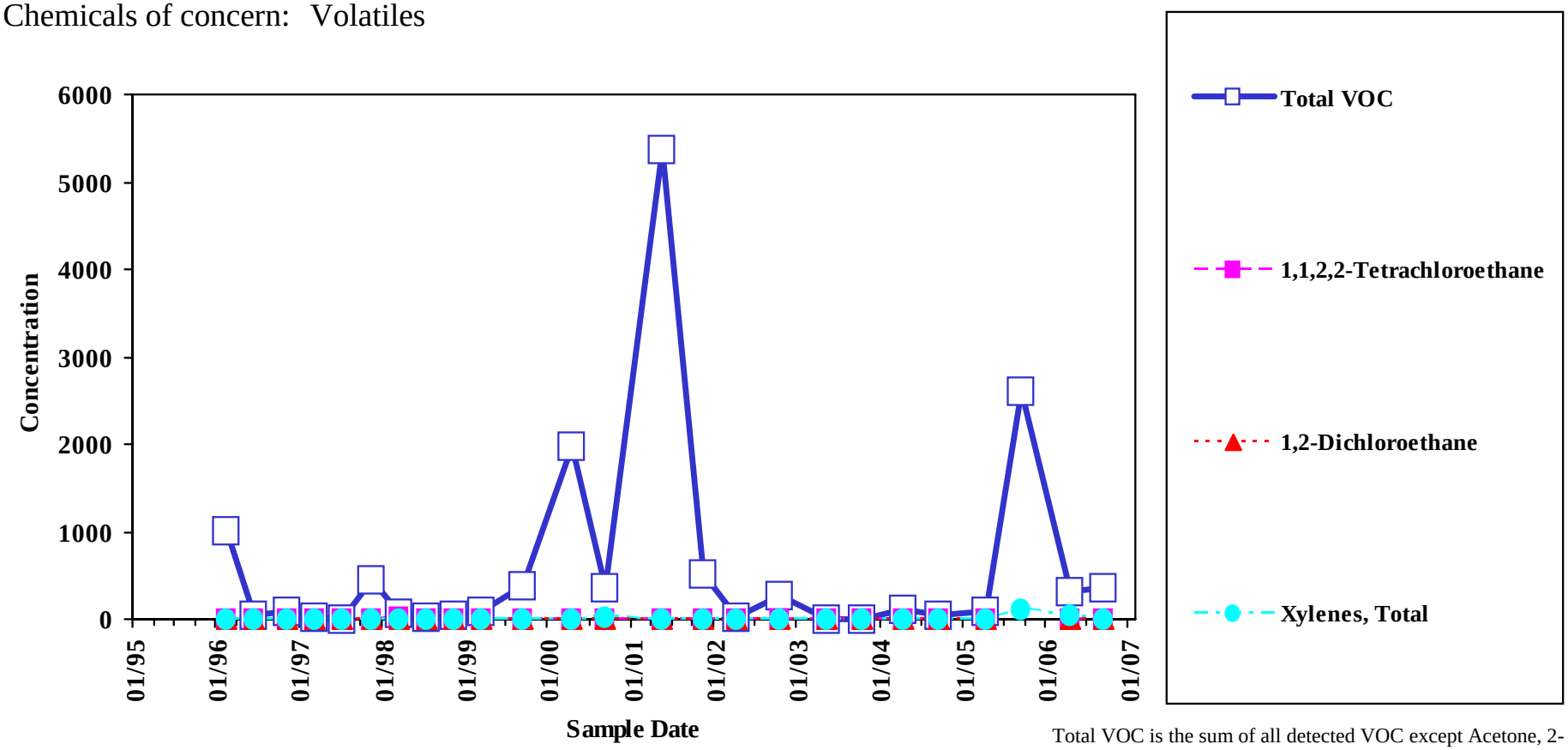
Clean-up Standard	Manganese
	630

Sample Location:

LT-04

Sites 1 & 3
Sediment

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/Kg

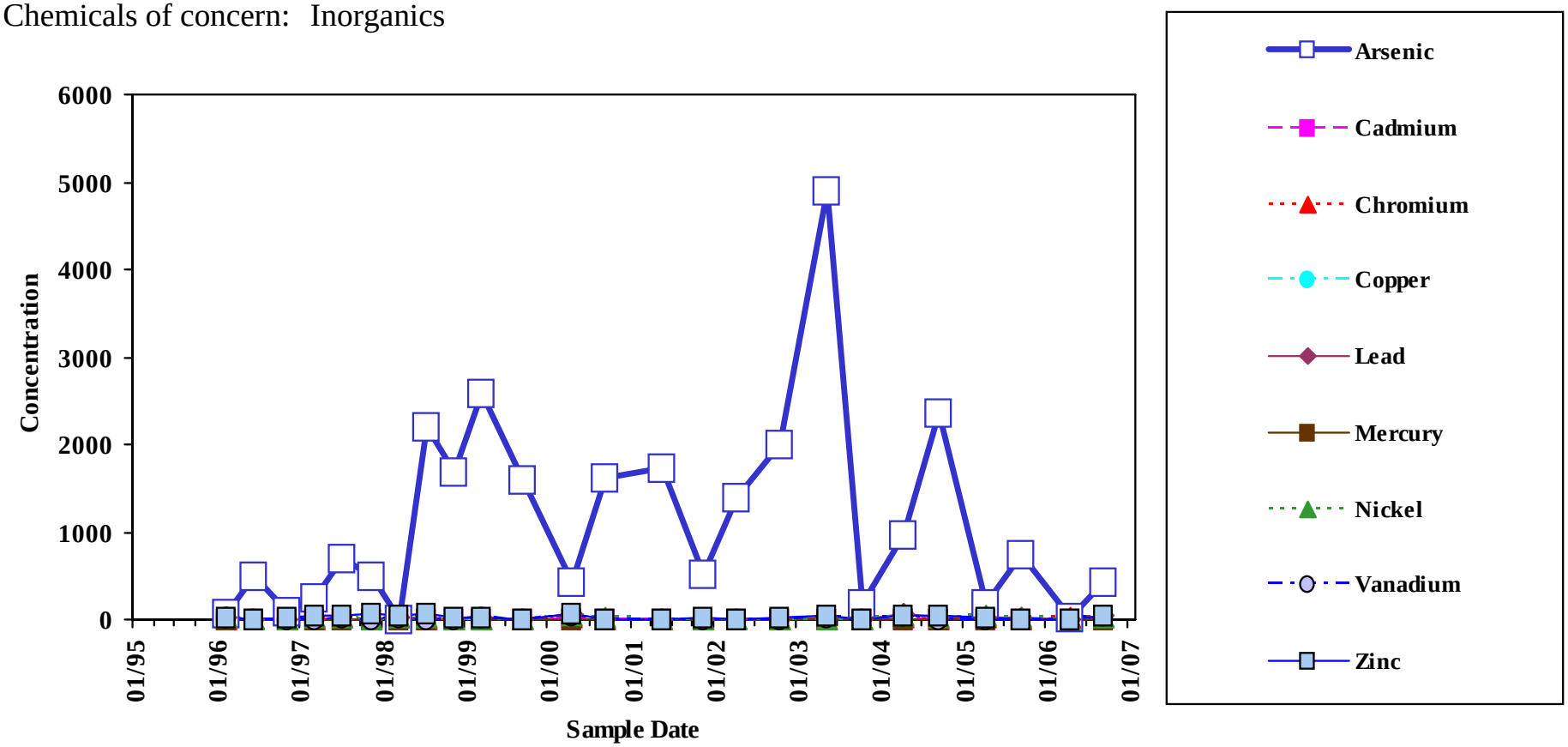
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,2-Dichloroethane	Xylenes, Total
	0.94	4.4	9.7

Sample Location:

LT-05

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

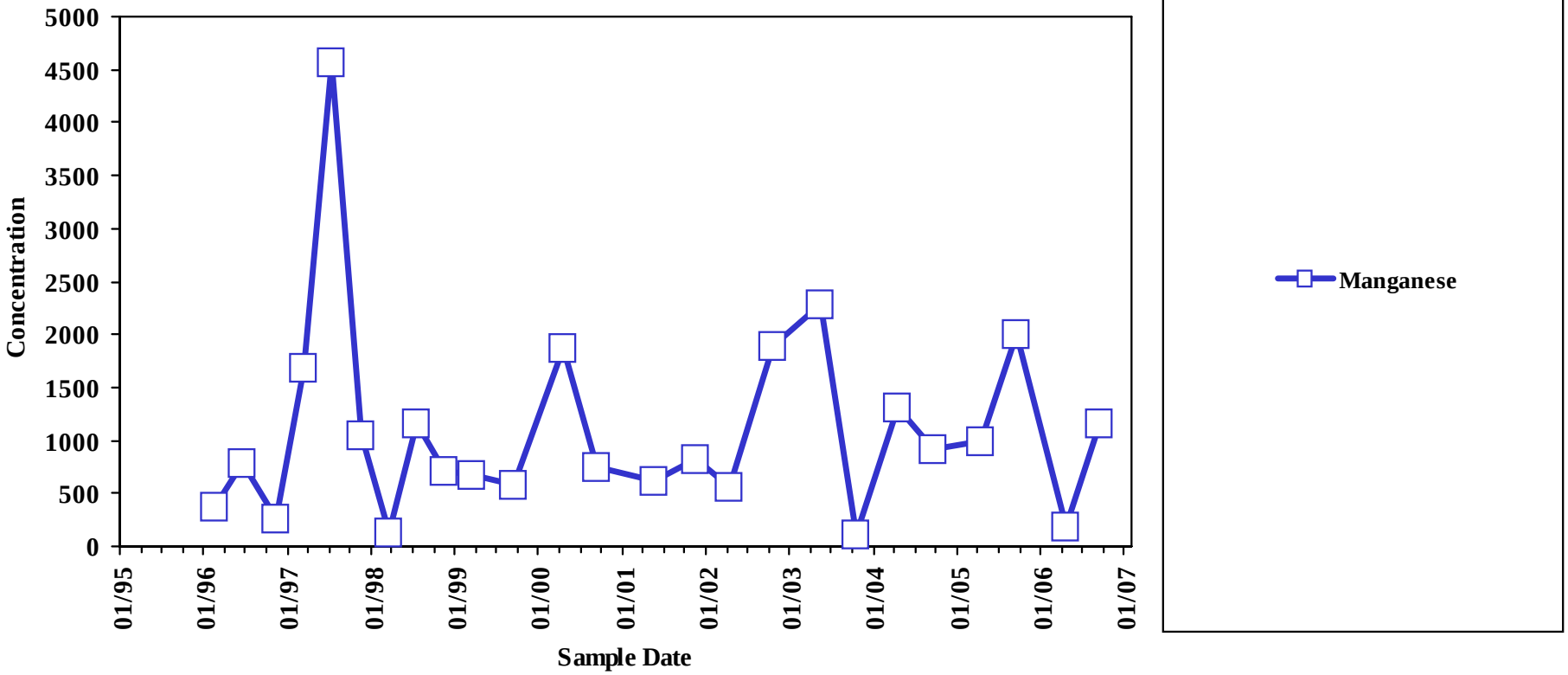
Zinc
--

Sample Location:

LT-05

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

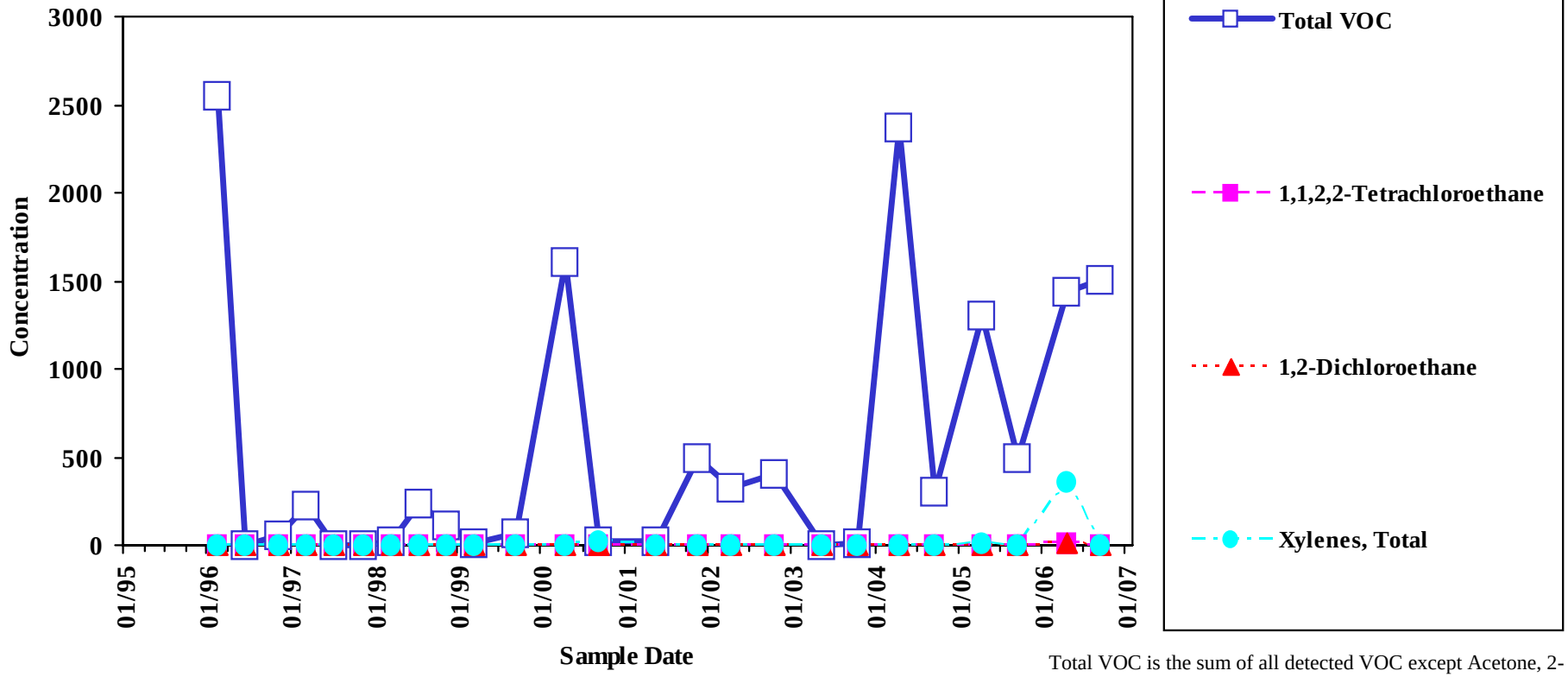
Clean-up Standard	Manganese
	630

Sample Location:

LT-05

Sites 1 & 3
Sediment

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/Kg

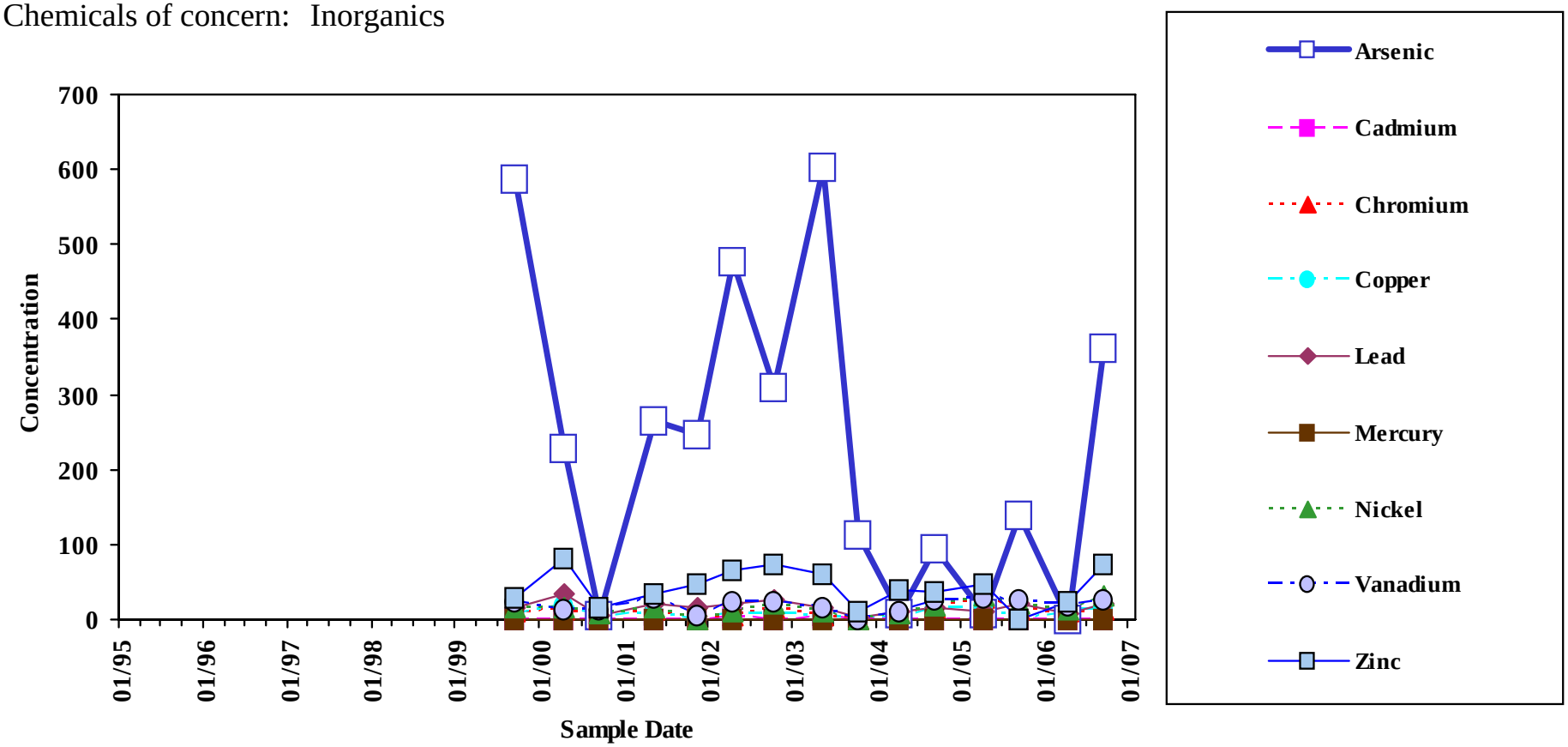
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,2-Dichloroethane	Xylenes, Total
	0.94	4.4	9.7

Sample Location:

LT-09

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

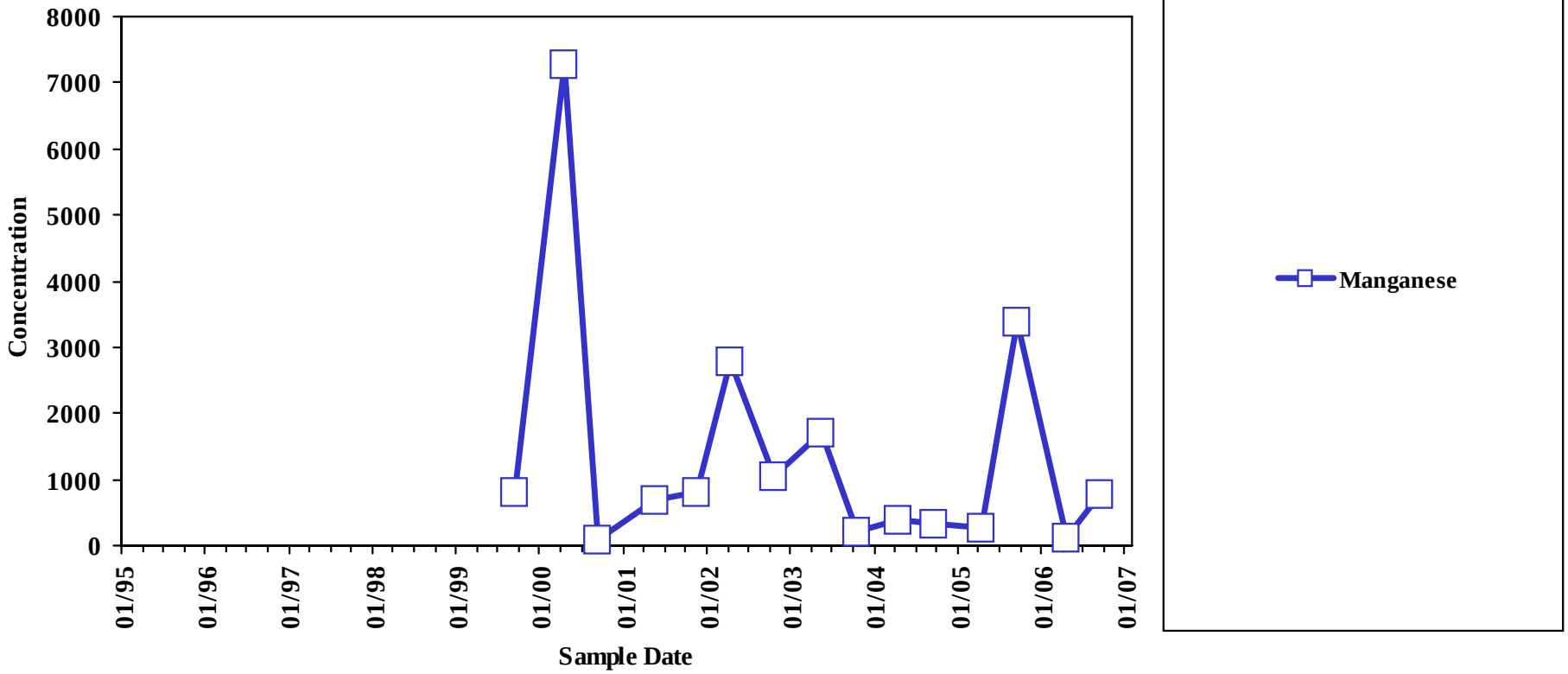
Zinc
--

Sample Location:

LT-09

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

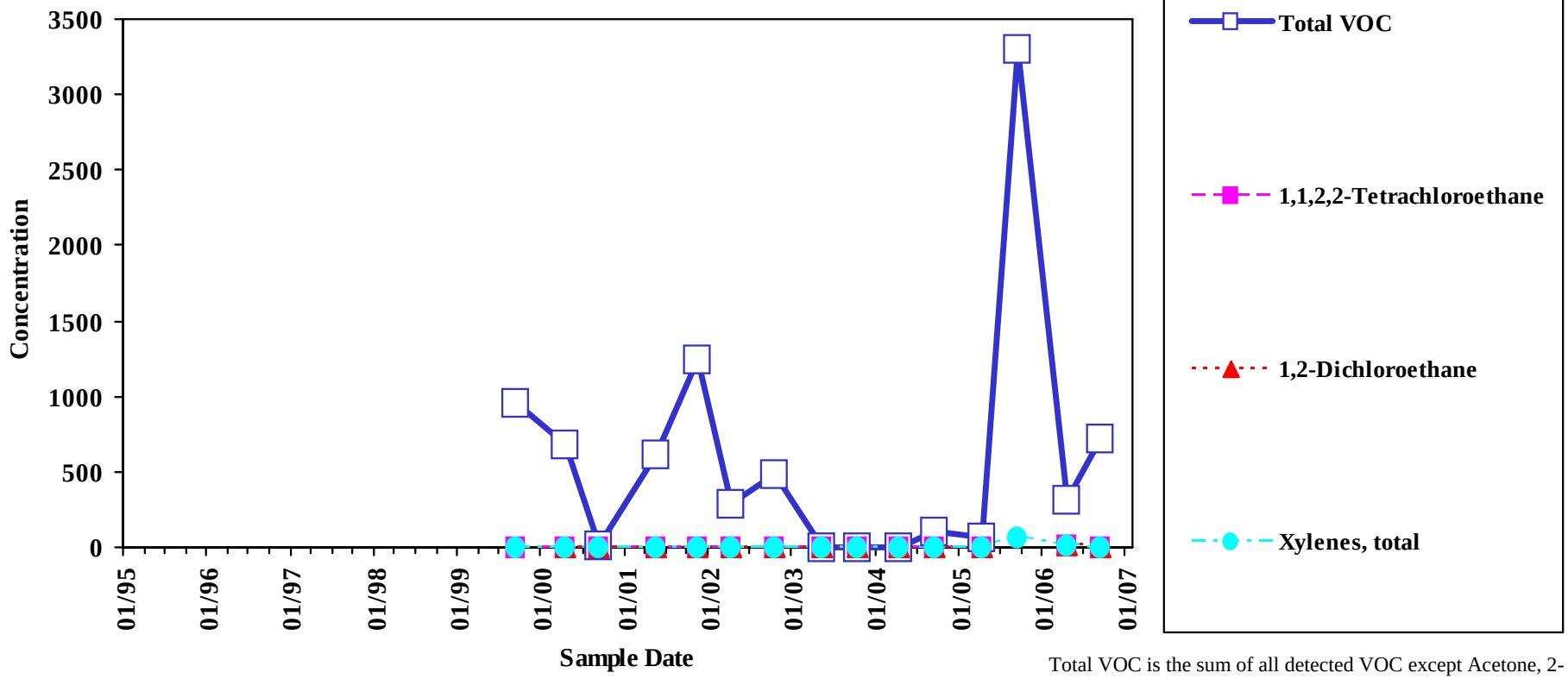
Clean-up Standard	Manganese
	630

Sample Location:

LT-09

Sites 1 & 3
Sediment

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/Kg

Clean-up Standard	1,1,2,2-Tetrachloroethane	1,2-Dichloroethane	Xylenes, Total
	0.94	4.4	9.7

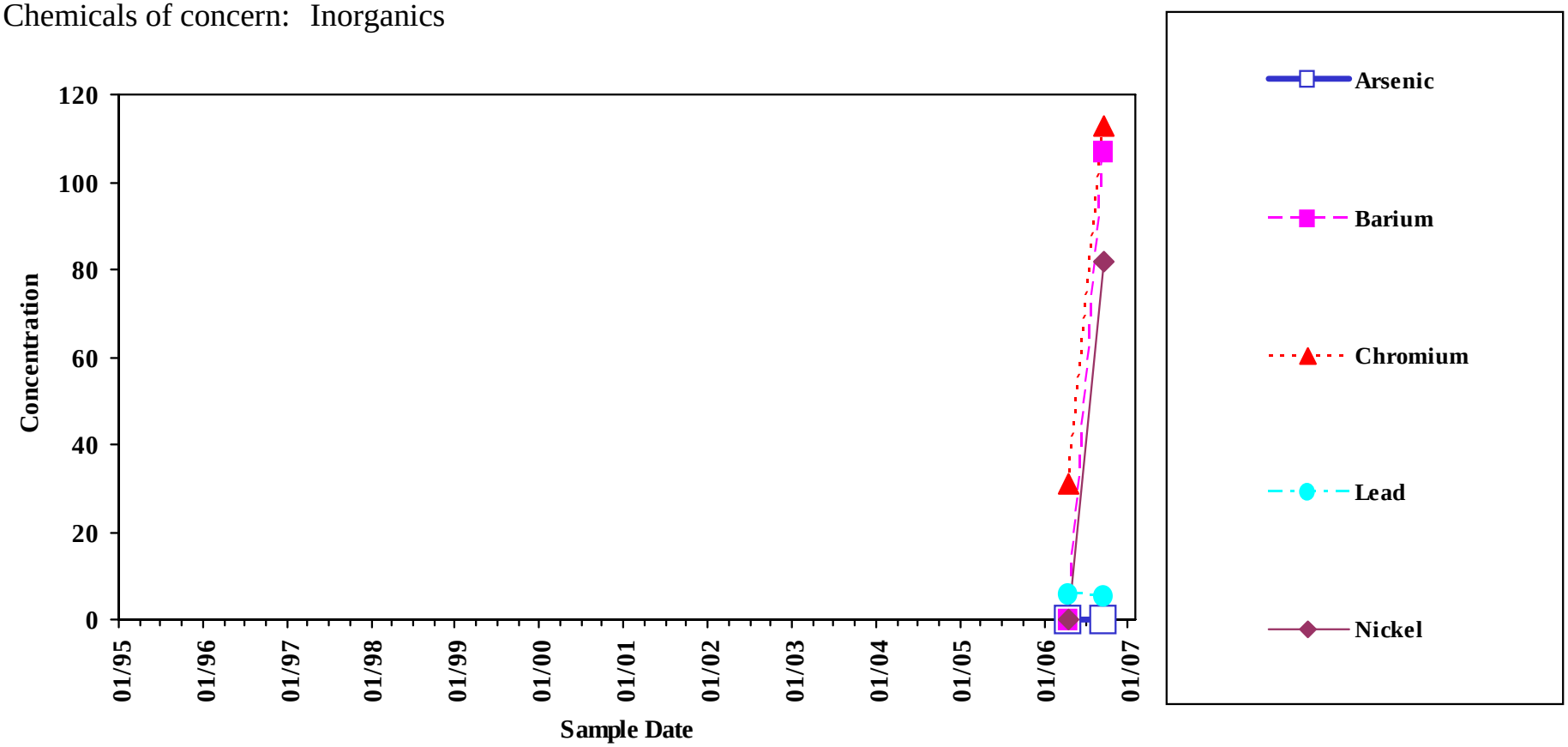
Sample Location:

MW-1301D

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

MCL	Arsenic	Barium
	10	2000

Chromium	Lead	Nickel
100	15	--

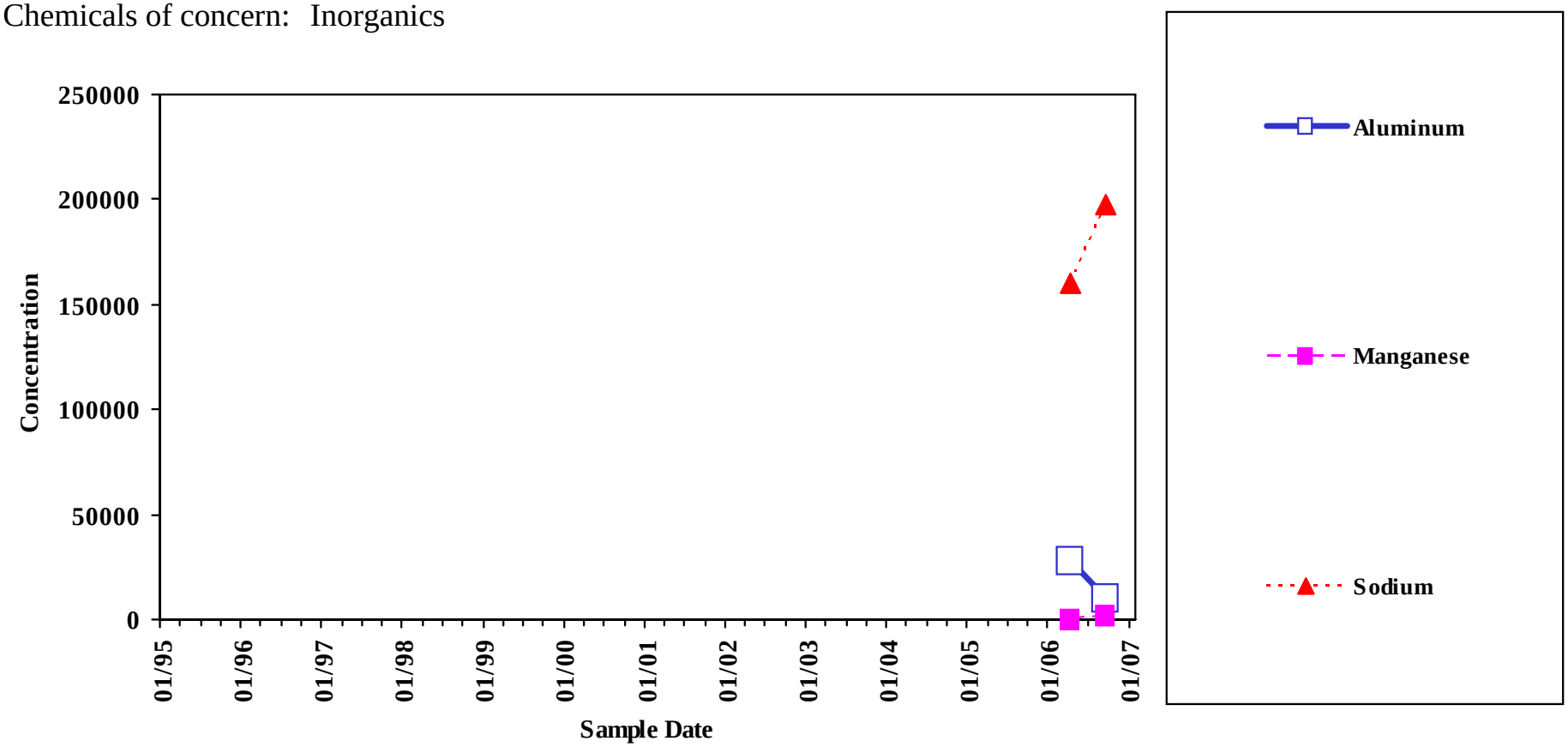
Sample Location:

MW-1301D

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

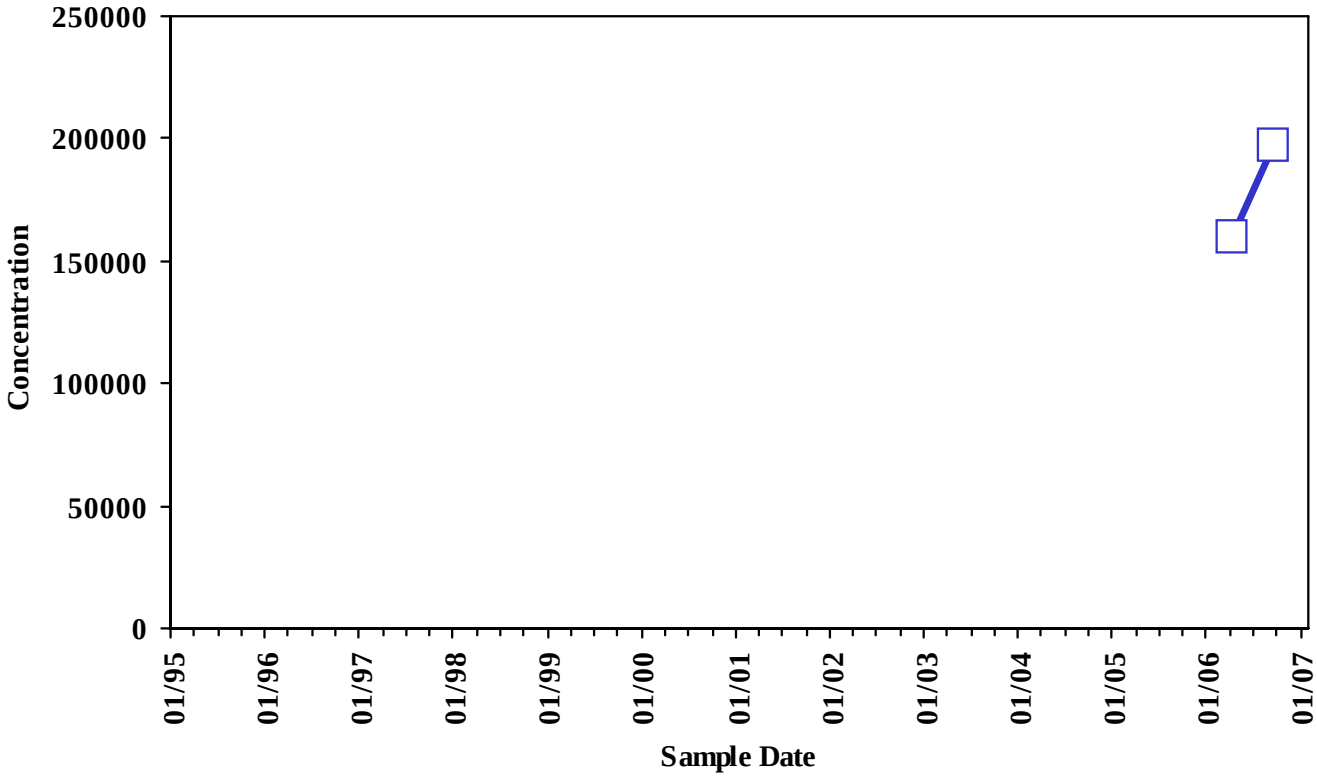
Sample Location:

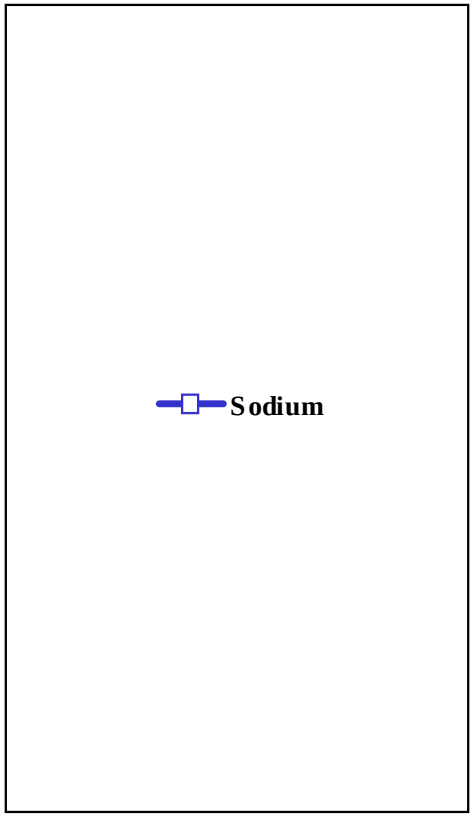
MW-1301D

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics





Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Sodium	MCL	Sodium
	20000		--

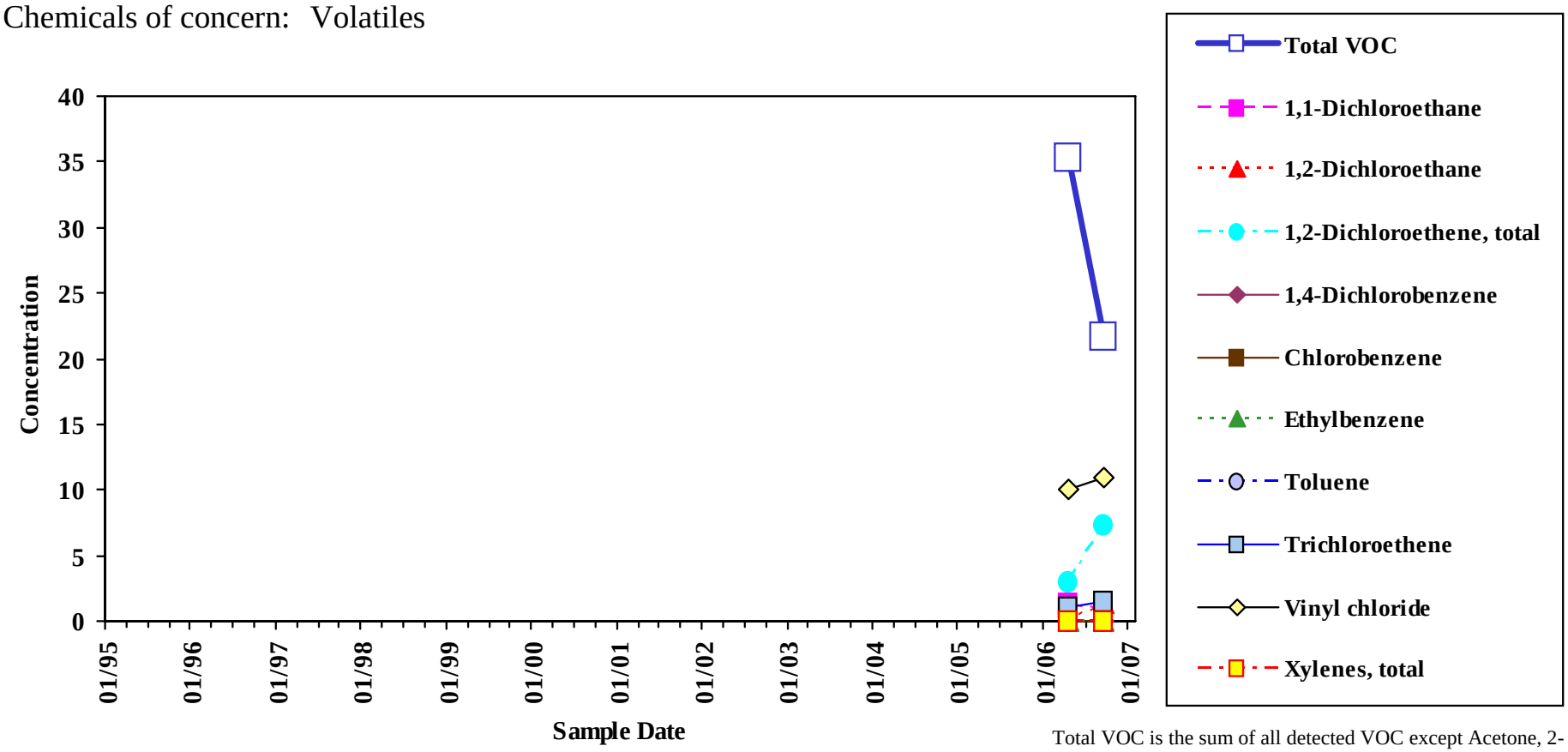
Sample Location:

MW-1301D

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/l

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

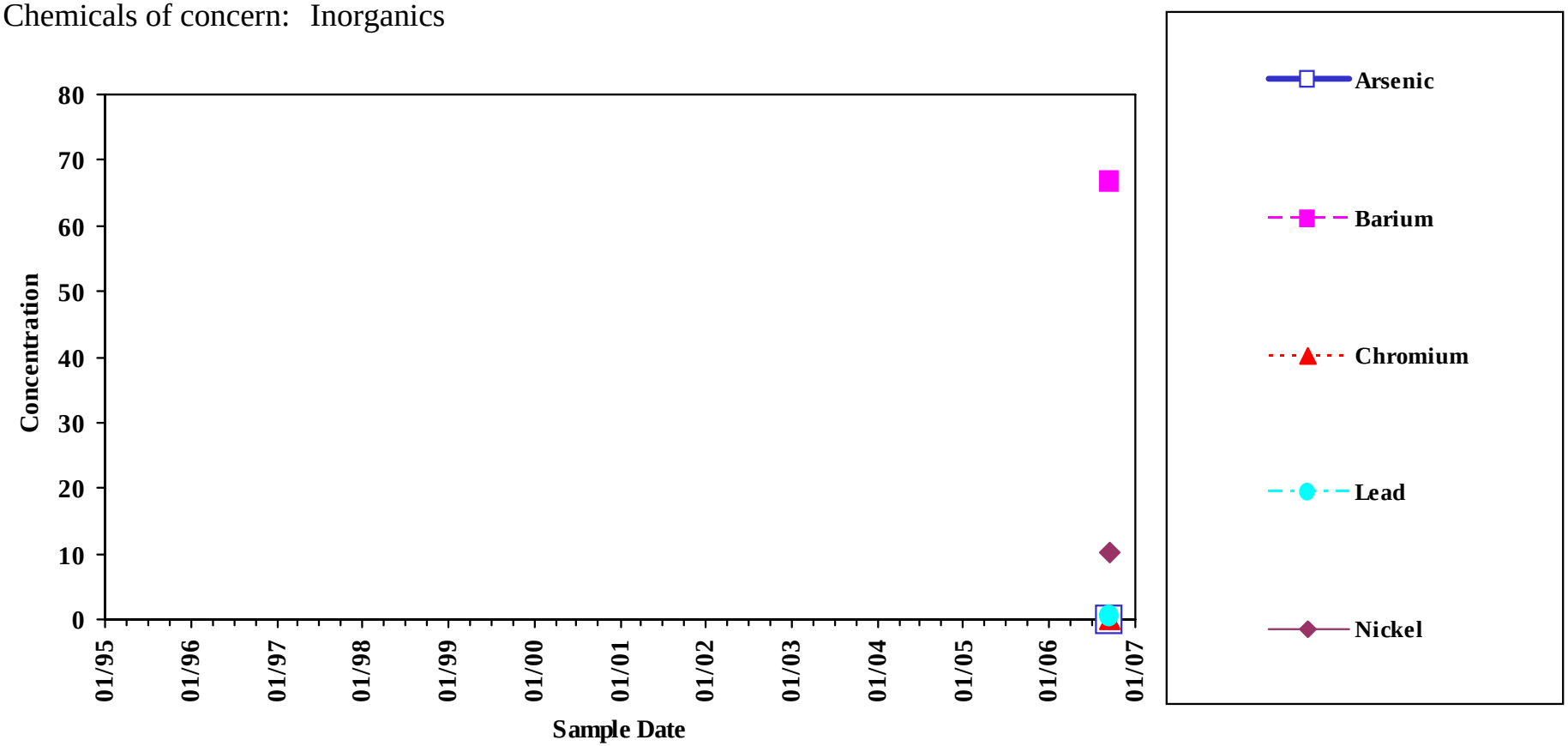
Sample Location:

MW-1301S

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

Chromium	Lead	Nickel
100	15	--

MCL	Arsenic	Barium
	10	2000

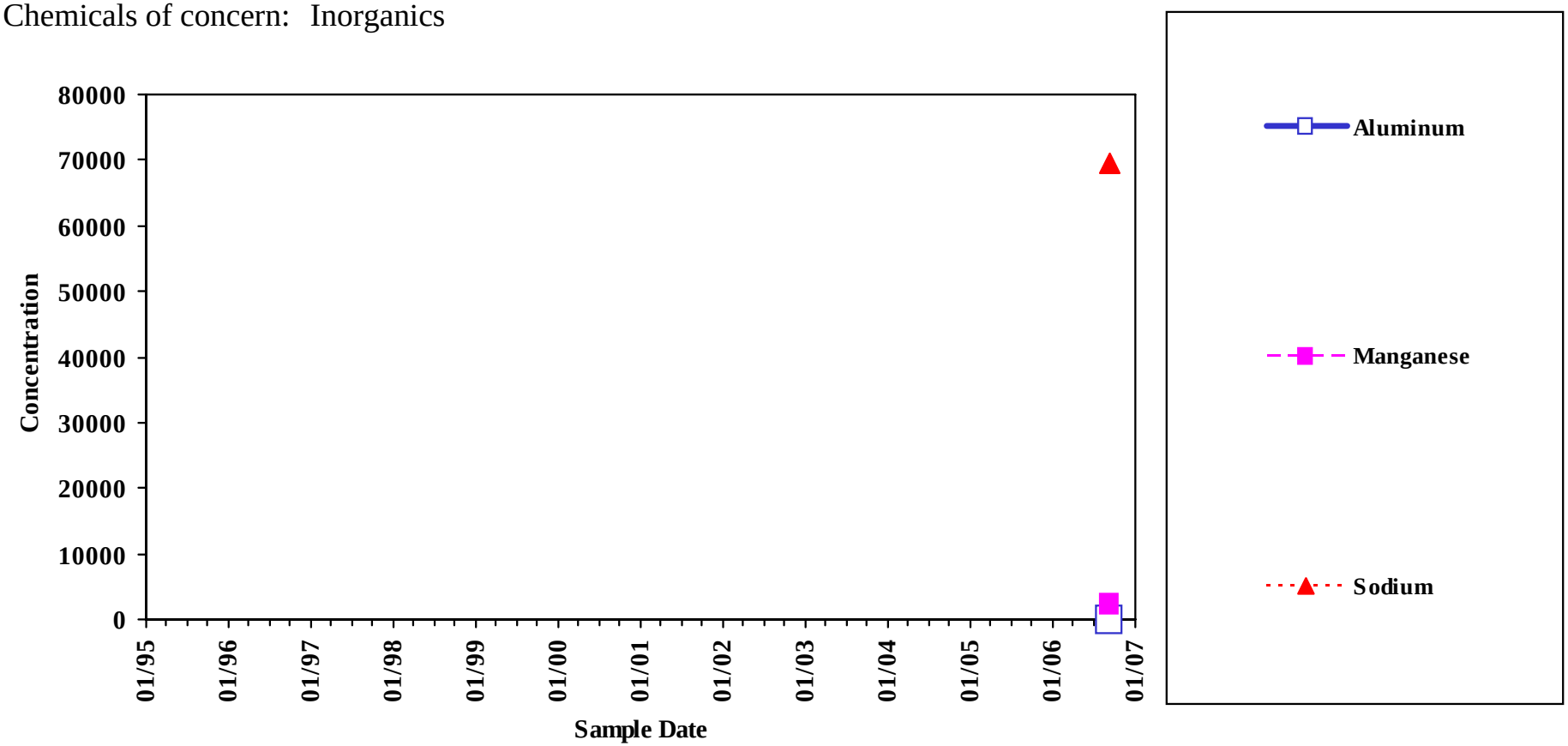
Sample Location:

MW-1301S

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

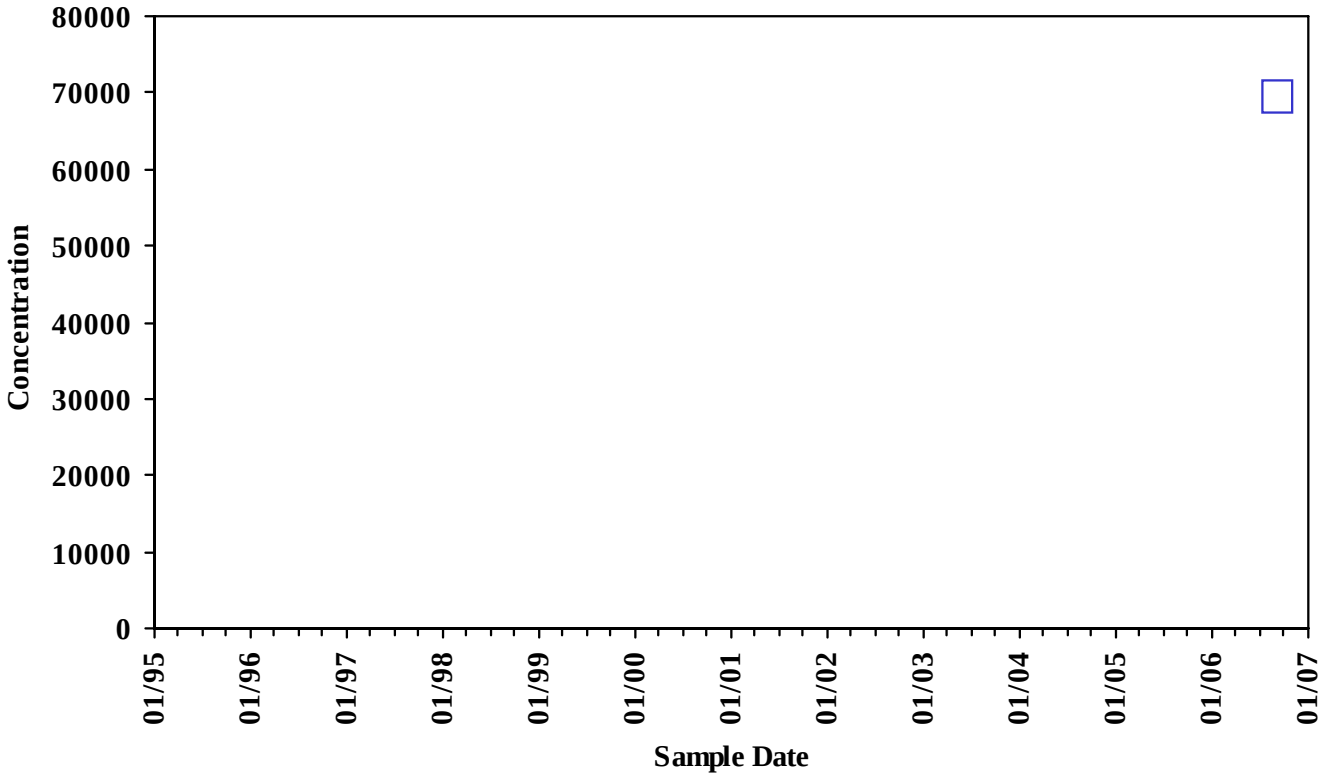
Sample Location:

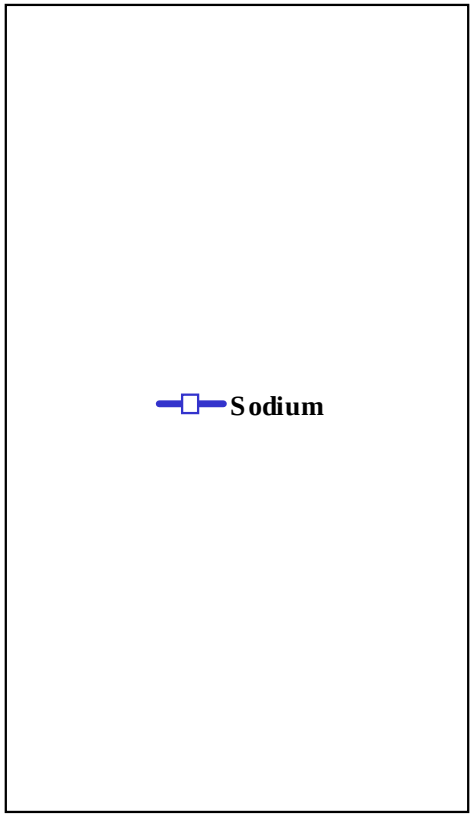
MW-1301S

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics





Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Sodium	MCL	Sodium
	20000		--

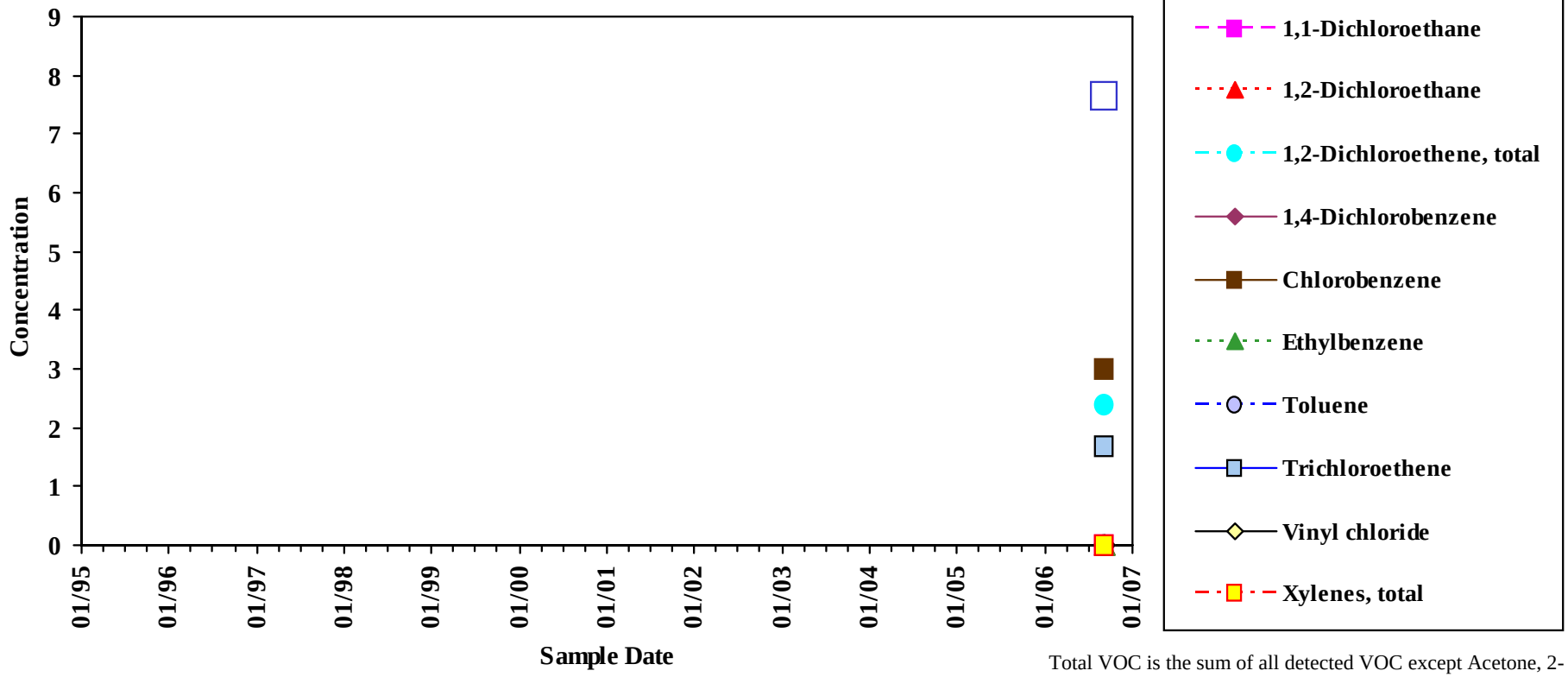
Sample Location:

MW-1301S

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/l

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

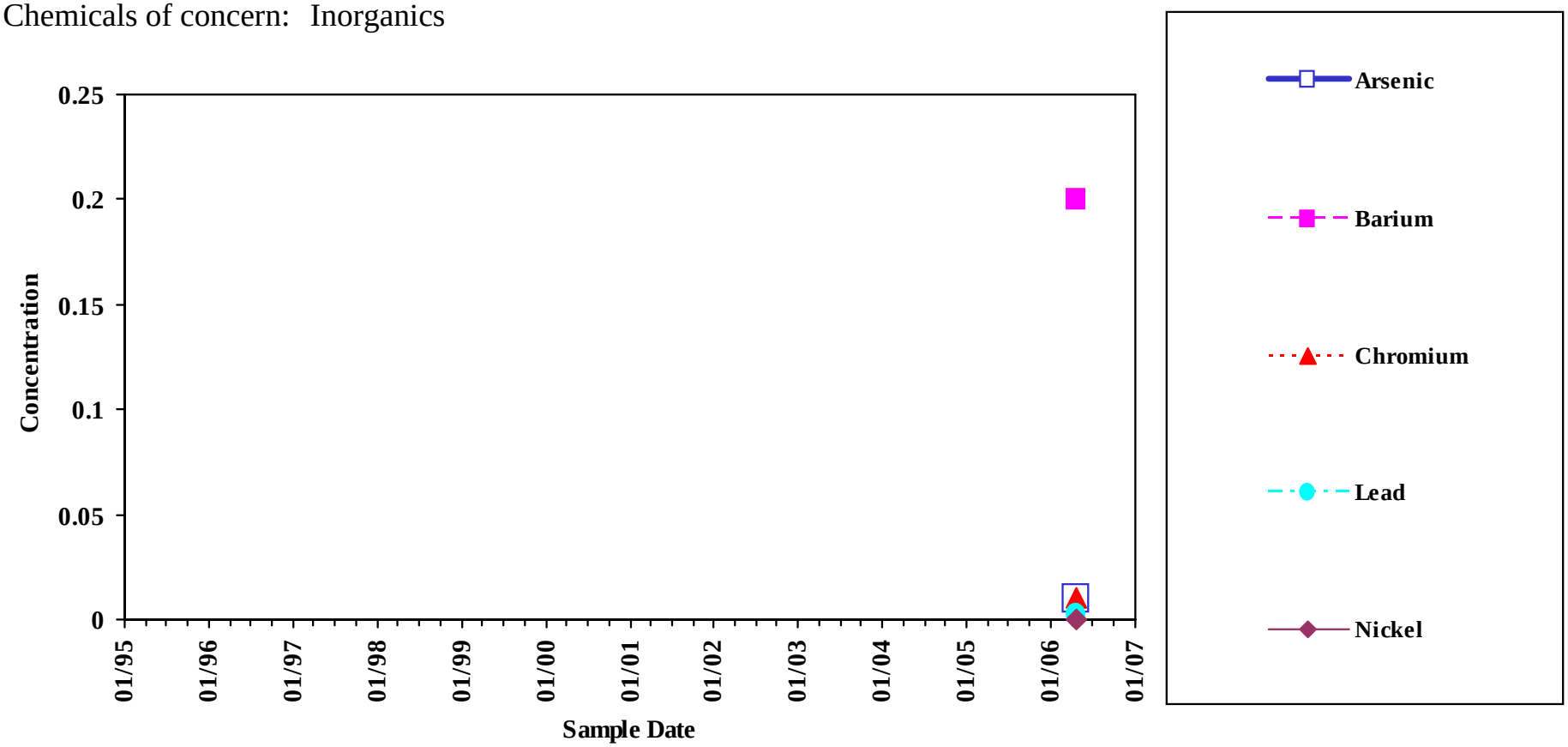
Sample Location:

MW-1302

Shallow Diffusion Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

MCL	Arsenic	Barium
	10	2000

Chromium	Lead	Nickel
100	15	--

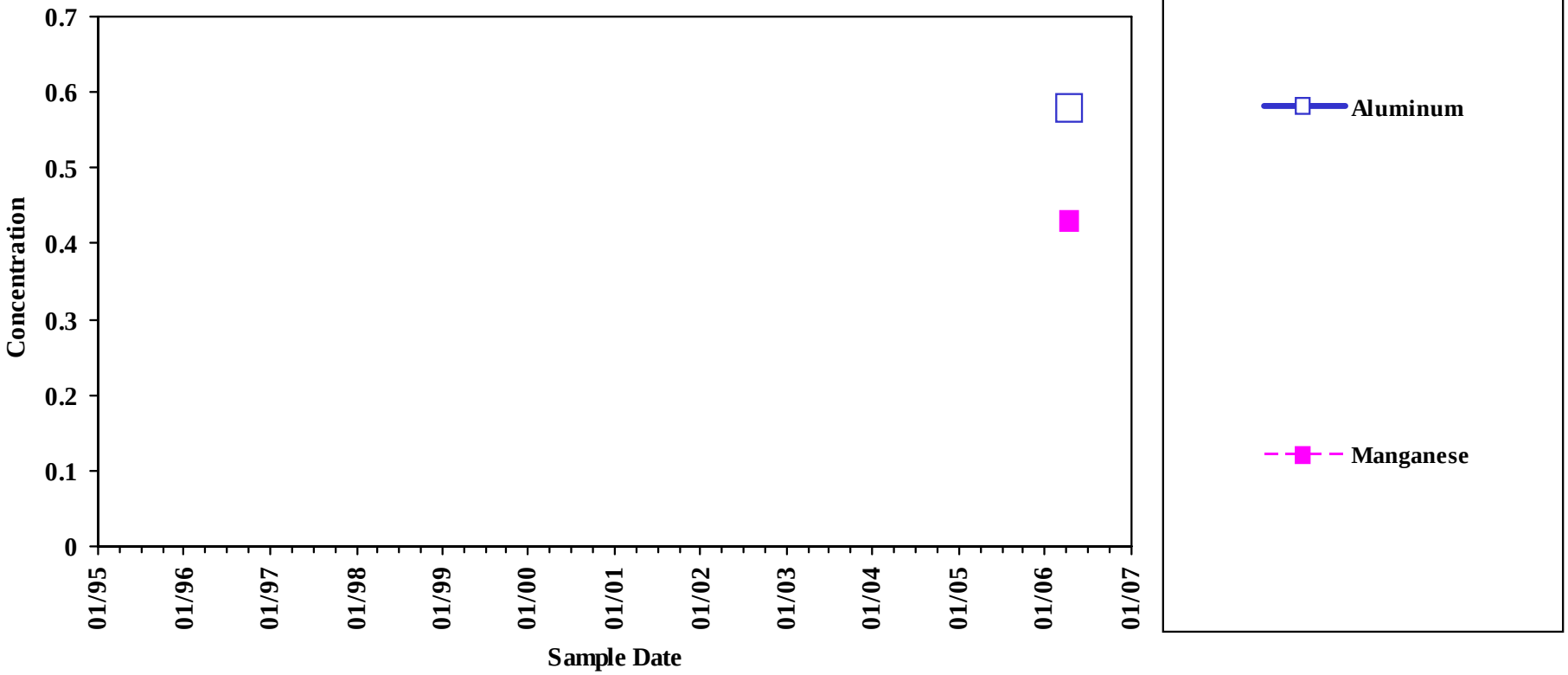
Sample Location:

MW-1302

Shallow Diffusion Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

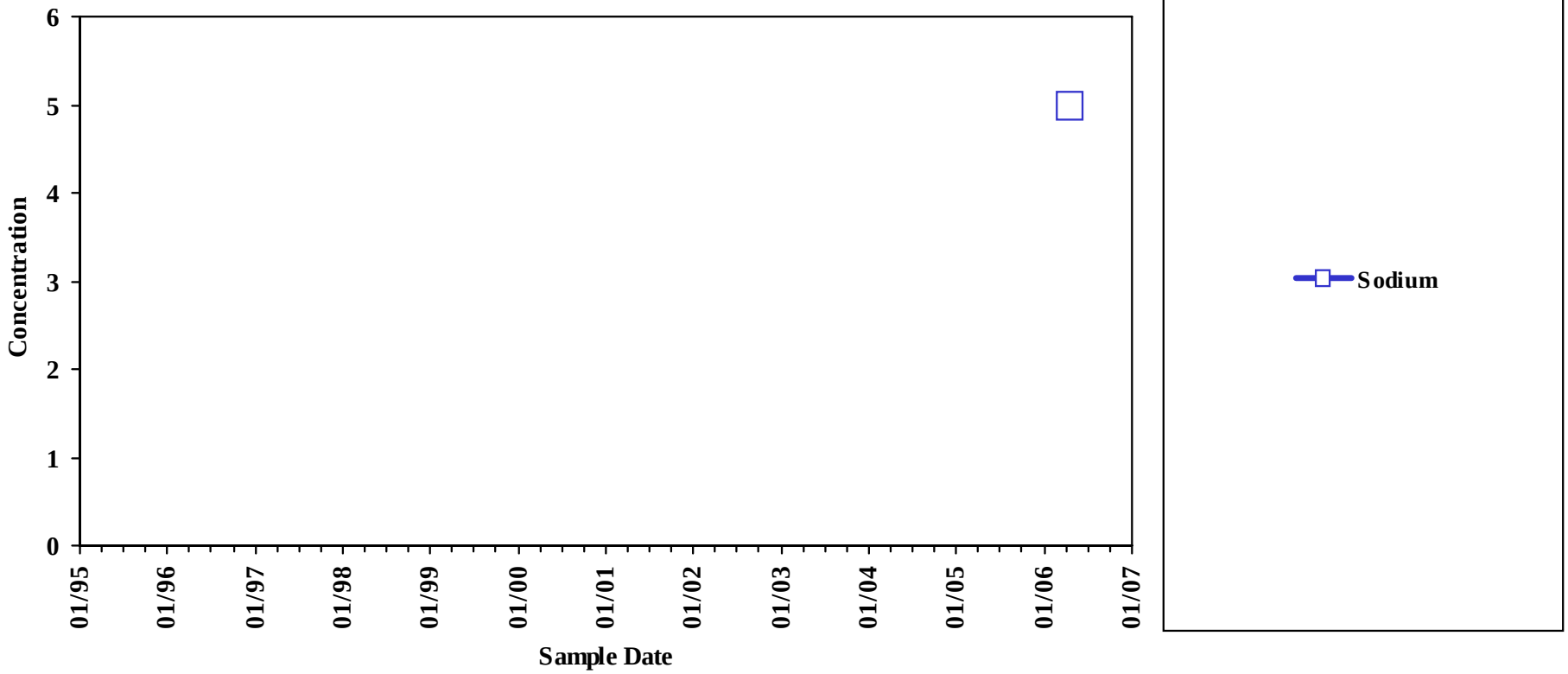
Sample Location:

MW-1302

Shallow Diffusion Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Sodium	MCL	Sodium
	20000		--

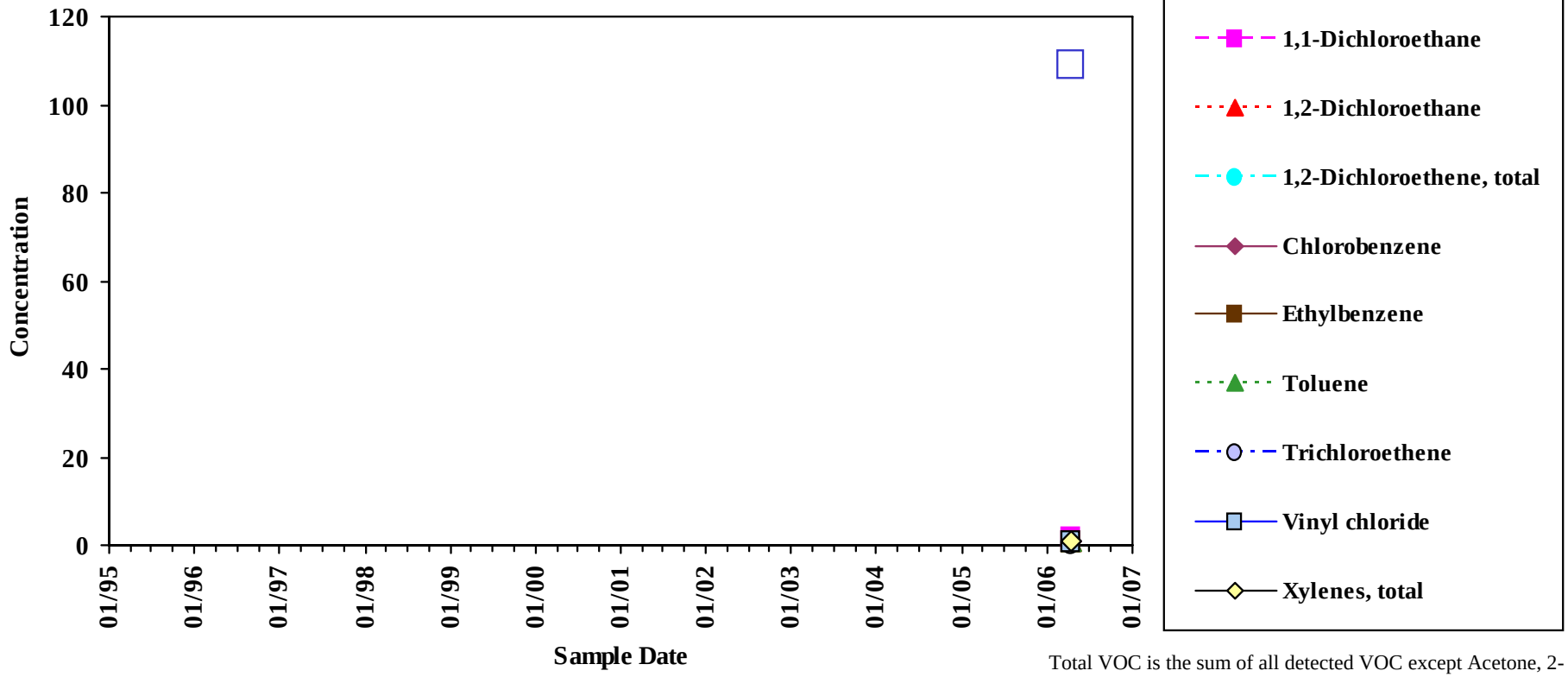
Sample Location:

MW-1302

Shallow Diffusion Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

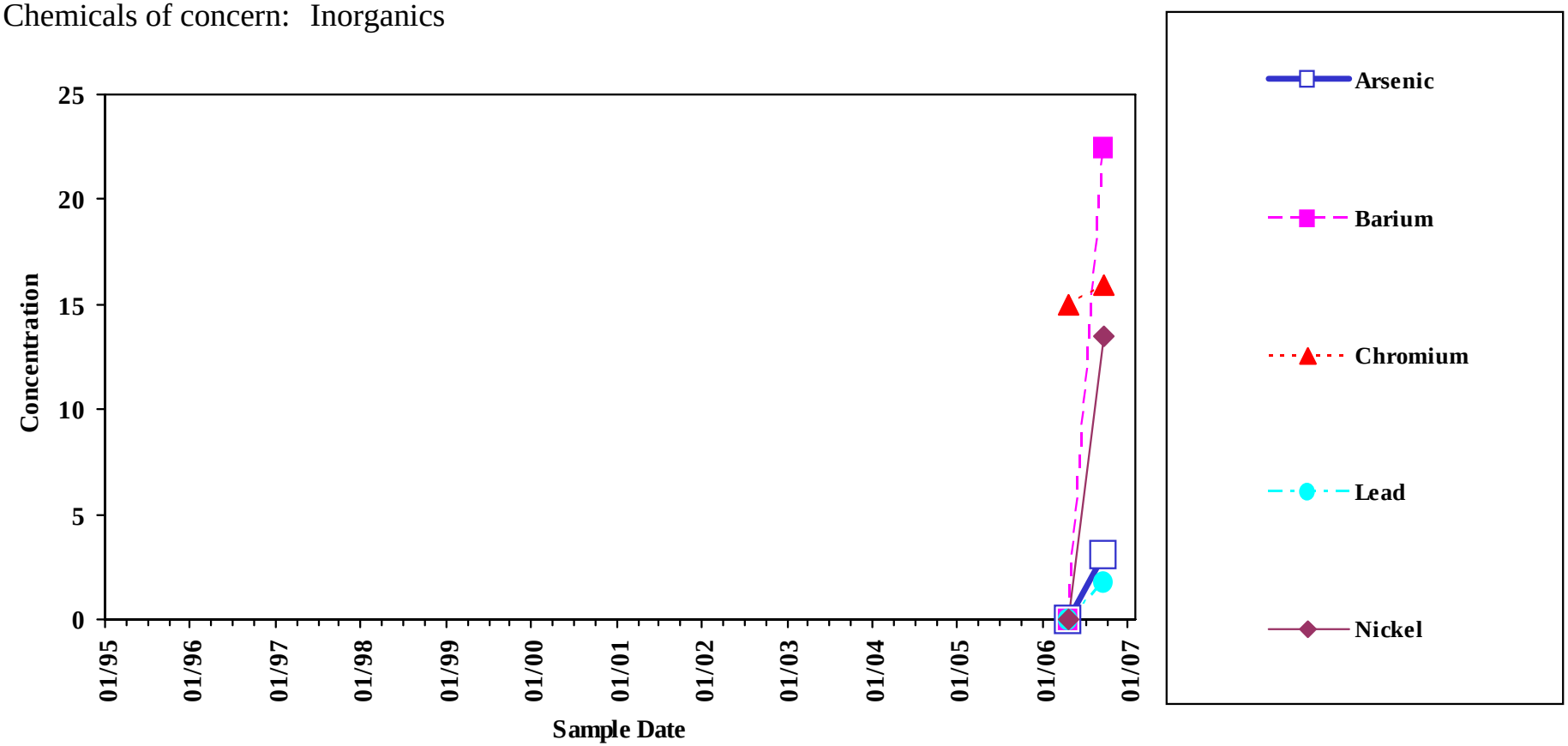
Sample Location:

MW-1302D

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

Chromium	Lead	Nickel
100	15	--

MCL	Arsenic	Barium
	10	2000

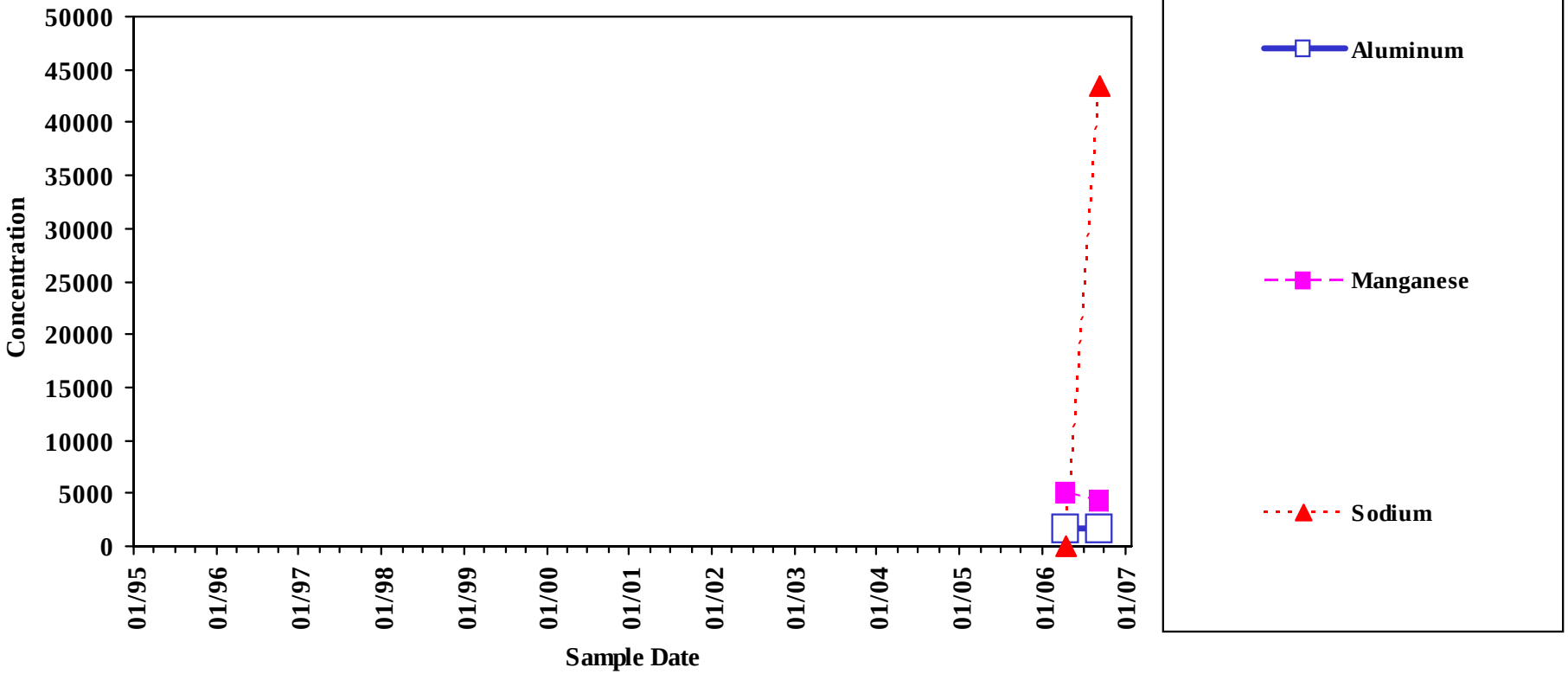
Sample Location:

MW-1302D

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

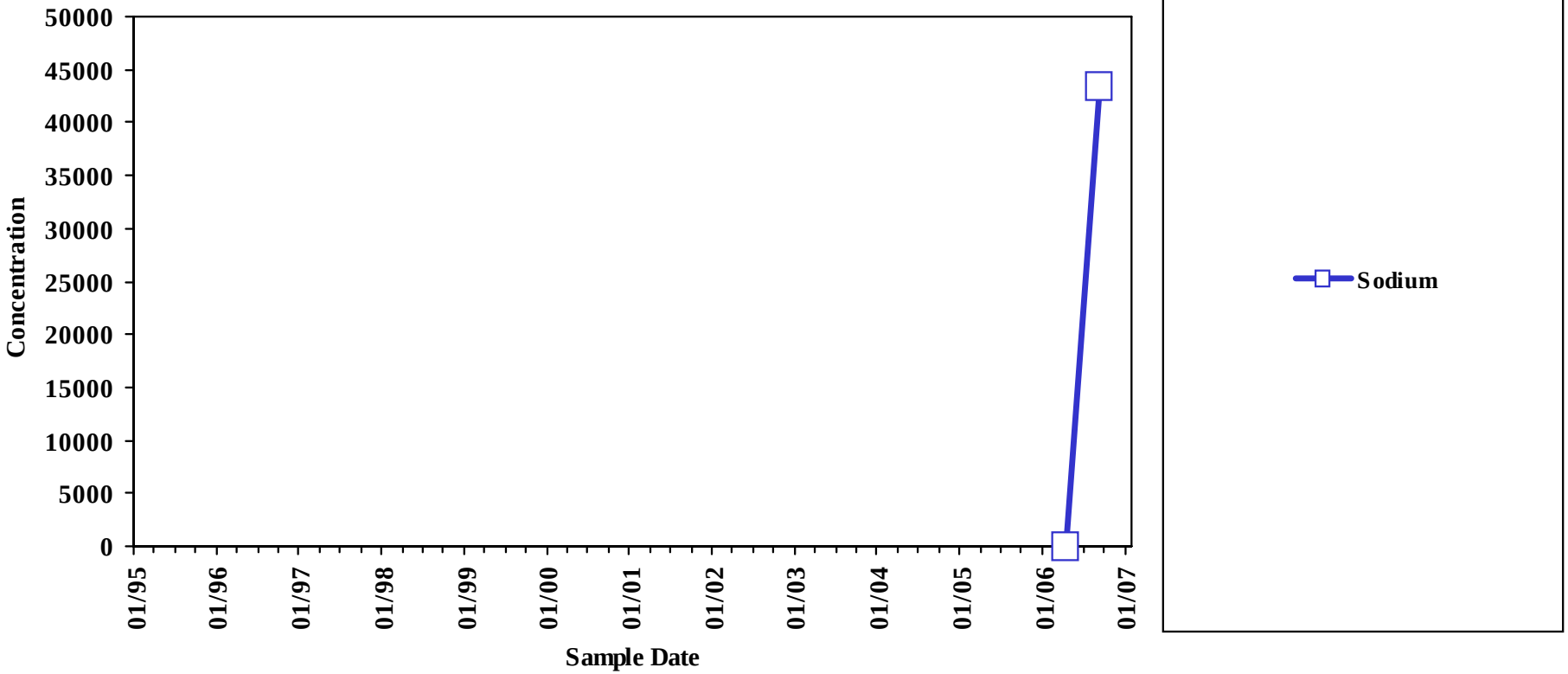
Sample Location:

MW-1302D

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Sodium	MCL	Sodium
	20000		--

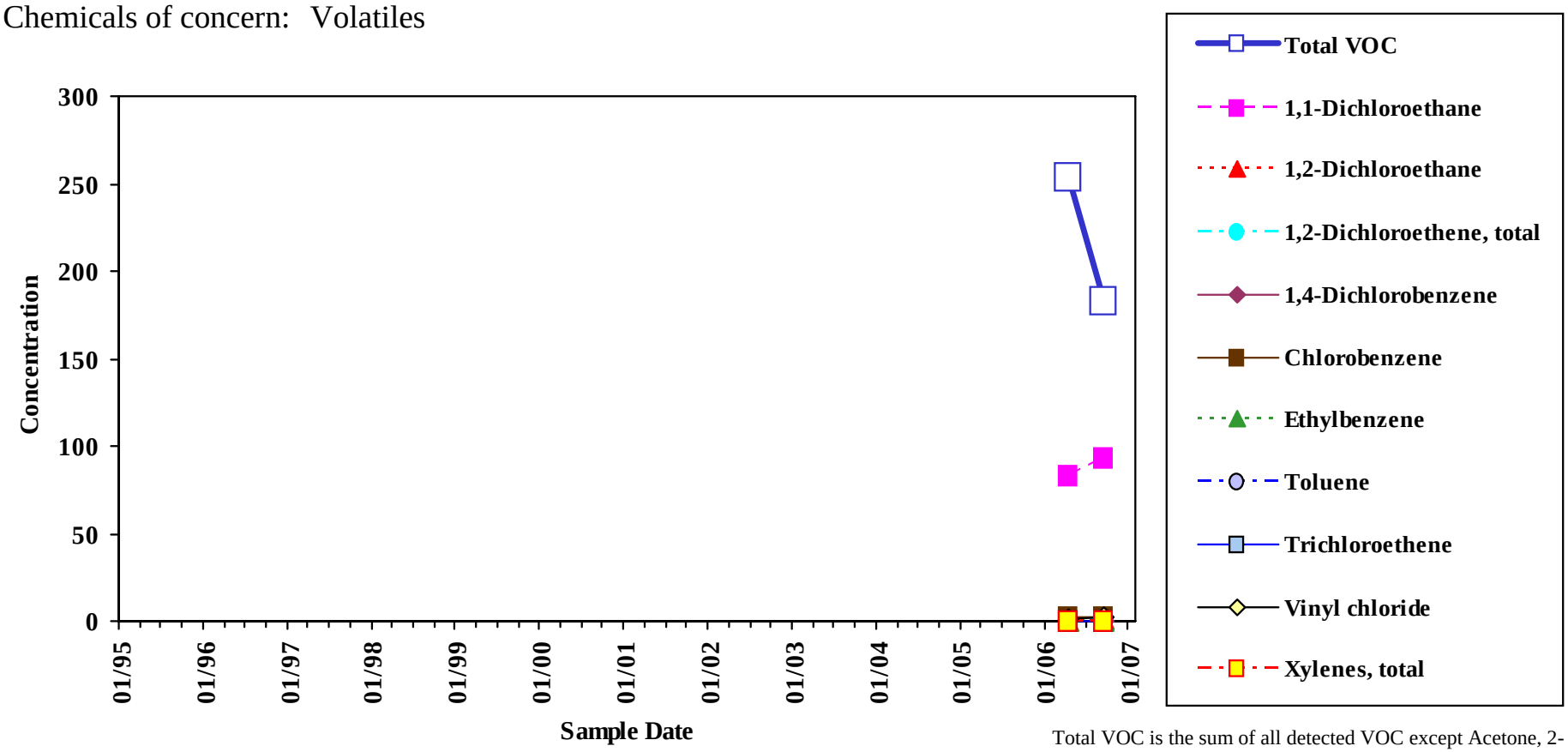
Sample Location:

MW-1302D

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/l

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

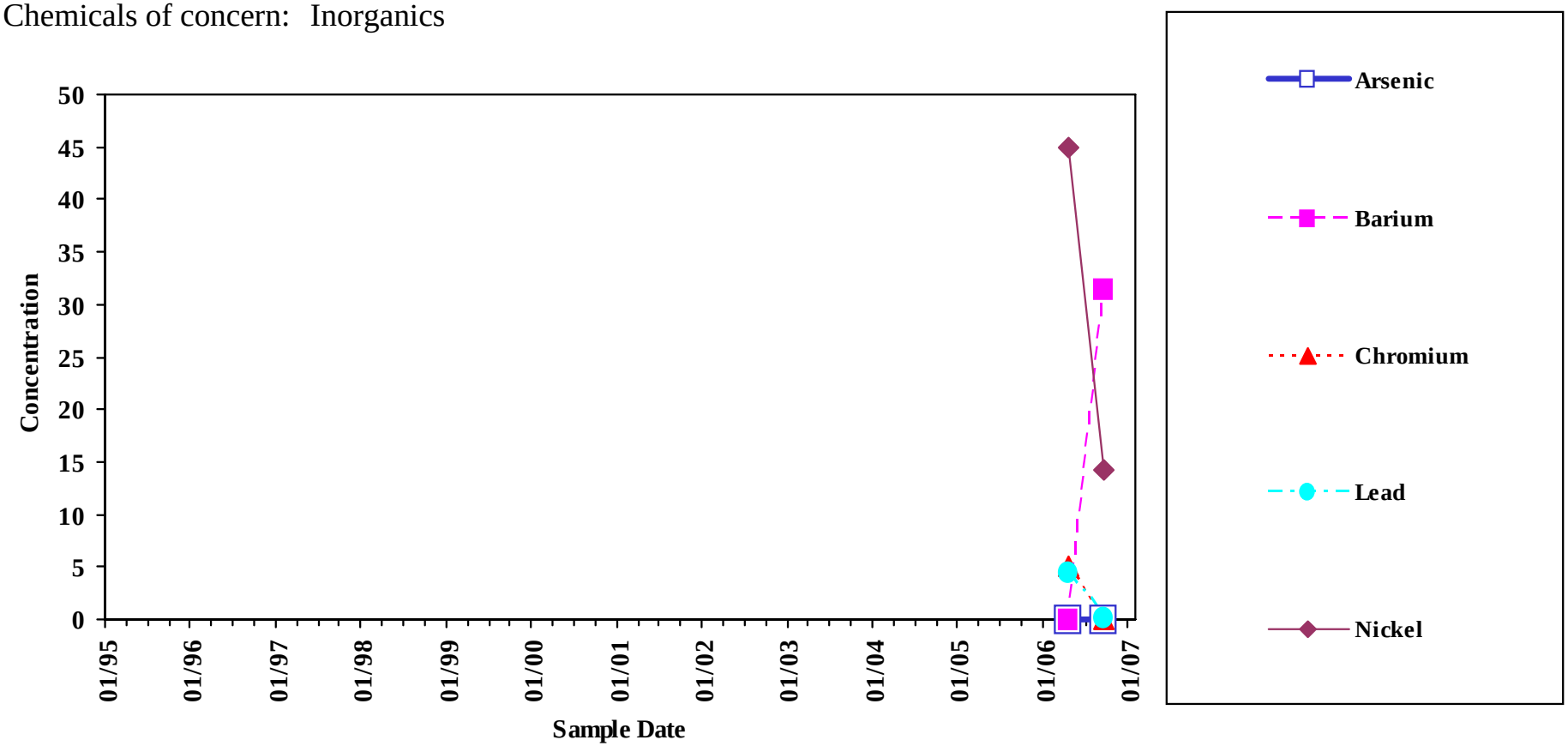
Sample Location:

MW-1302S

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

Chromium	Lead	Nickel
100	15	--

MCL	Arsenic	Barium
	10	2000

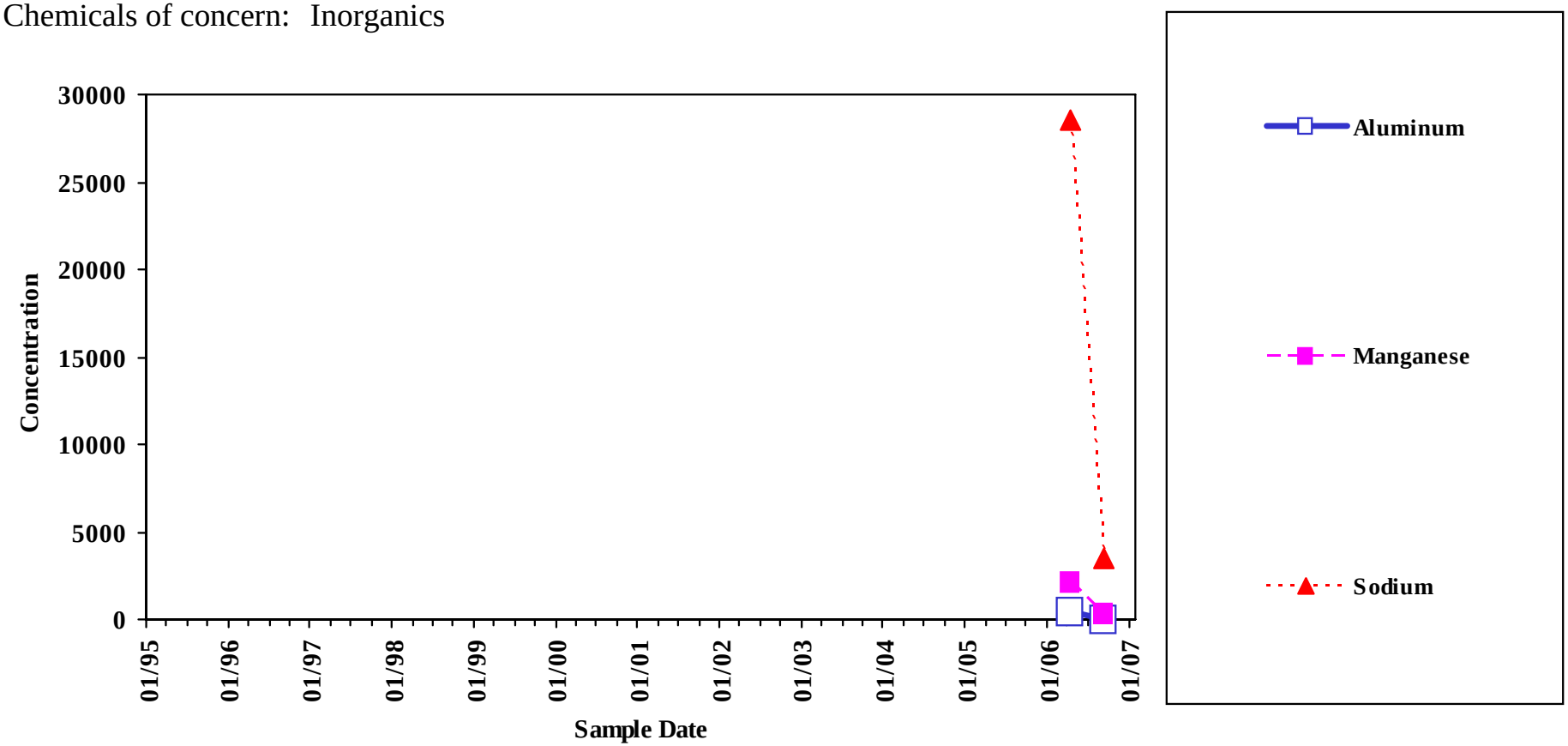
Sample Location:

MW-1302S

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

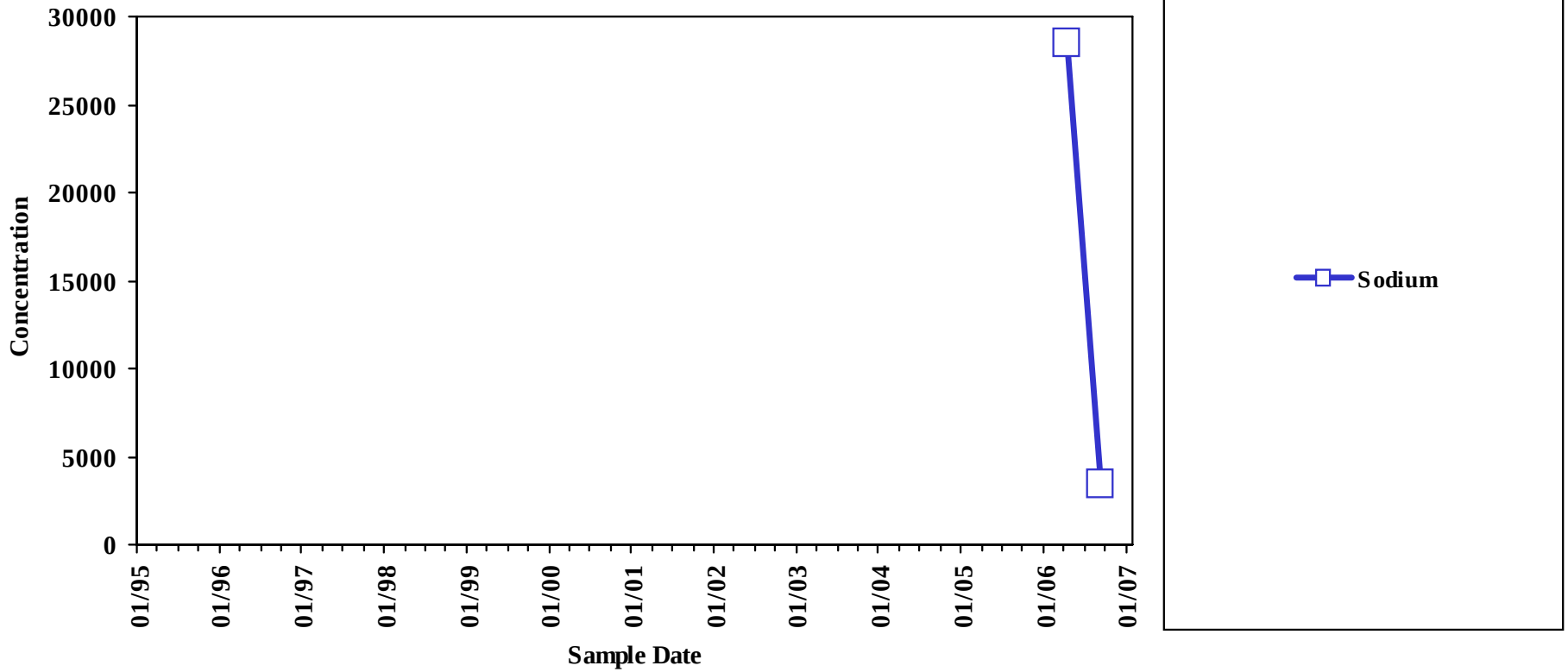
Sample Location:

MW-1302S

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Sodium	MCL	Sodium
	20000		--

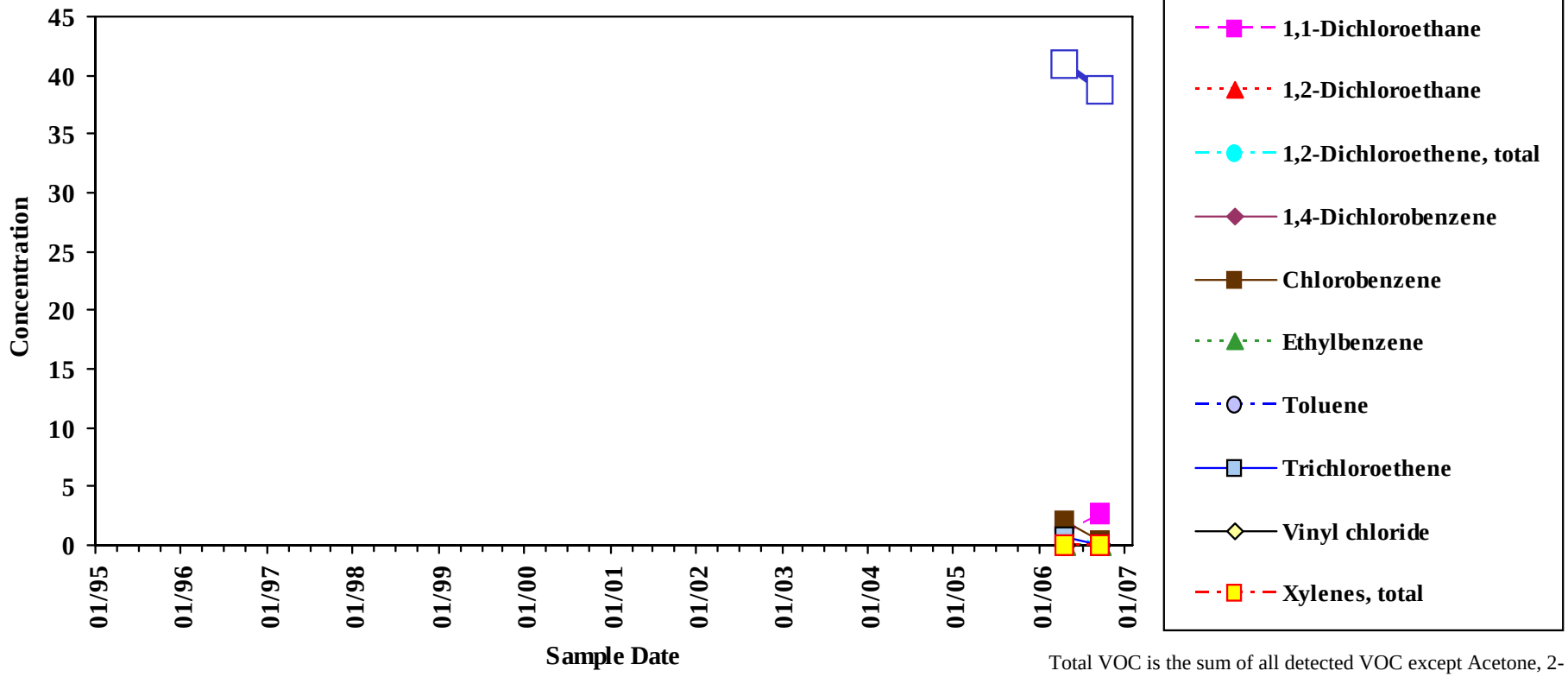
Sample Location:

MW-1302S

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/l

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

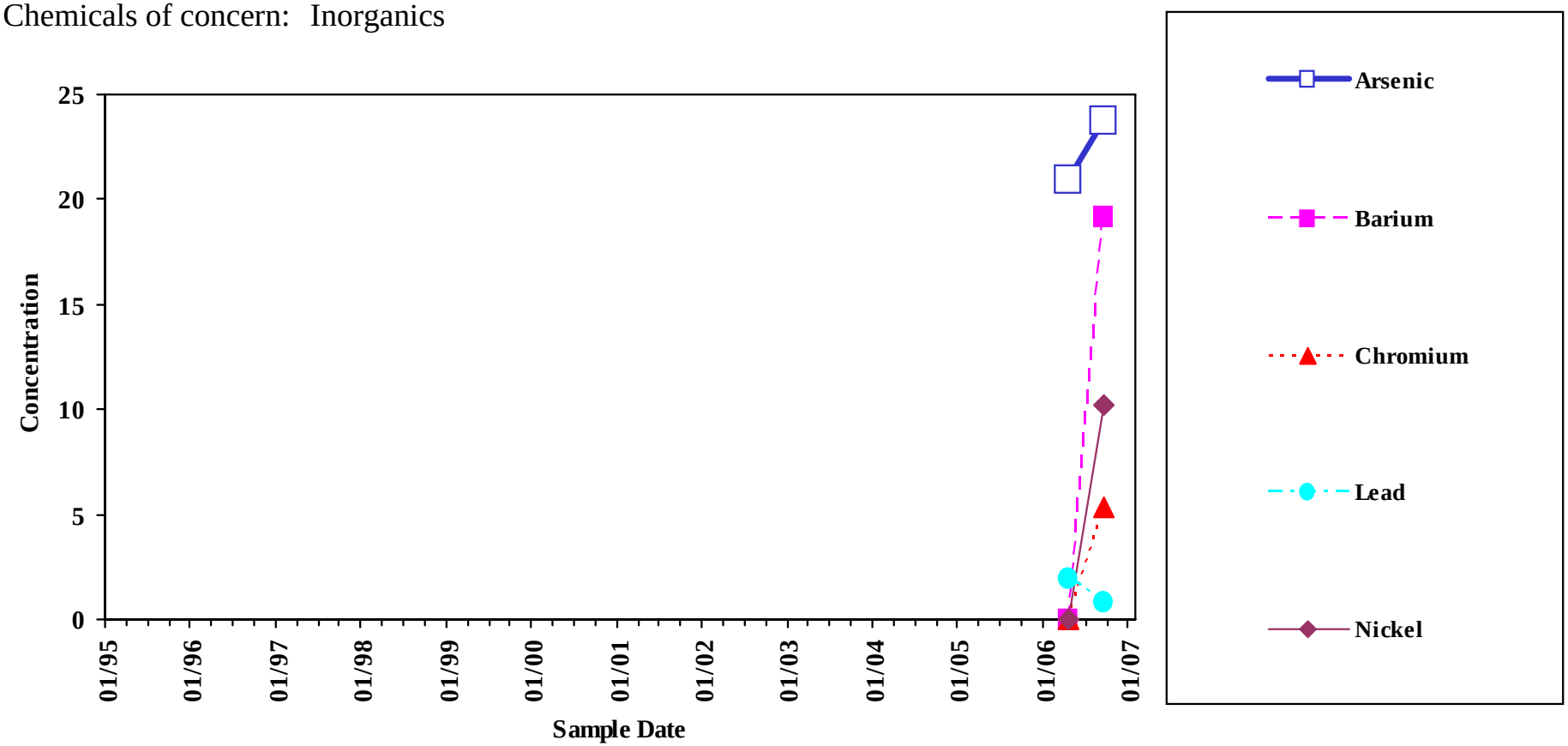
Sample Location:

MW-1303A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

Chromium	Lead	Nickel
100	15	--

MCL	Arsenic	Barium
	10	2000

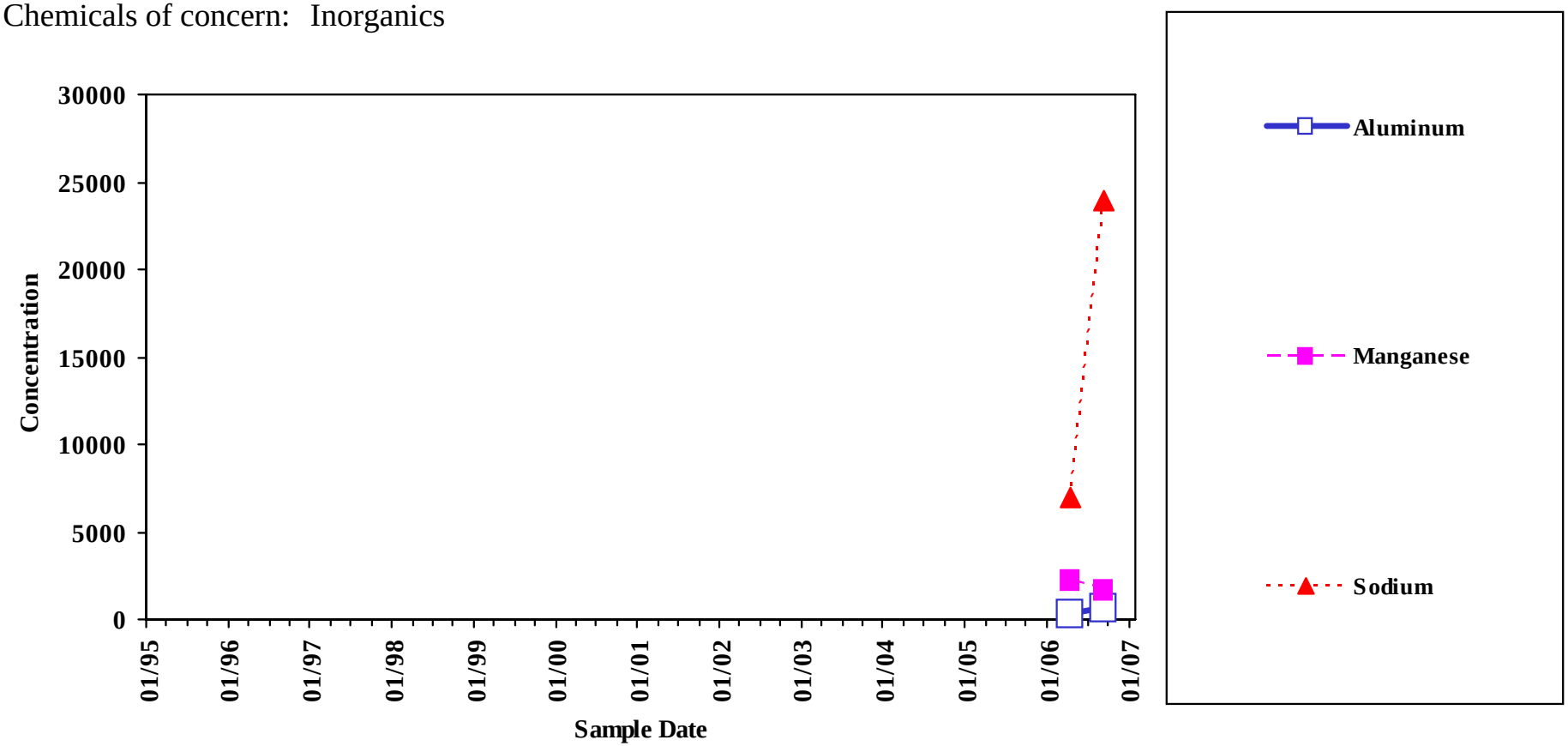
Sample Location:

MW-1303A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

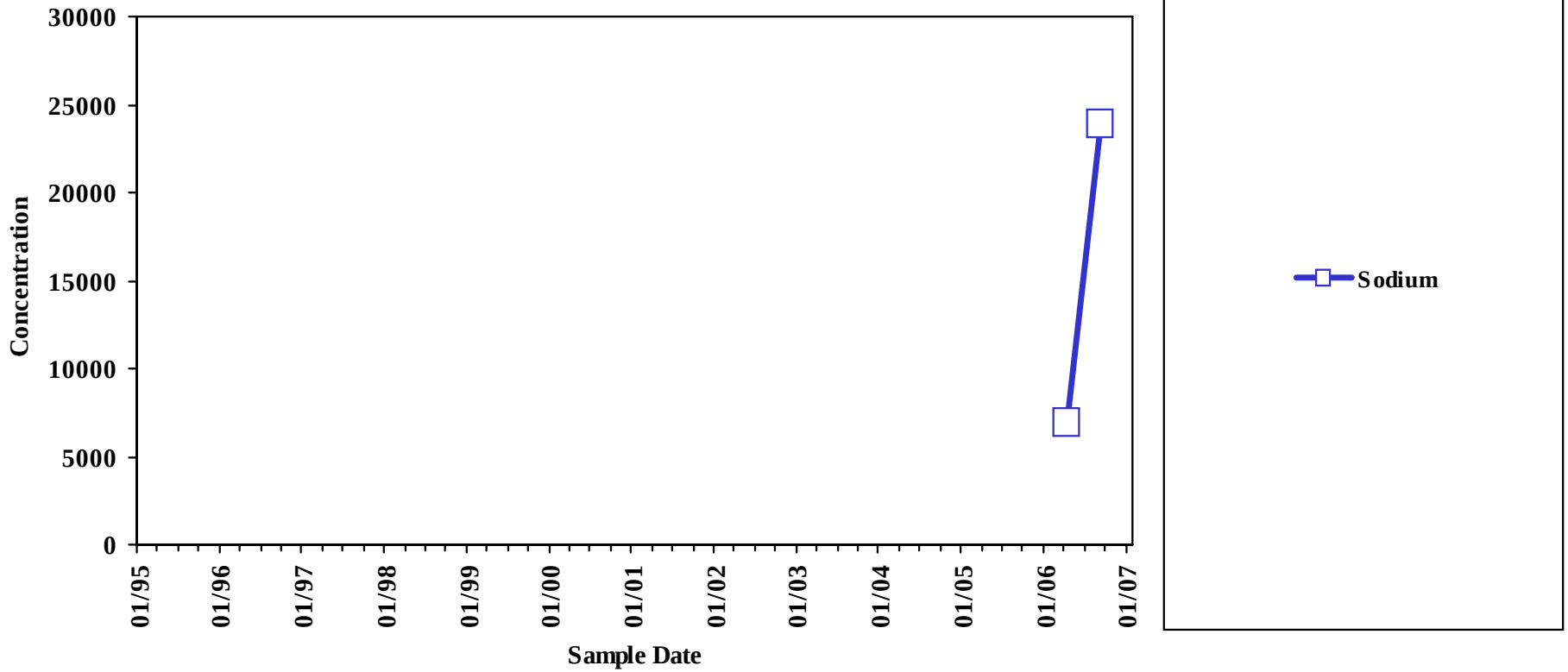
Sample Location:

MW-1303A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

MEG	Sodium	MCL	Sodium
	20000		--

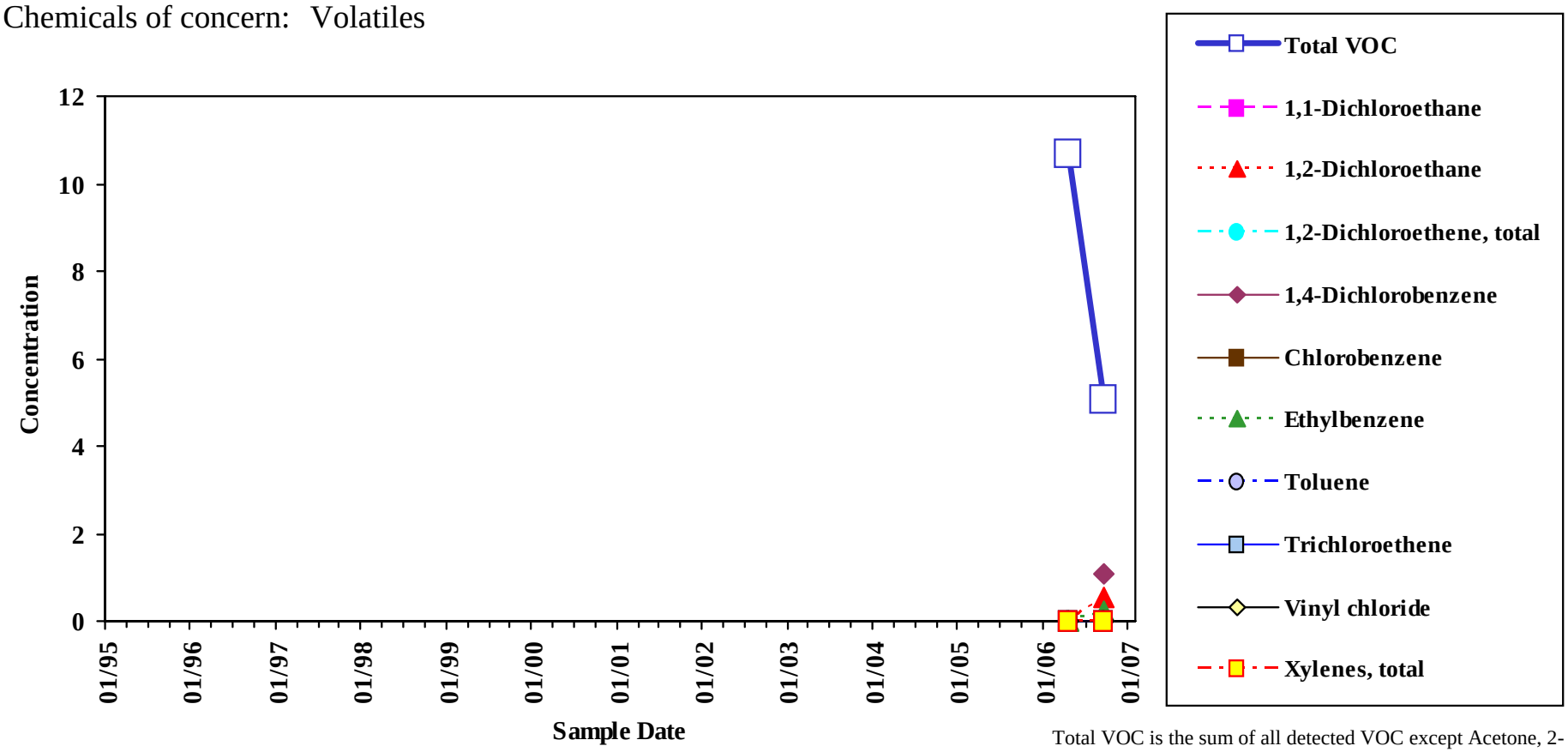
Sample Location:

MW-1303A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/l

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

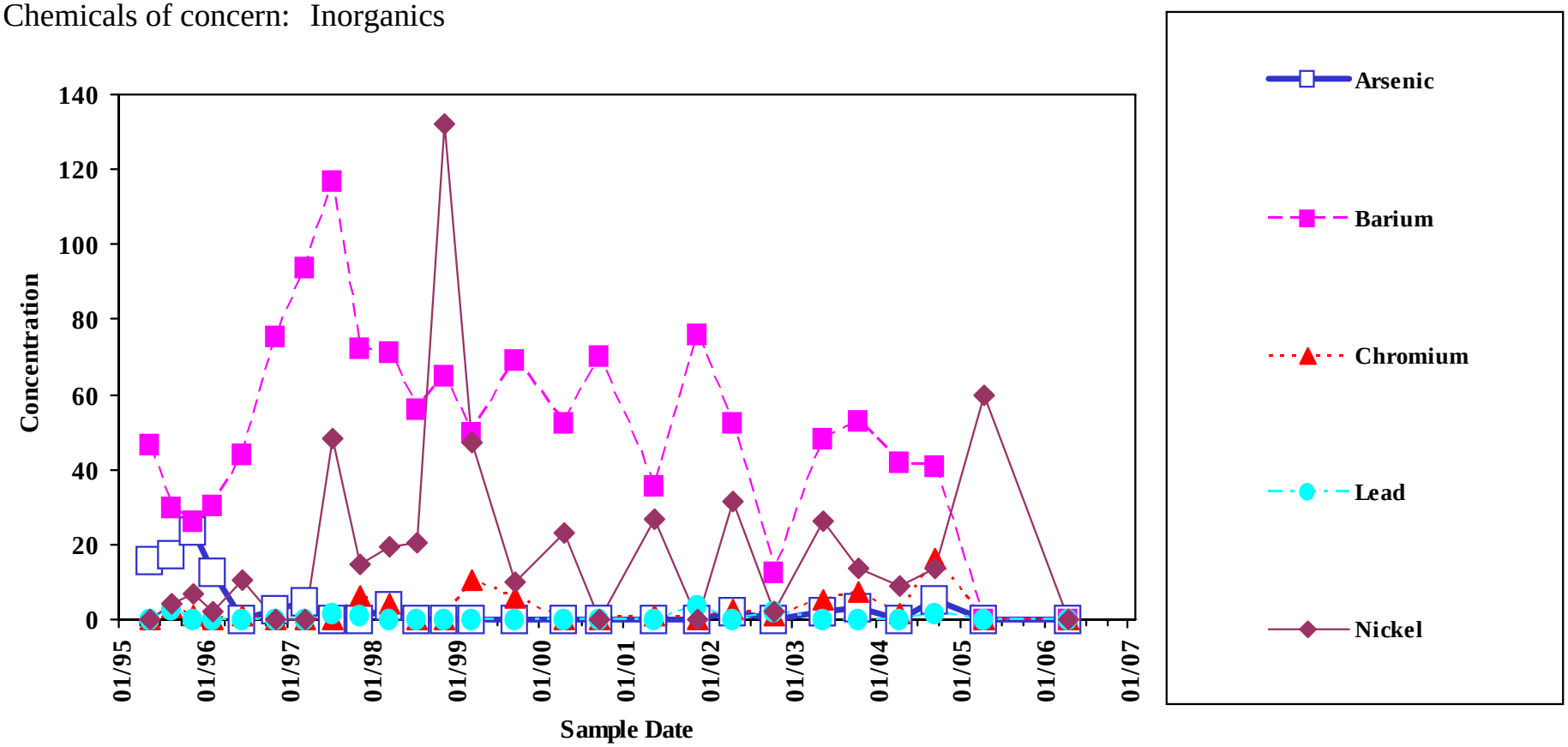
Sample Location:

MW-202A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140
Chromium	Lead	Nickel			
100	15	--			

MCL	Arsenic	Barium
	10	2000

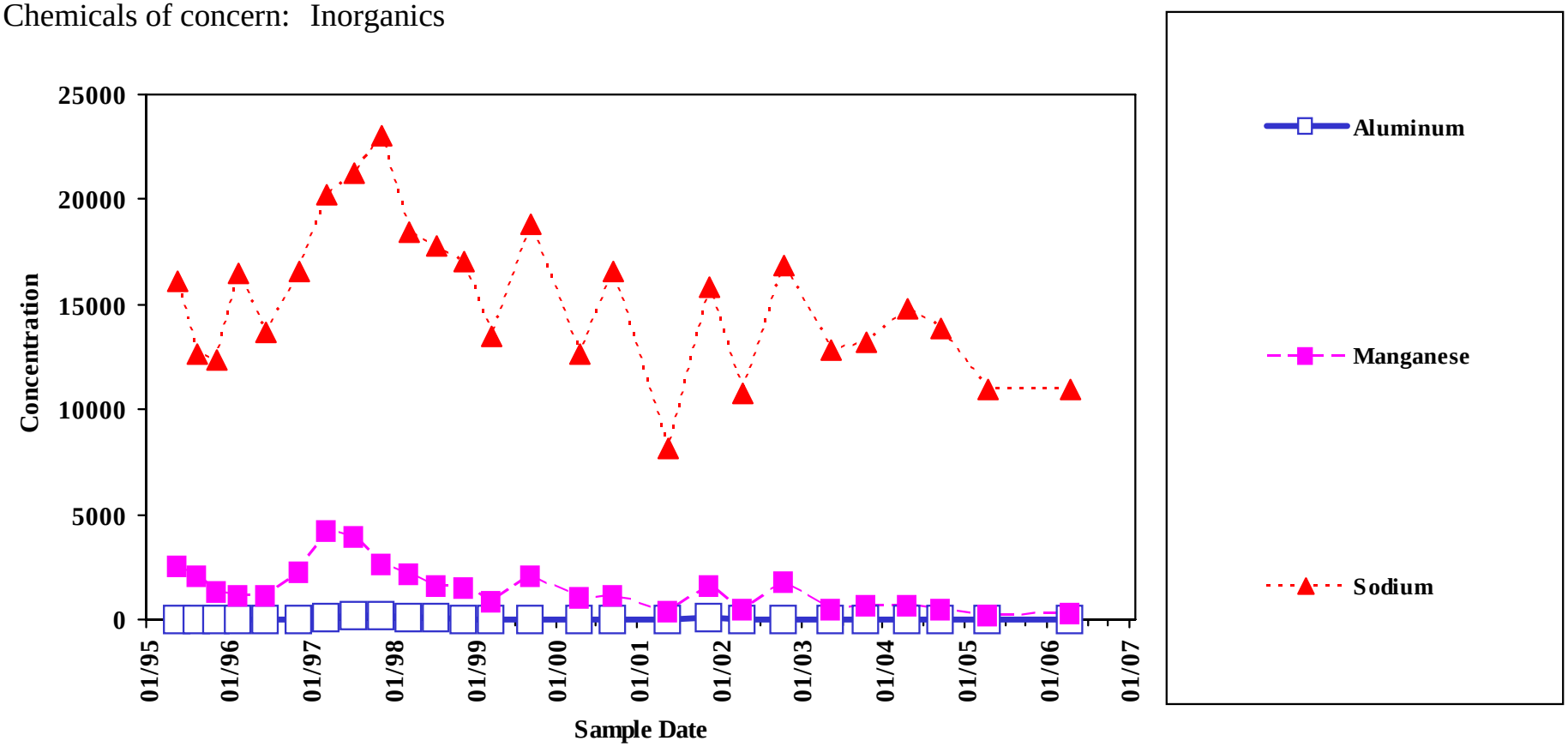
Sample Location:

MW-202A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

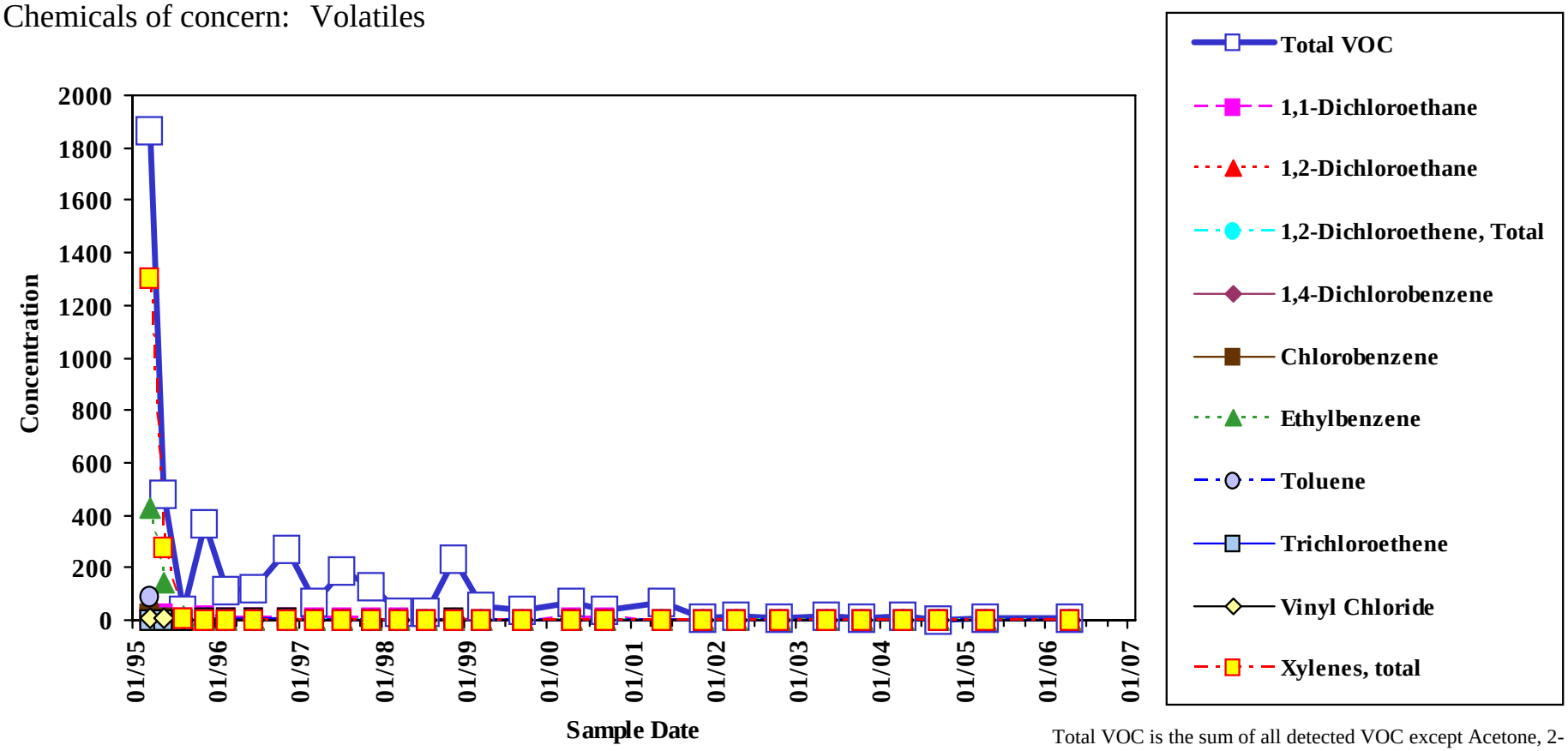
Sample Location:

MW-202A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

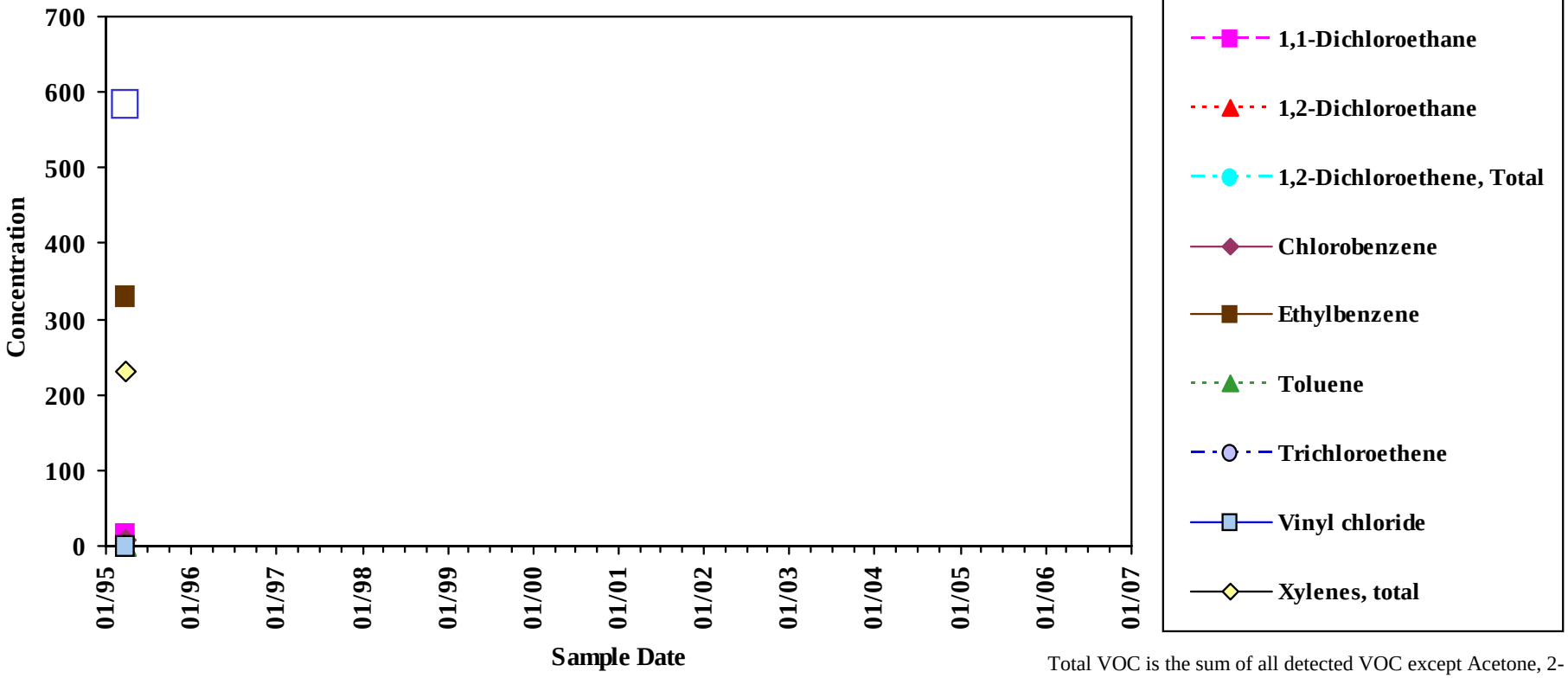
Sample Location:

MW-202B

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

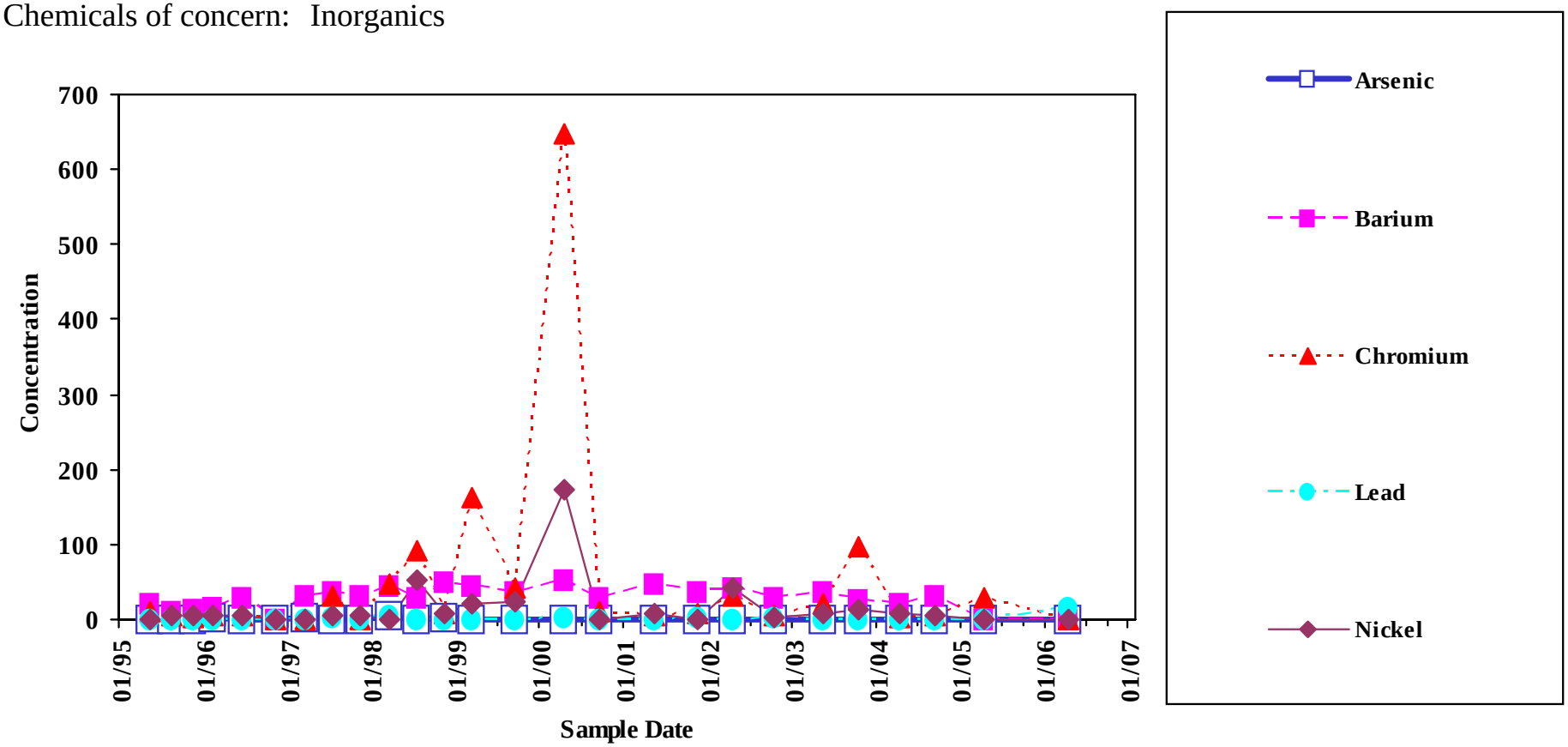
Sample Location:

MW-203

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

MCL	Arsenic	Barium
	10	2000

Chromium	Lead	Nickel
100	15	--

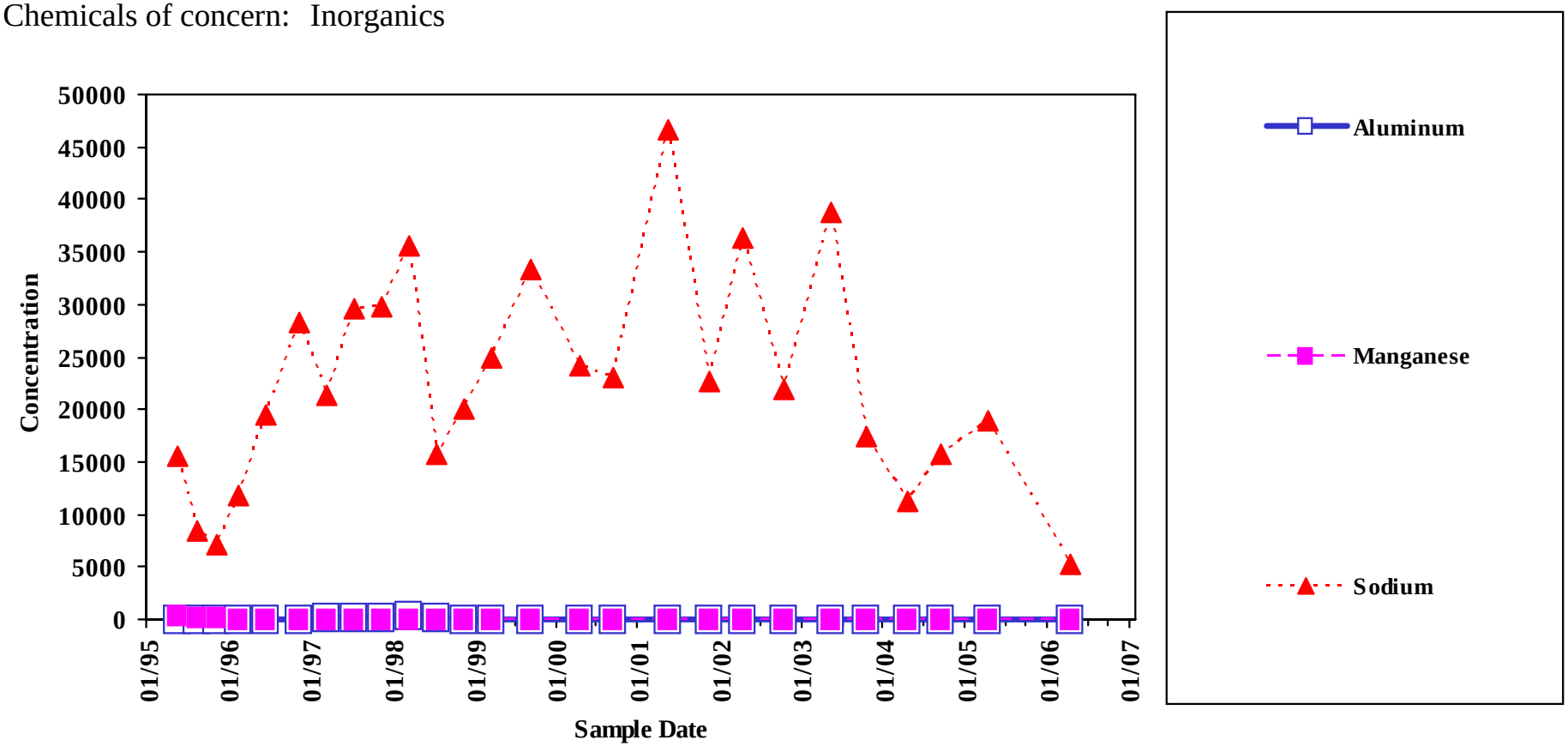
Sample Location:

MW-203

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

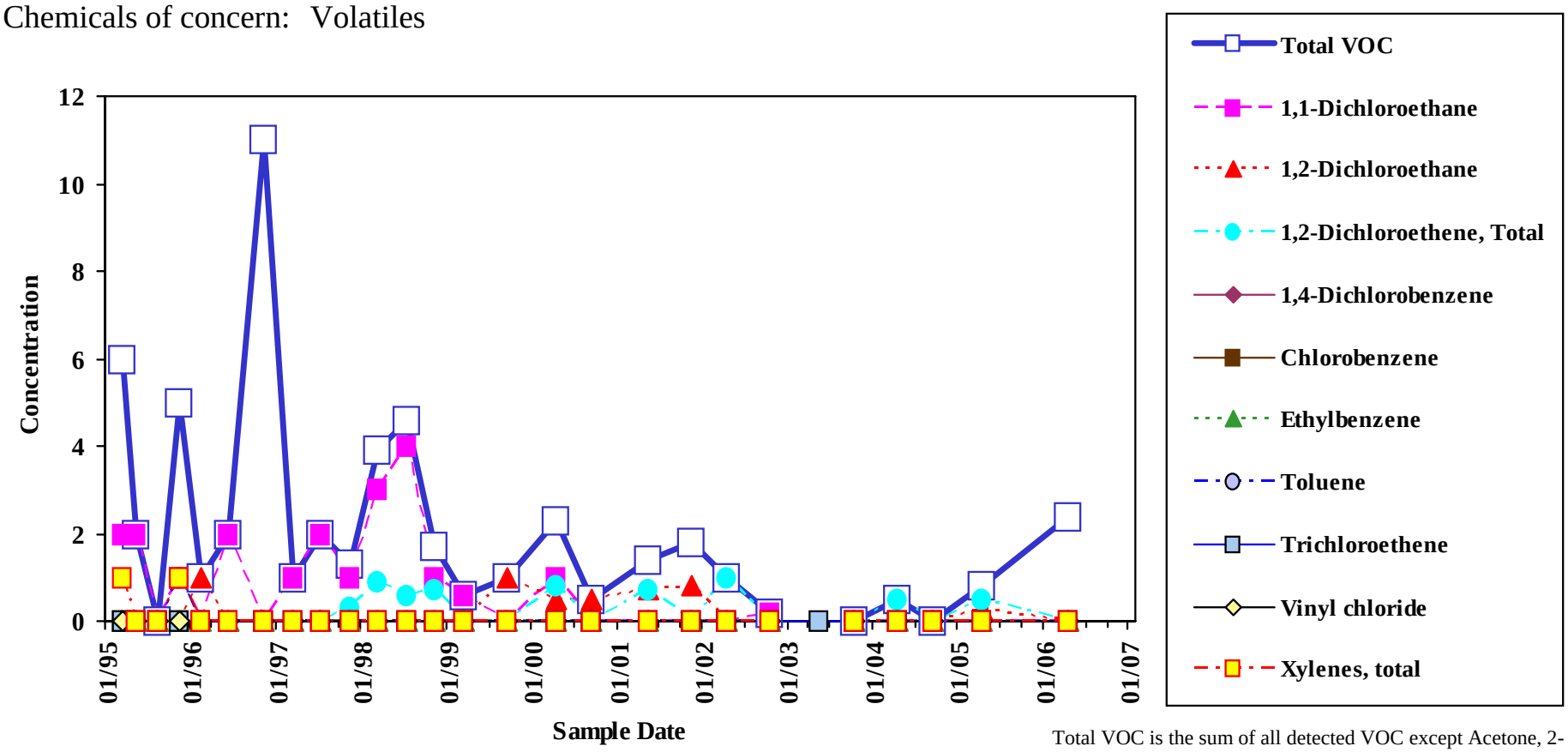
Sample Location:

MW-203

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

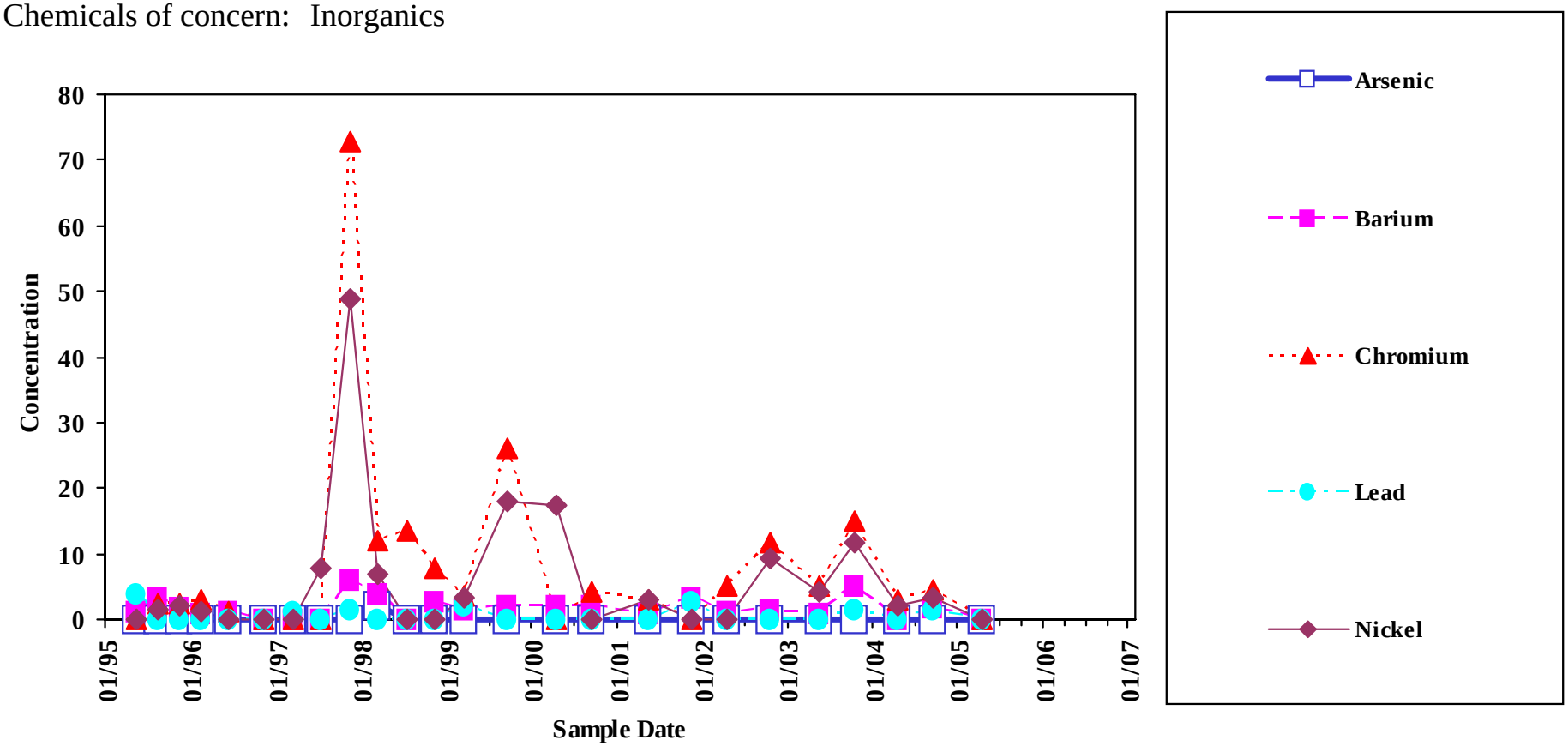
Sample Location:

MW-204

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

MCL	Arsenic	Barium
	10	2000

Chromium	Lead	Nickel
100	15	--

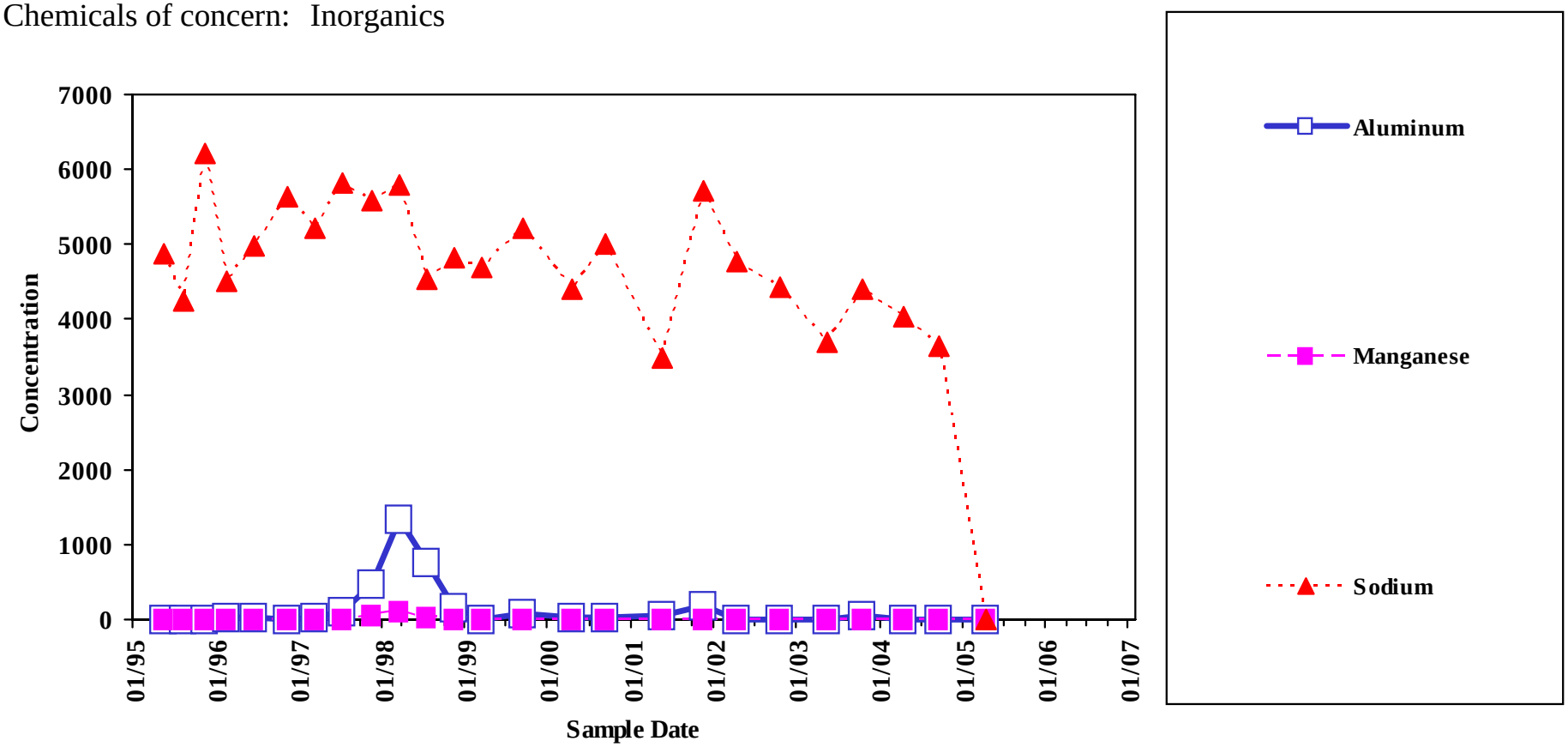
Sample Location:

MW-204

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

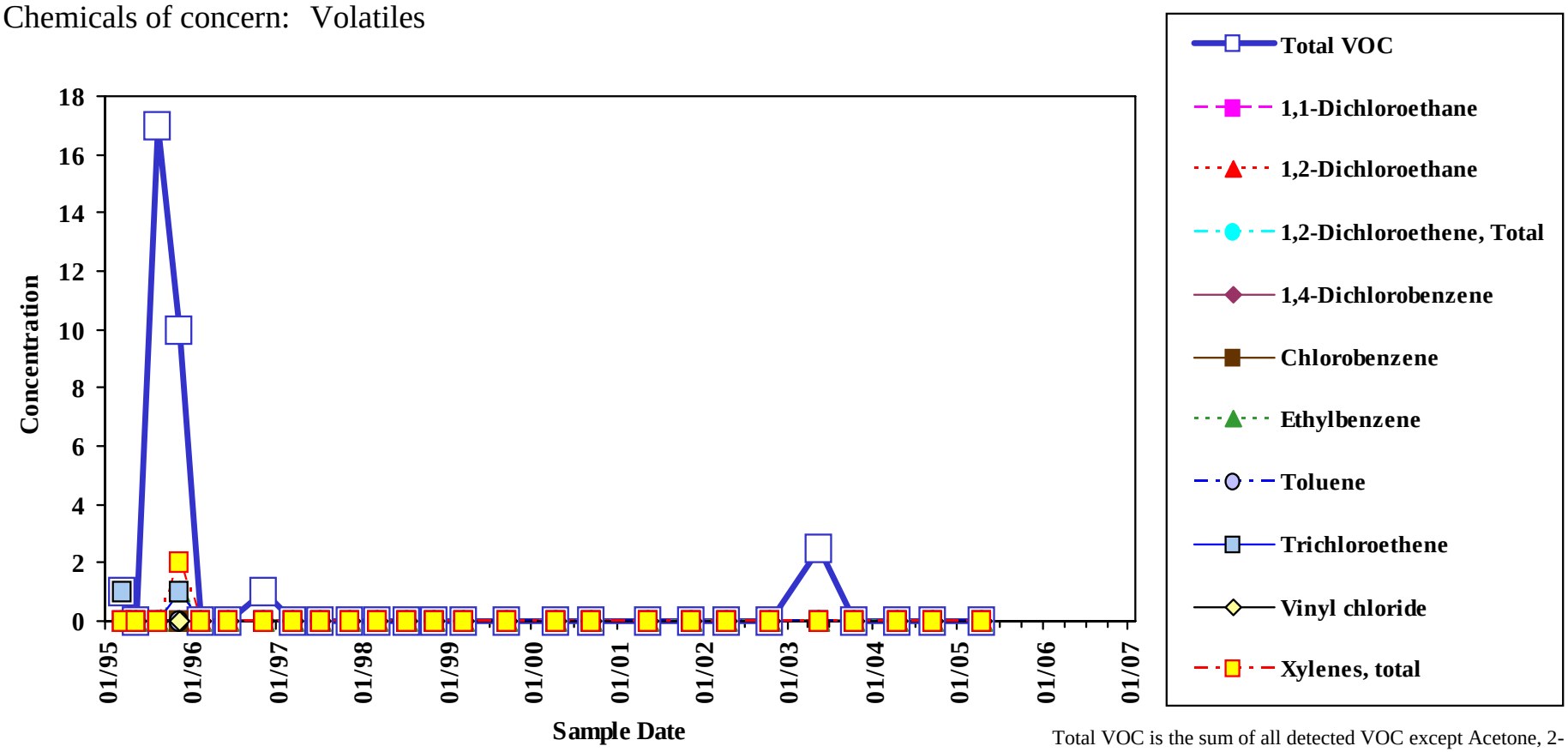
Sample Location:

MW-204

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

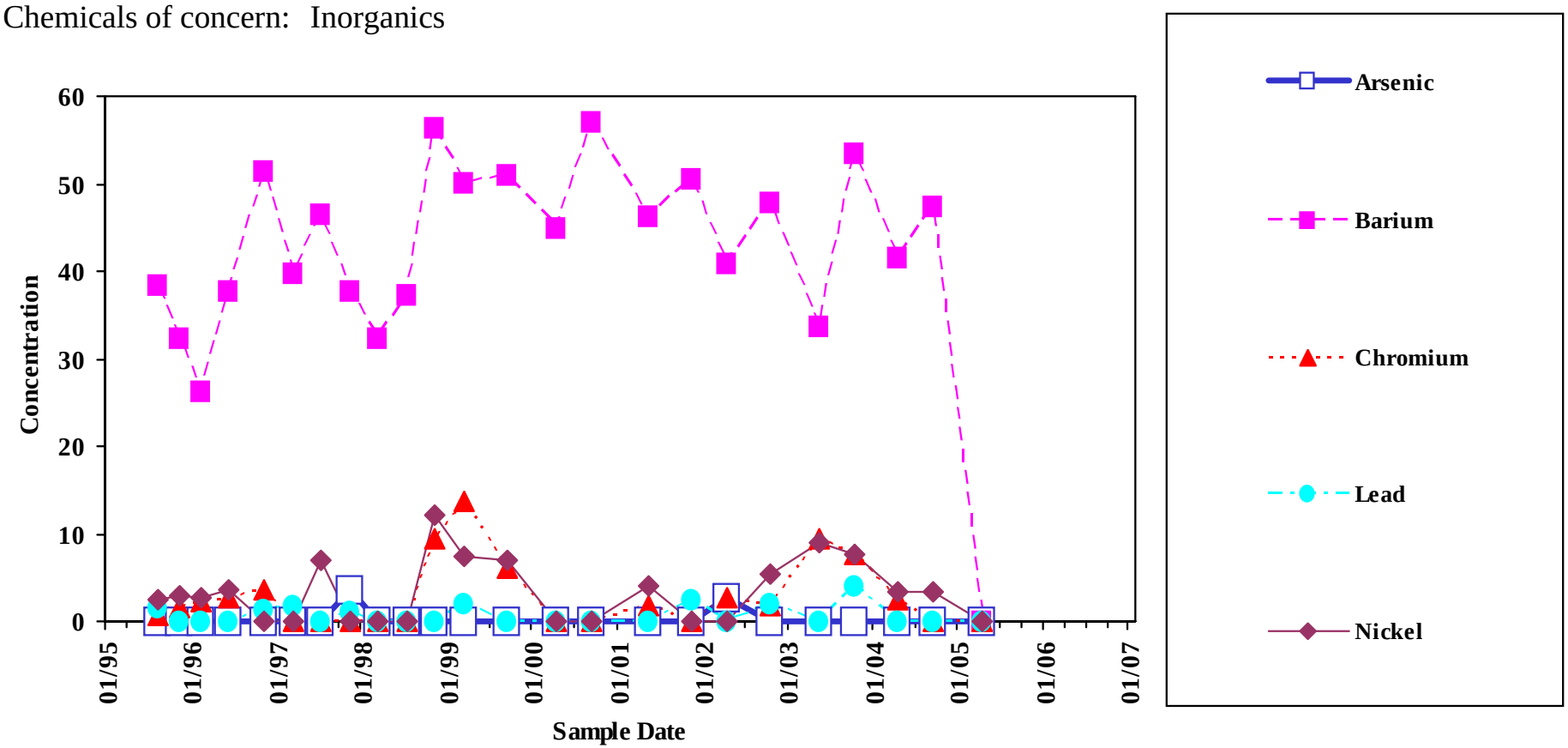
Sample Location:

MW-2101

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

MCL	Arsenic	Barium
	10	2000

Chromium	Lead	Nickel
100	15	--

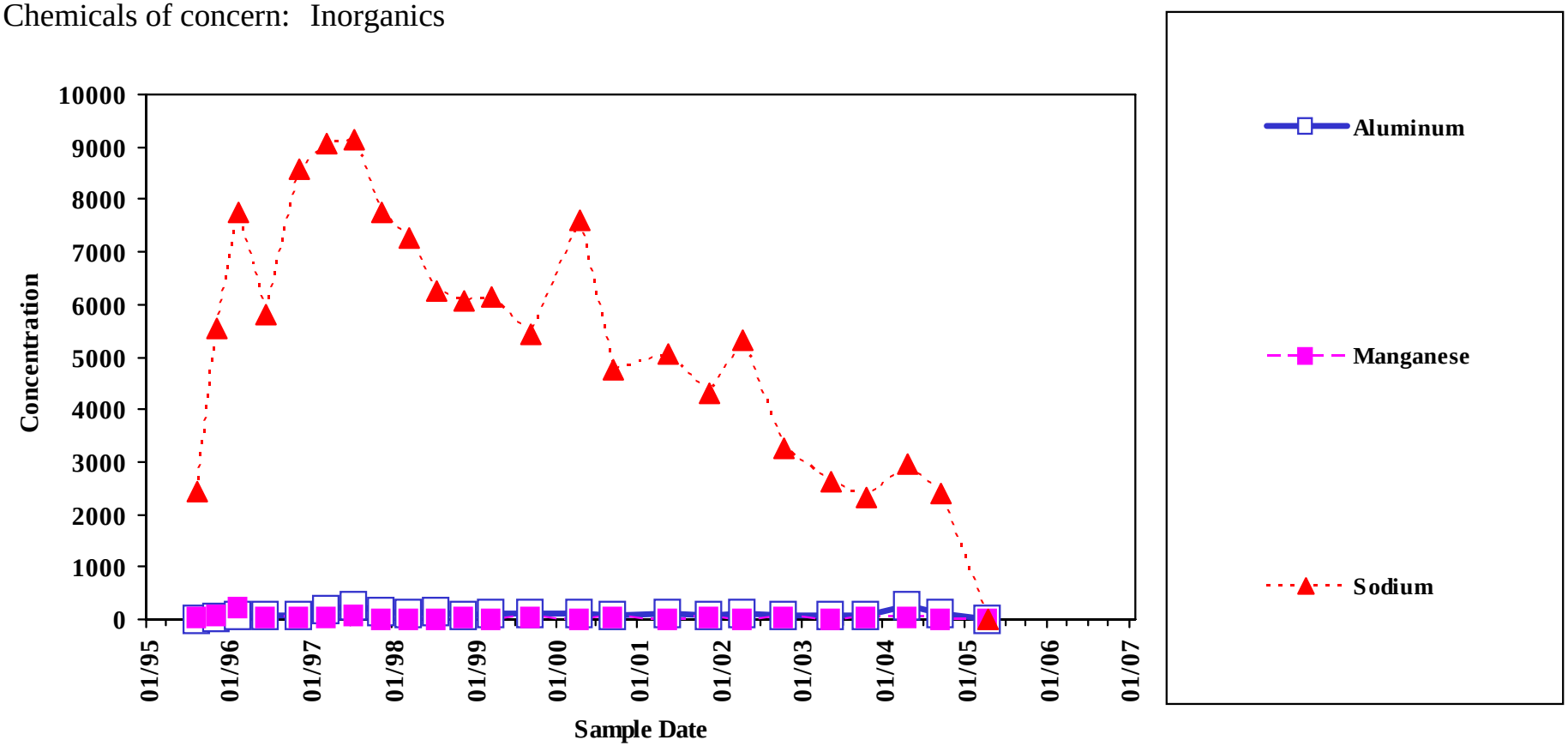
Sample Location:

MW-2101

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

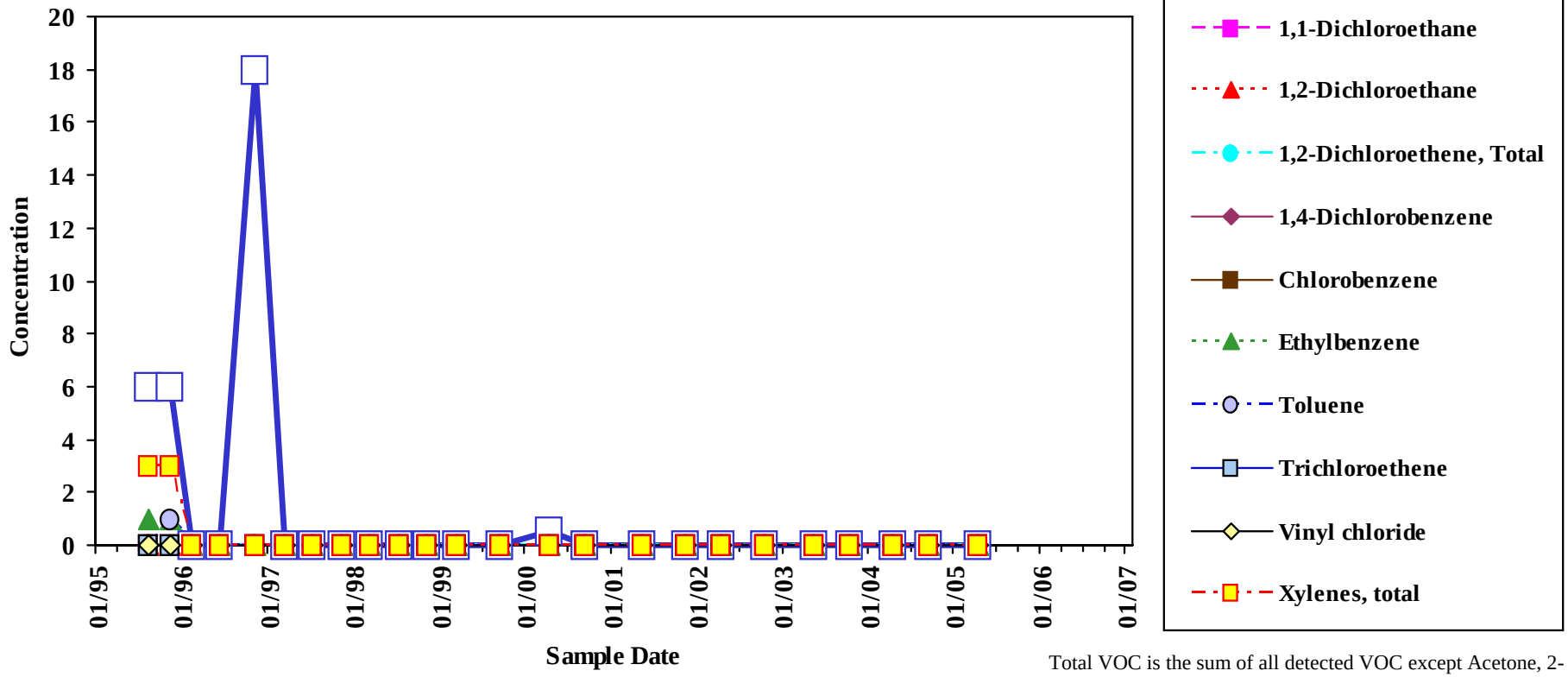
Sample Location:

MW-2101

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

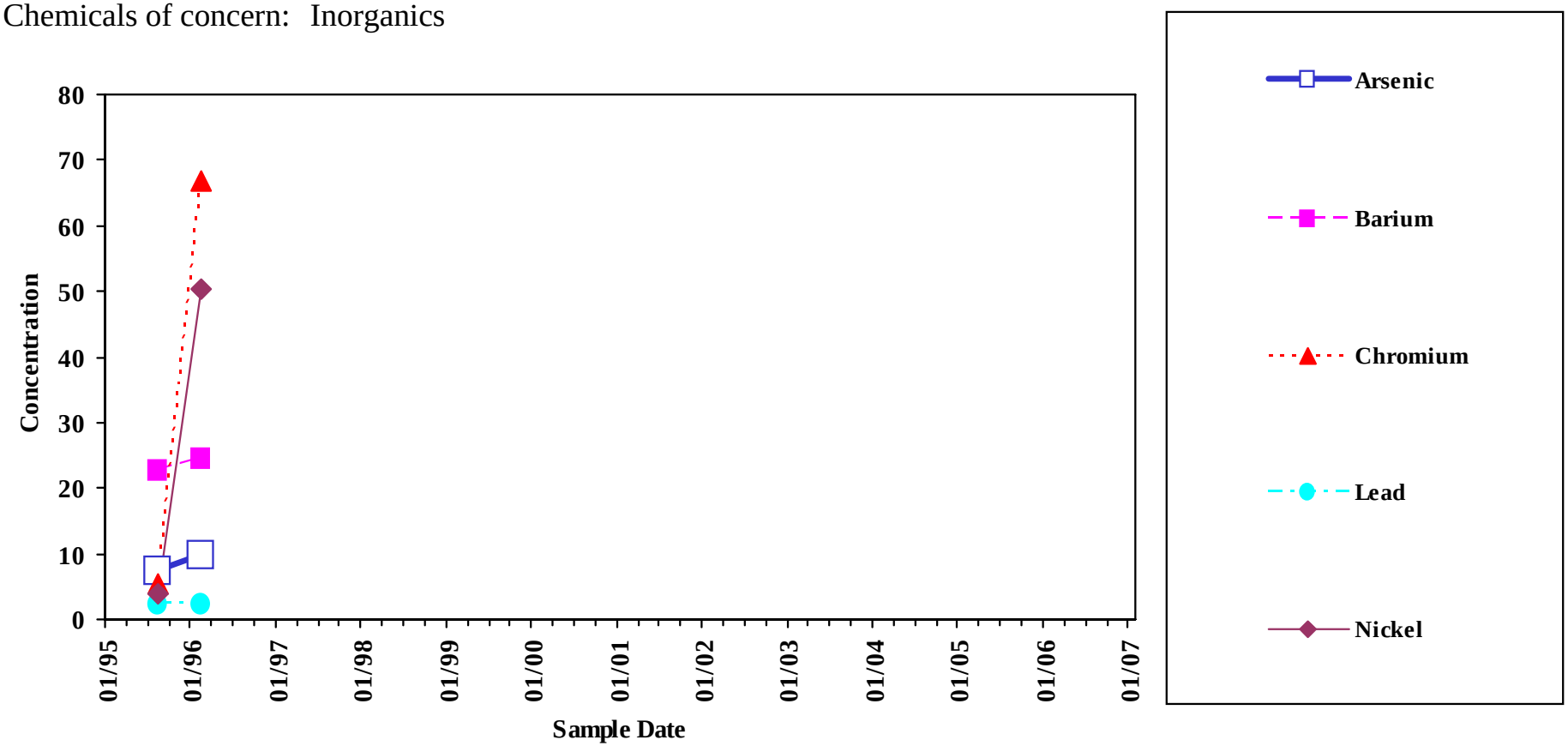
Sample Location:

MW-210A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

MCL	Arsenic	Barium
	10	2000

Chromium	Lead	Nickel
100	15	--

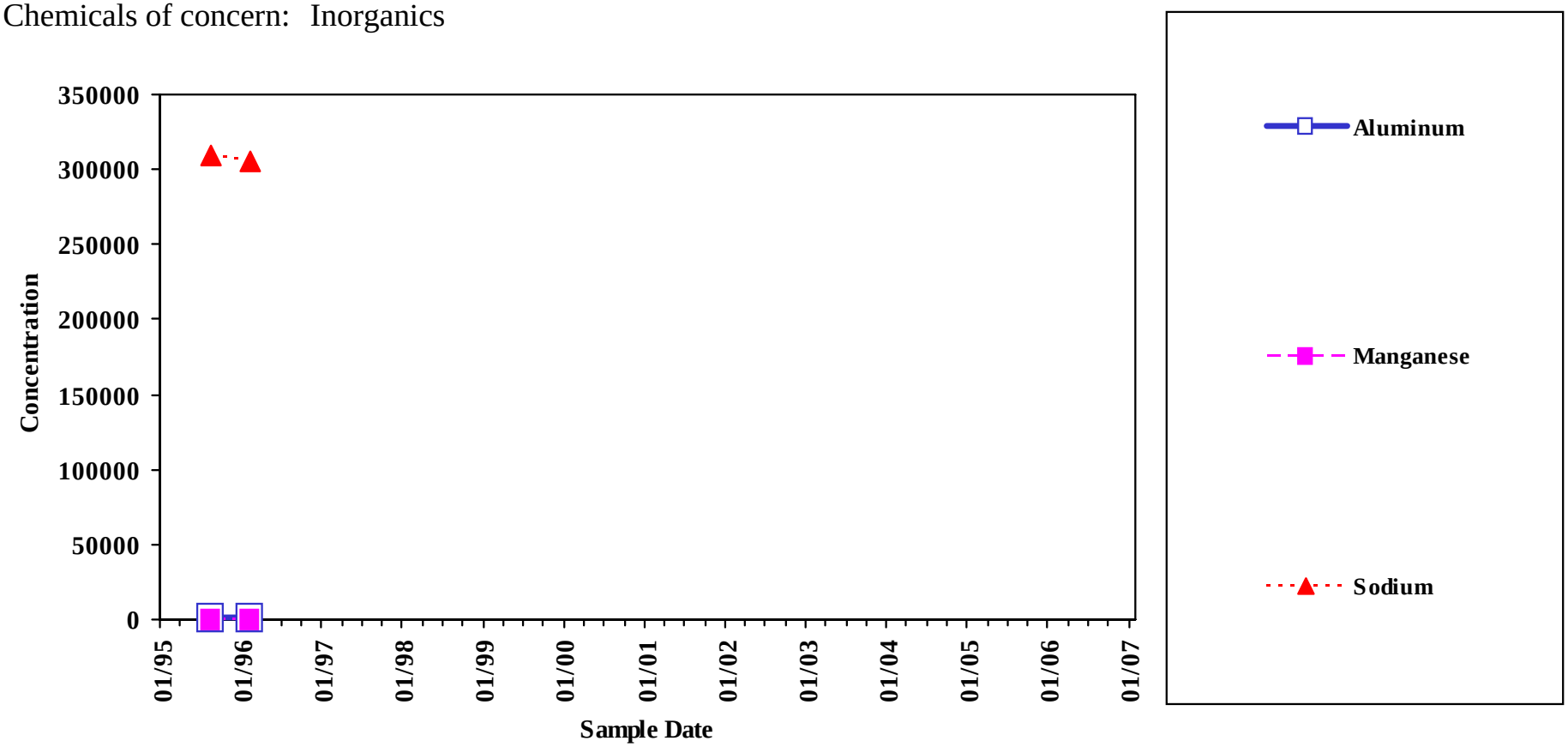
Sample Location:

MW-210A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

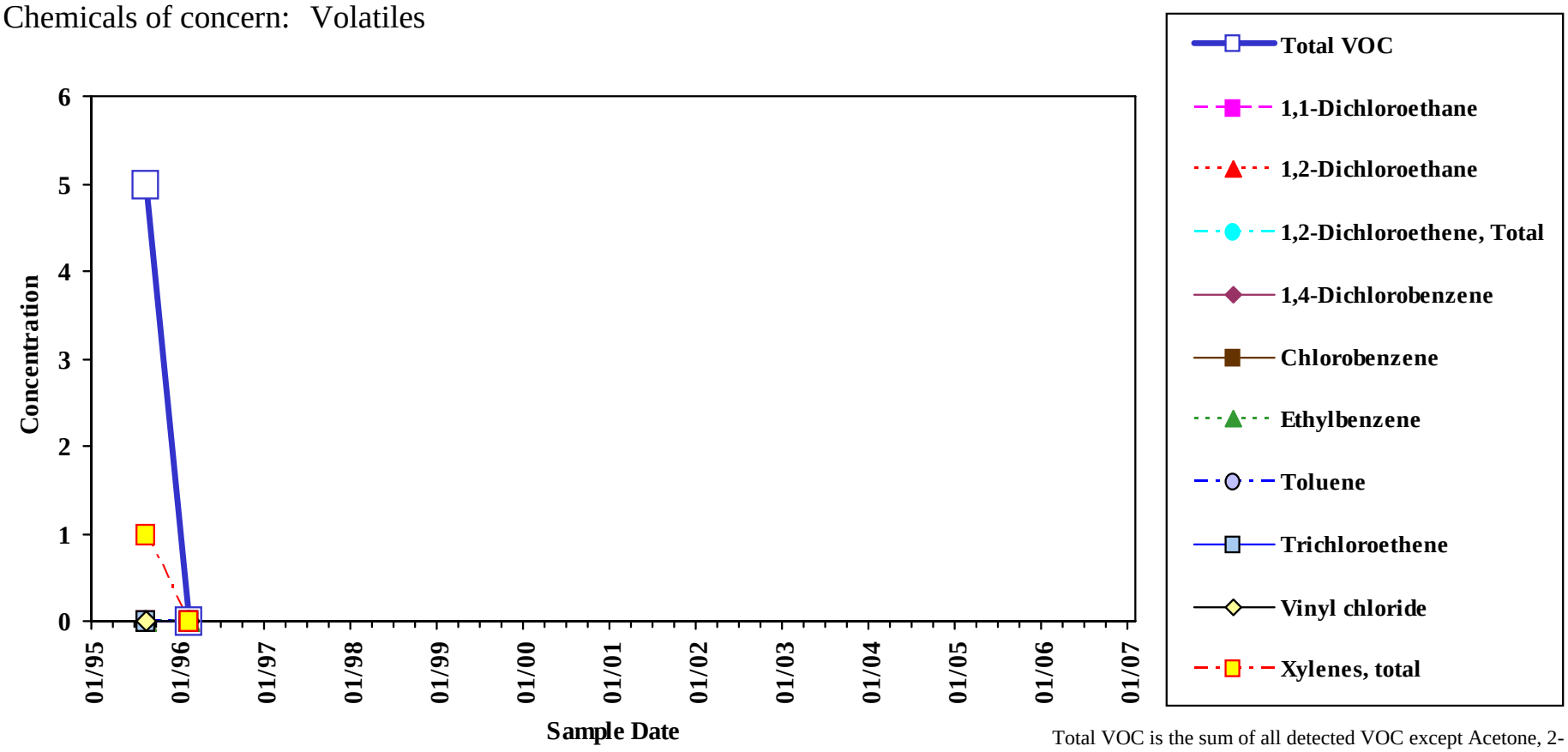
Sample Location:

MW-210A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

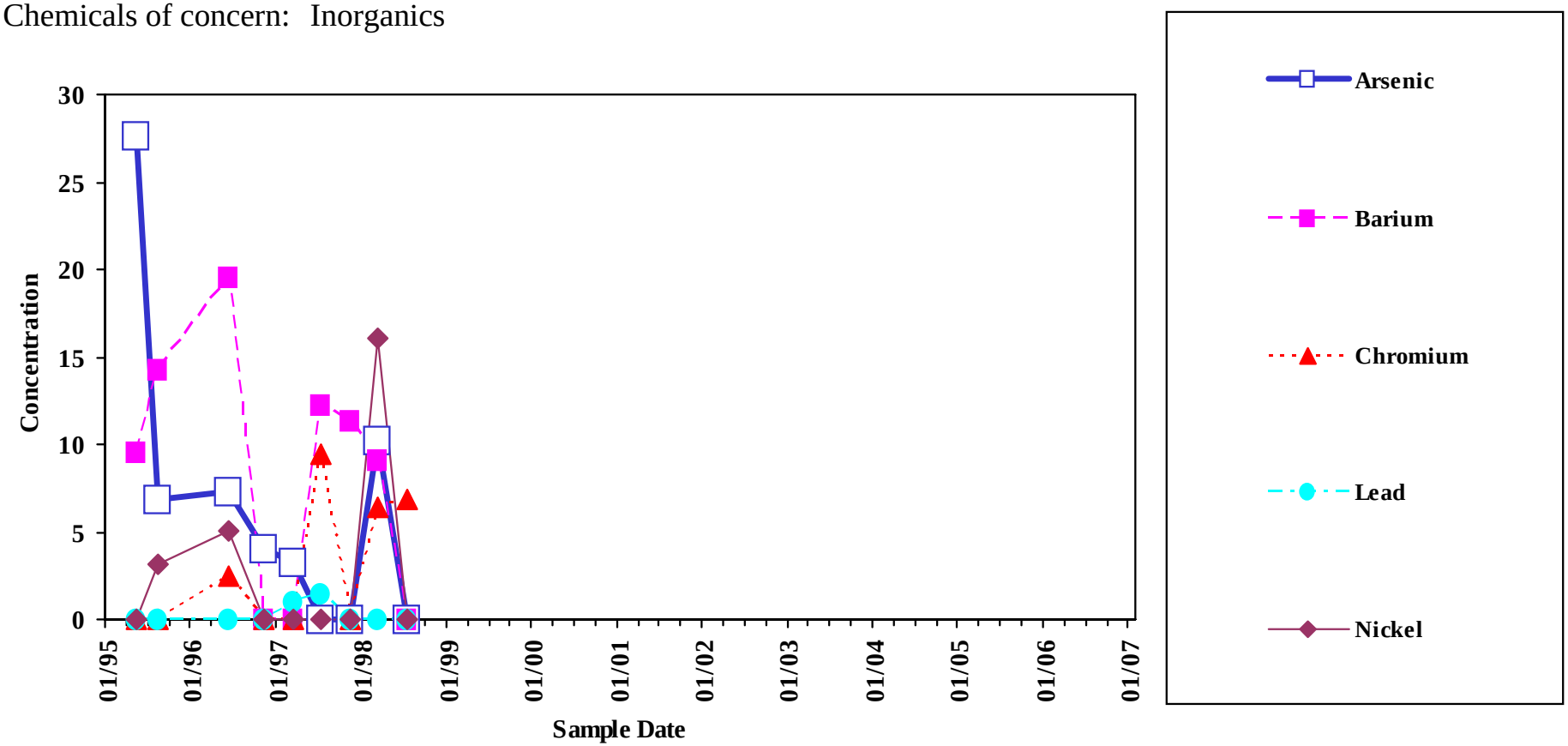
Sample Location:

MW-210B

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

MCL	Arsenic	Barium
	10	2000

Chromium	Lead	Nickel
100	15	--

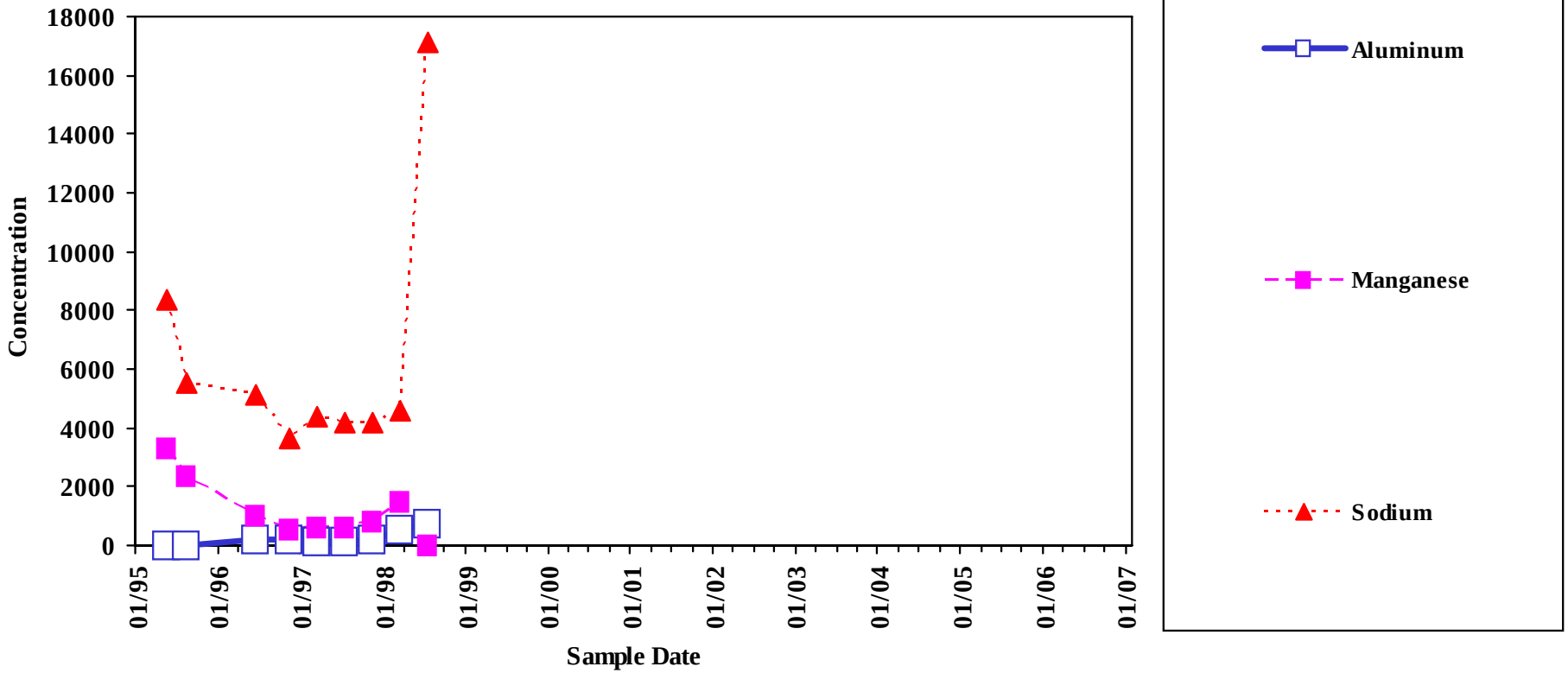
Sample Location:

MW-210B

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

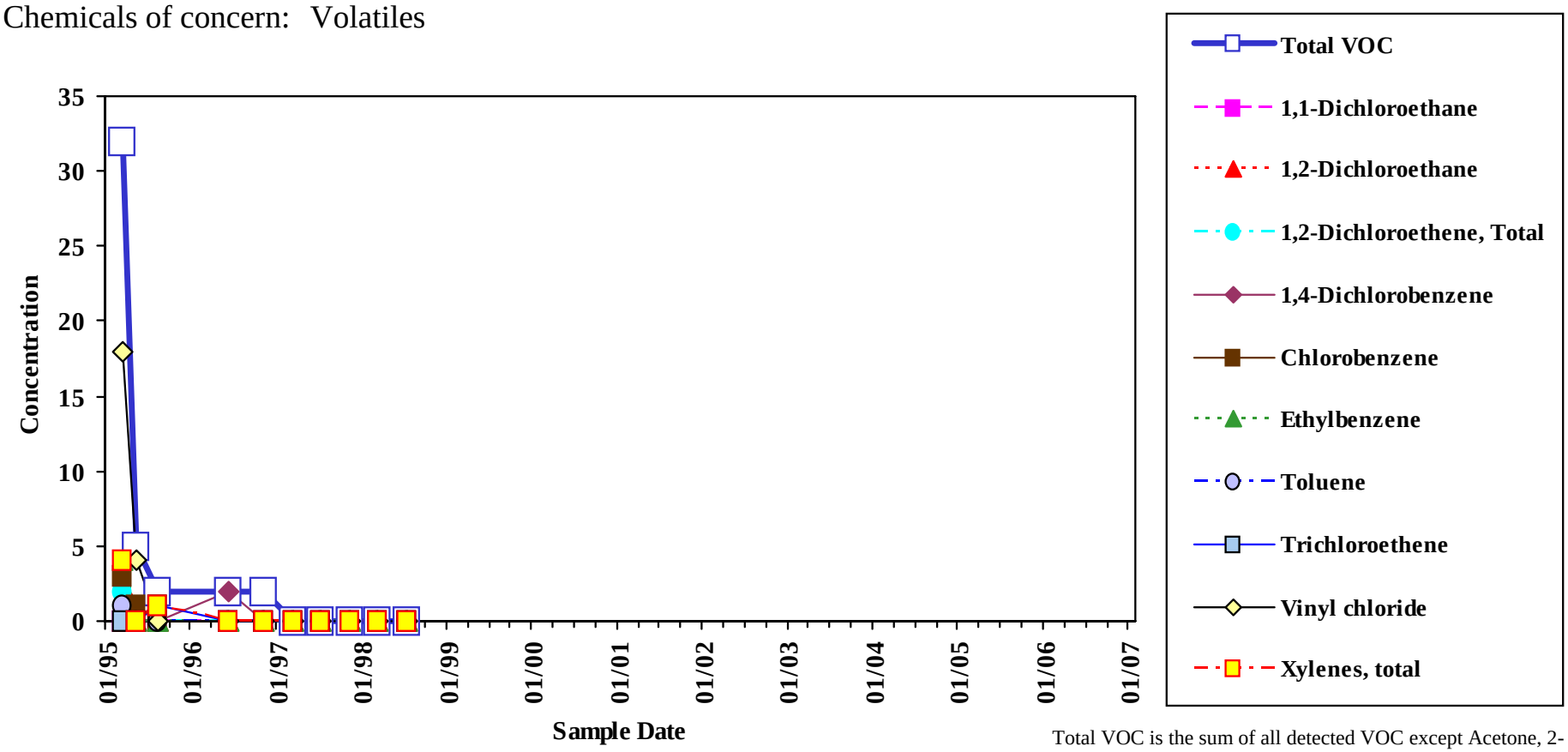
Sample Location:

MW-210B

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

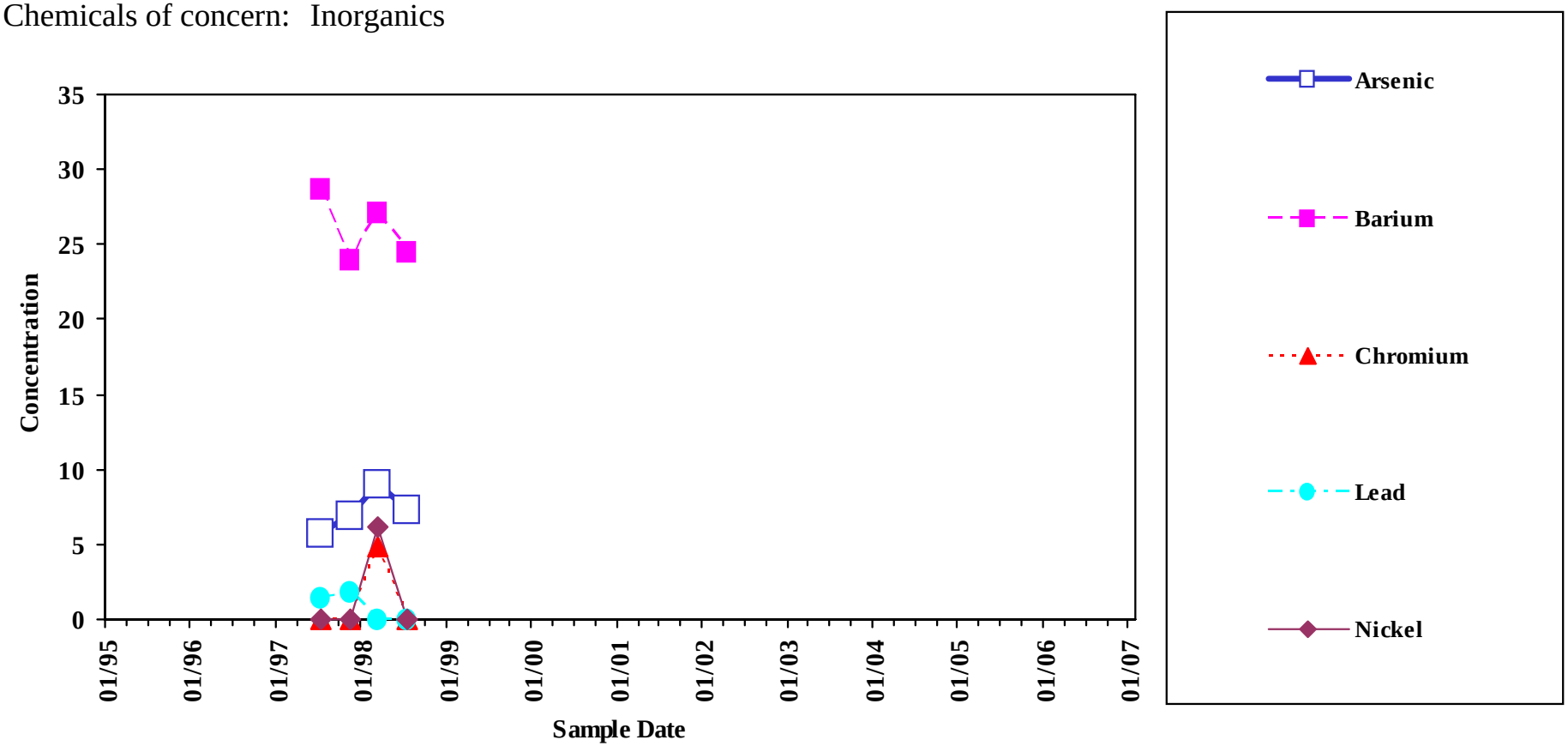
Sample Location:

MW-210R

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

MCL	Arsenic	Barium
	10	2000

Chromium	Lead	Nickel
100	15	--

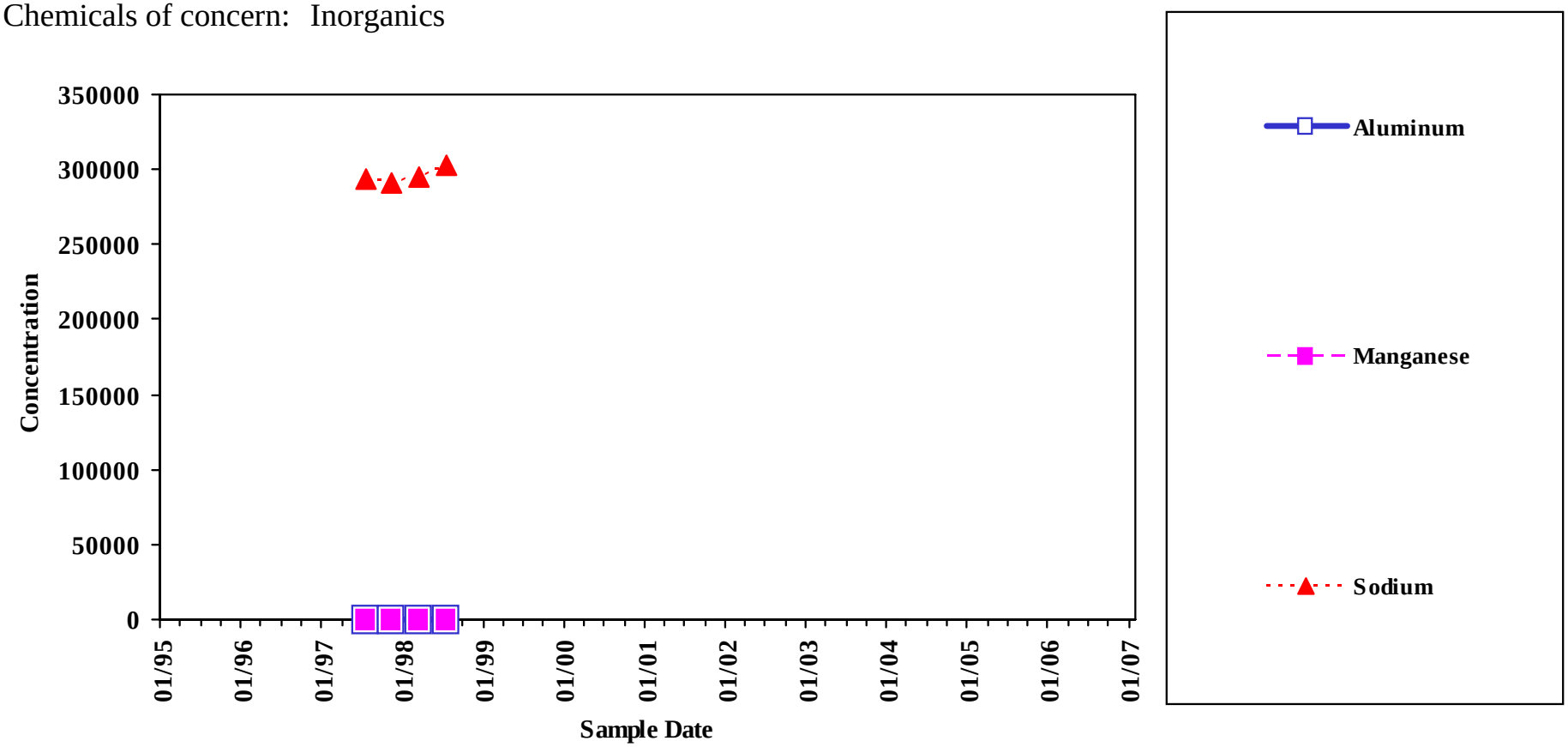
Sample Location:

MW-210R

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

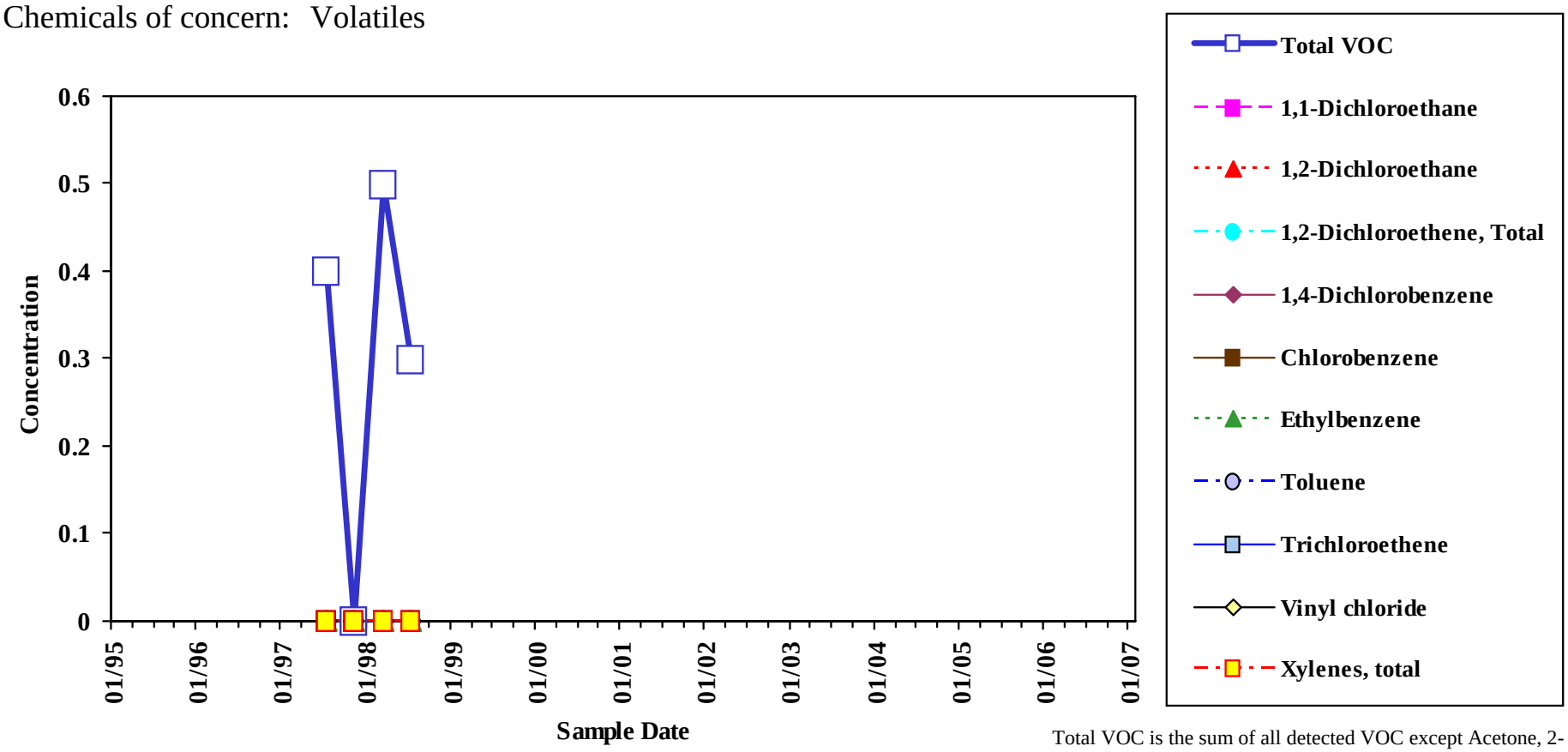
Sample Location:

MW-210R

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

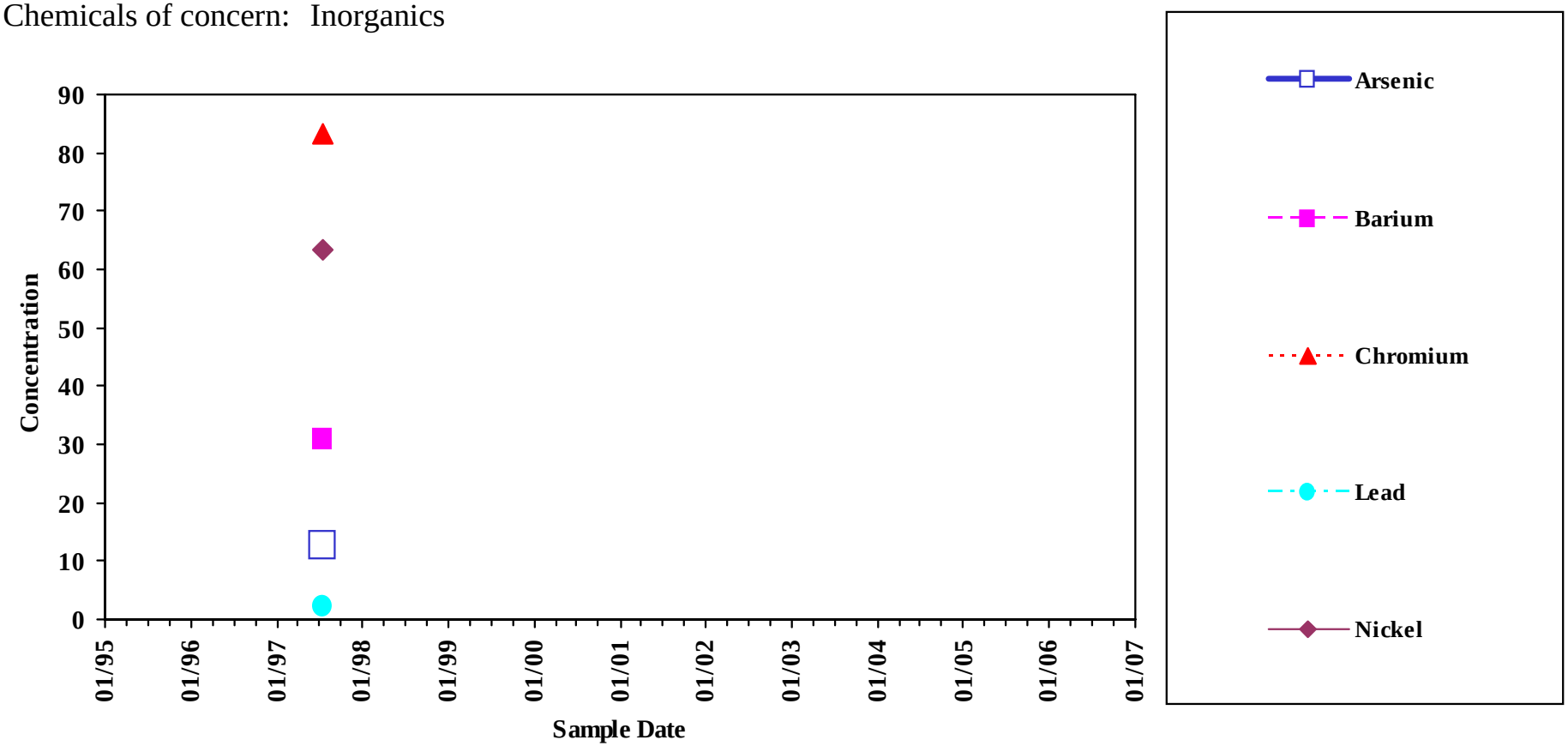
Sample Location:

MW-211B

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

Chromium	Lead	Nickel
100	15	--

MCL	Arsenic	Barium
	10	2000

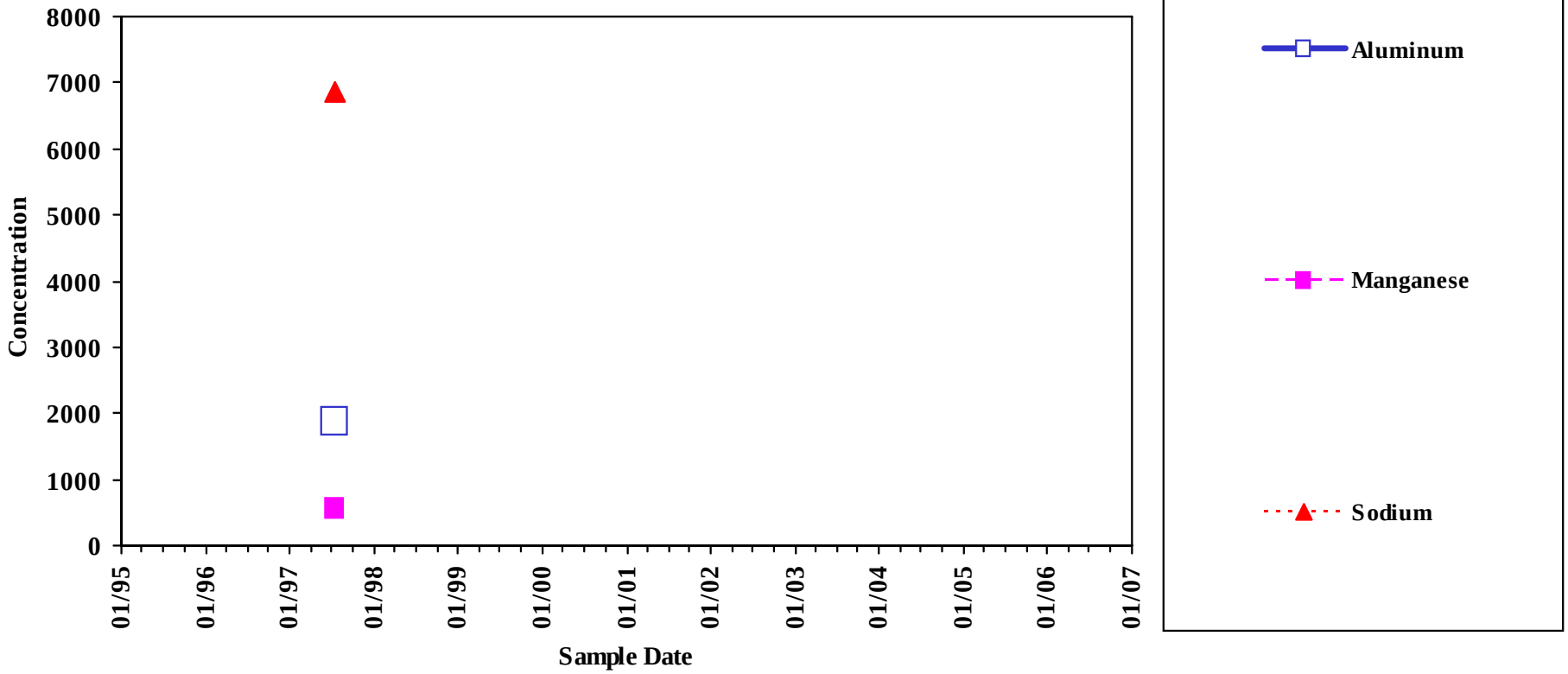
Sample Location:

MW-211B

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

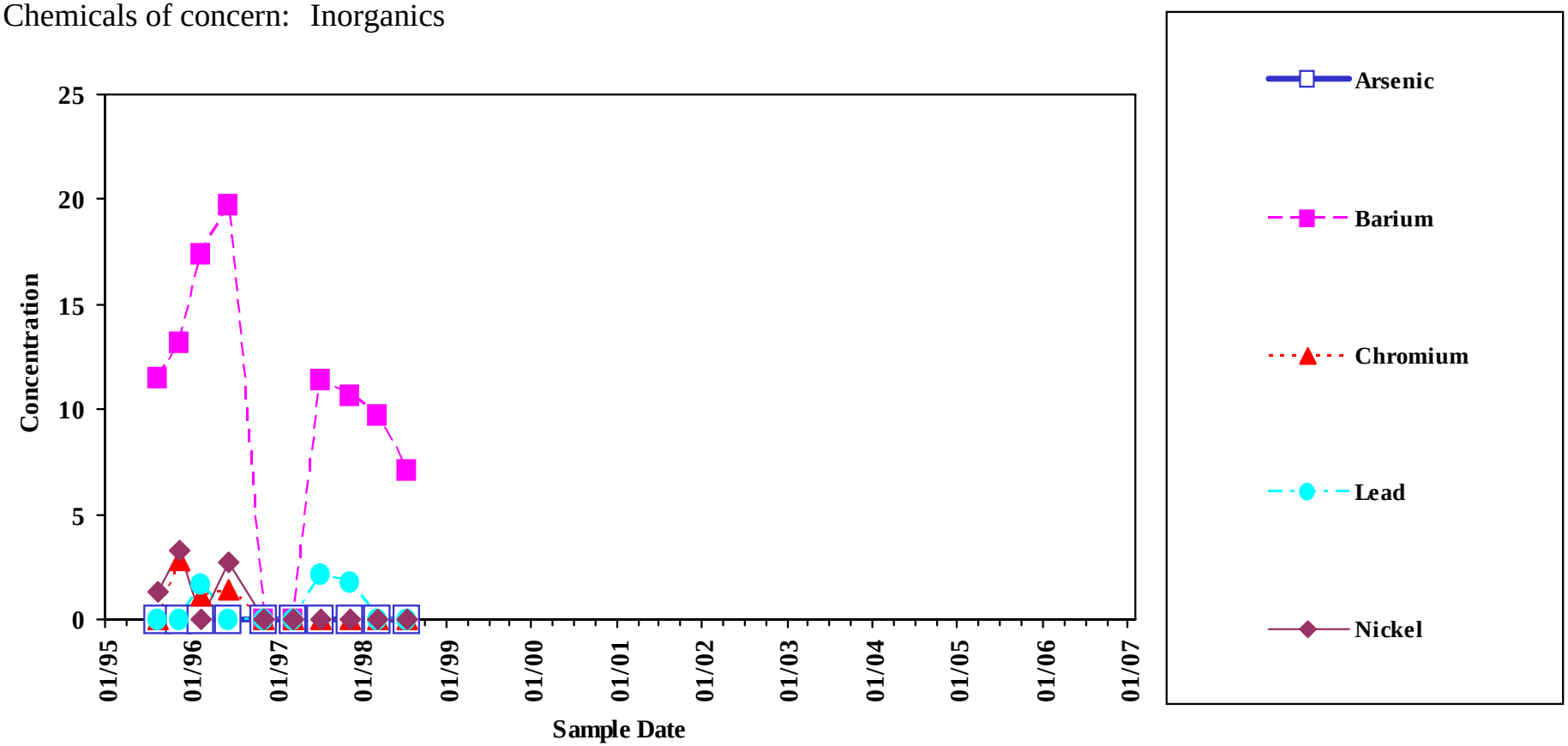
Sample Location:

MW-215R

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140
Chromium	Lead	Nickel			
100	15	--			

MCL	Arsenic	Barium
	10	2000

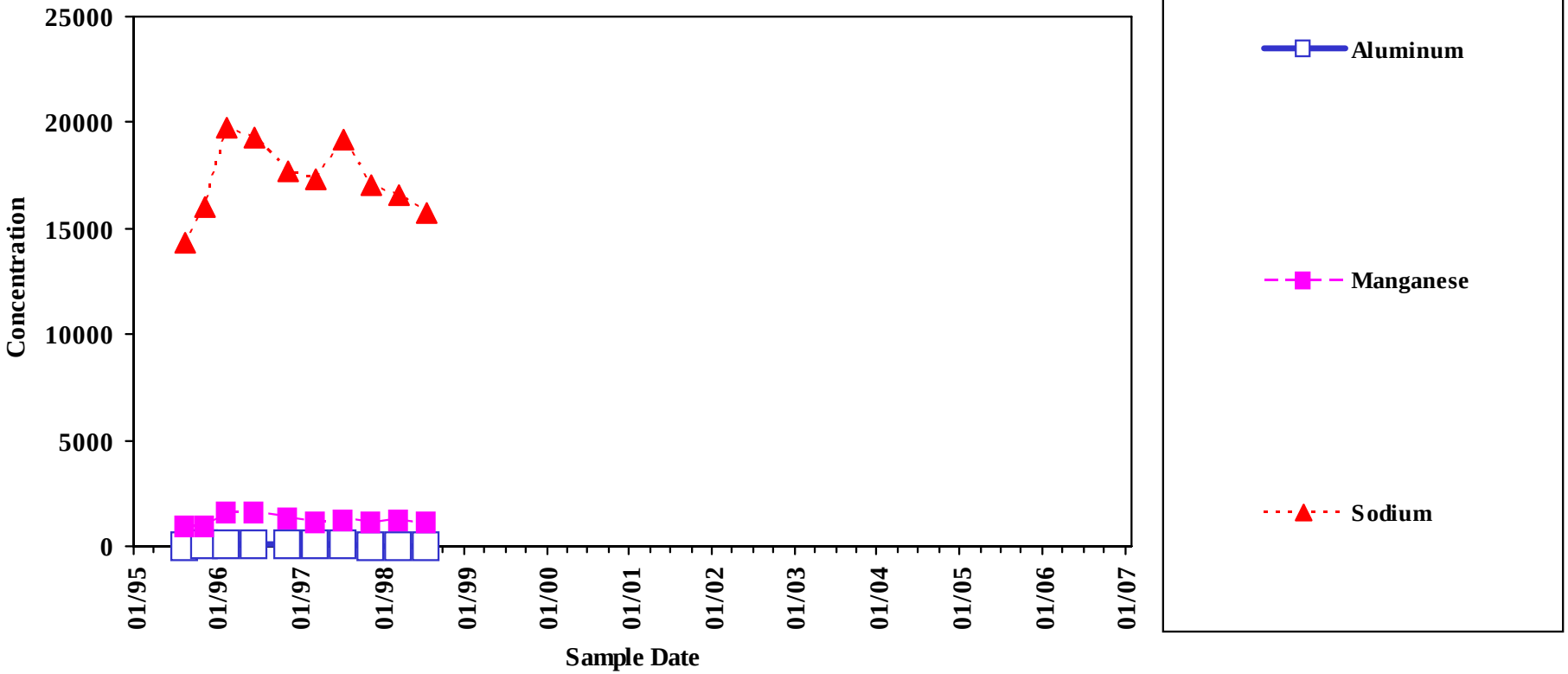
Sample Location:

MW-215R

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

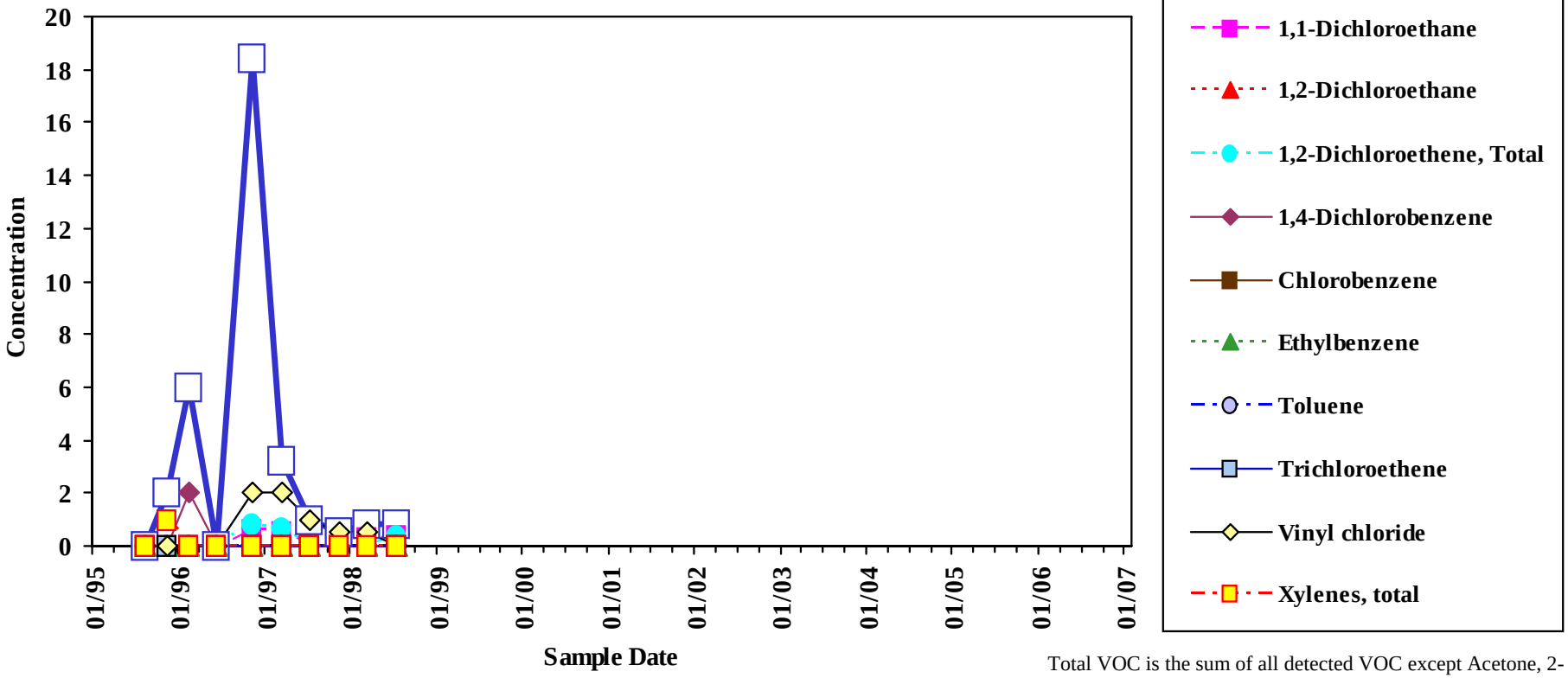
Sample Location:

MW-215R

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

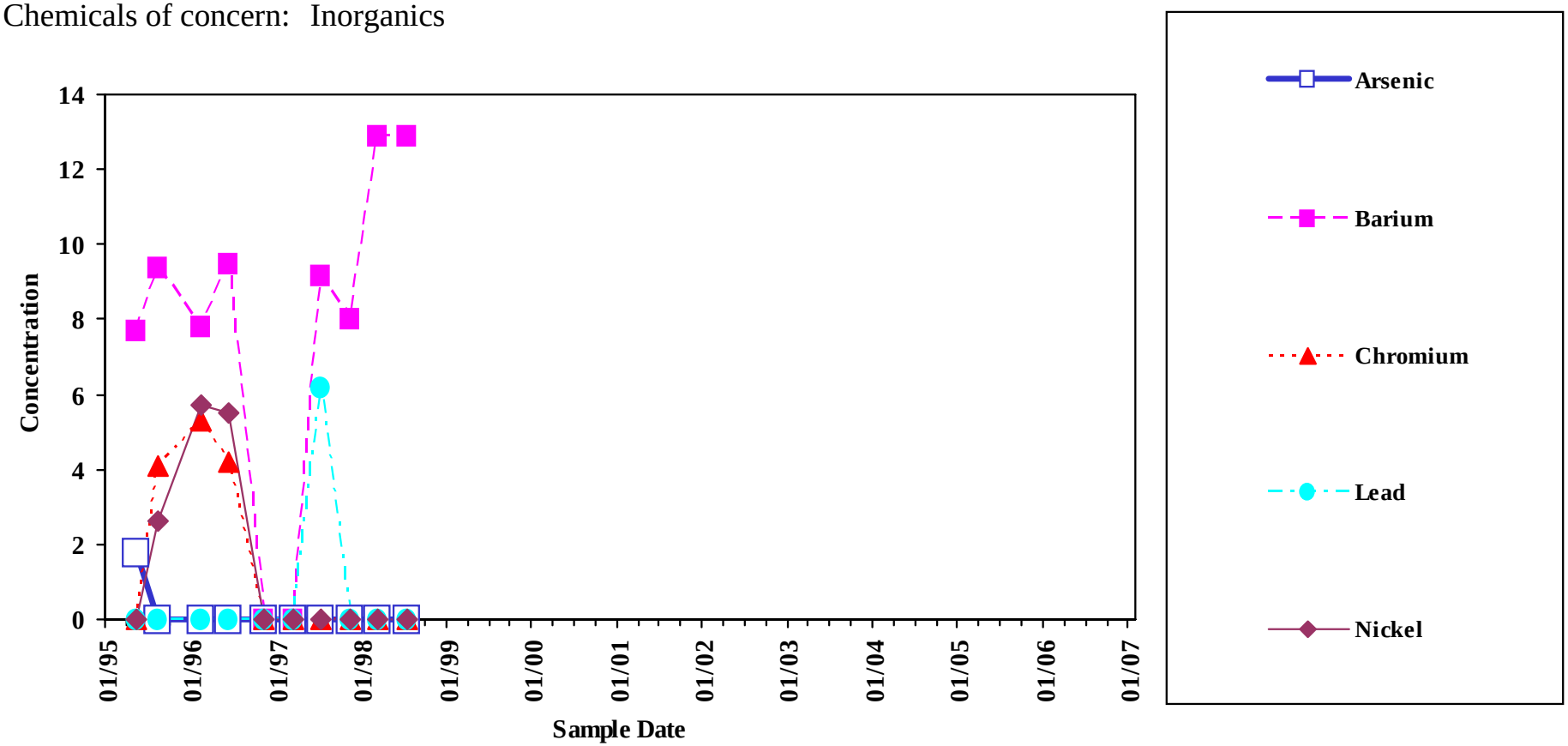
Sample Location:

MW-216A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

Chromium	Lead	Nickel
100	15	--

MCL	Arsenic	Barium
	10	2000

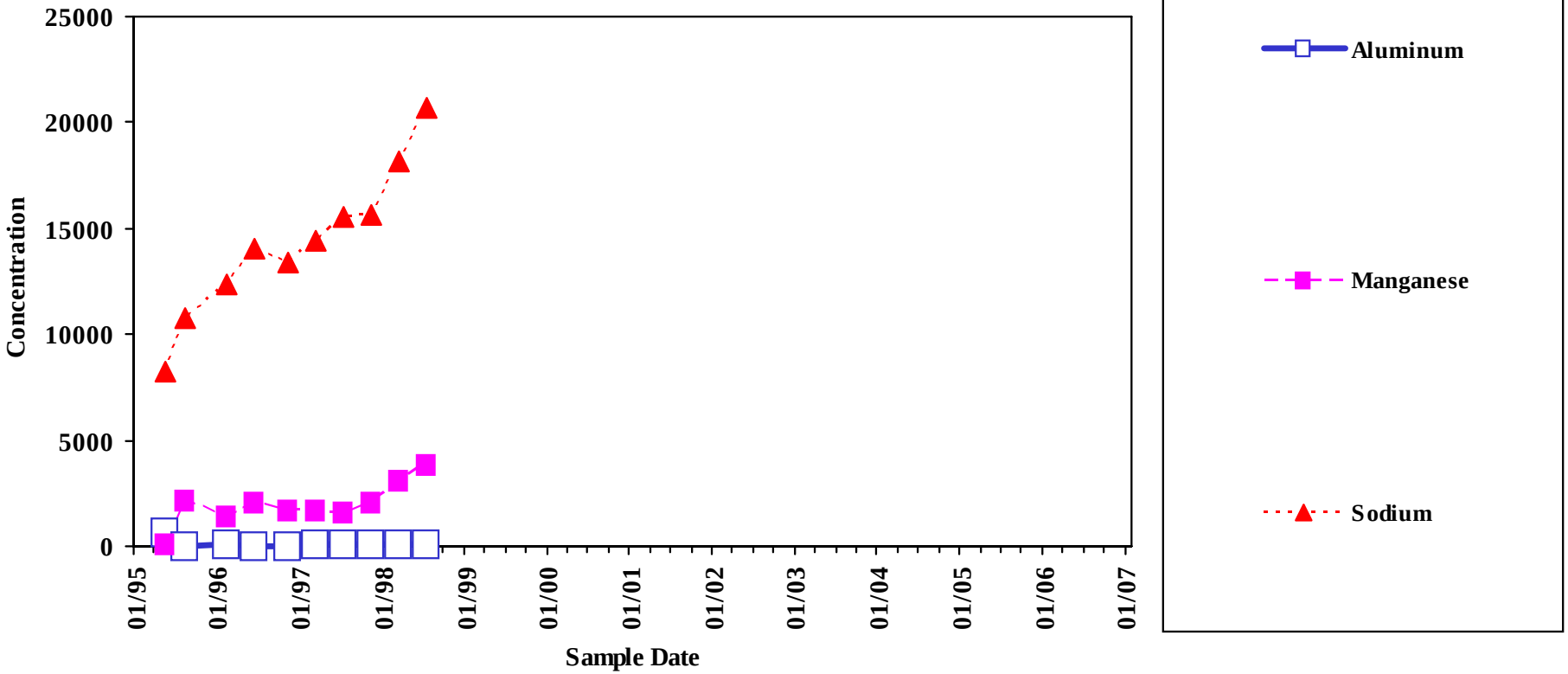
Sample Location:

MW-216A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

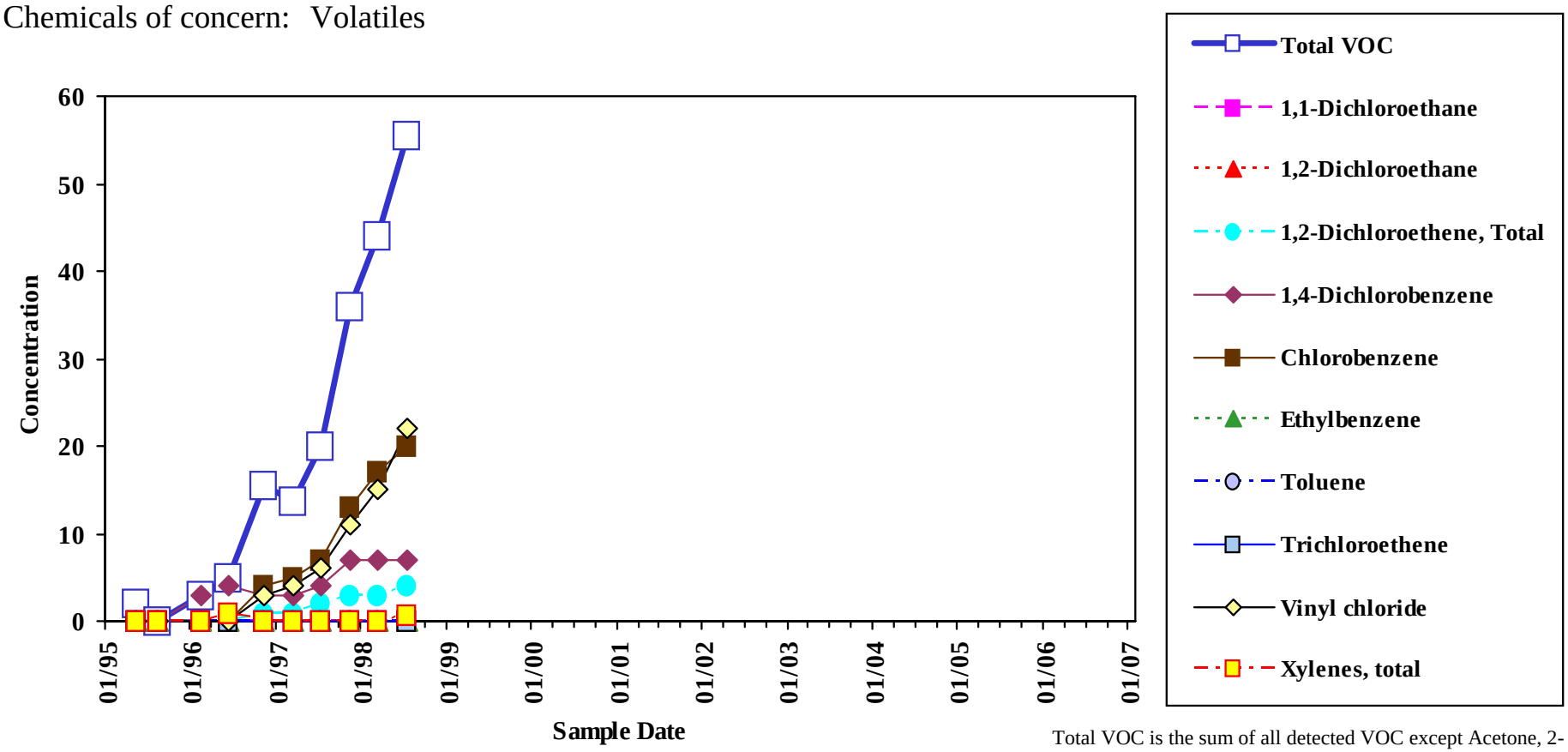
Sample Location:

MW-216A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

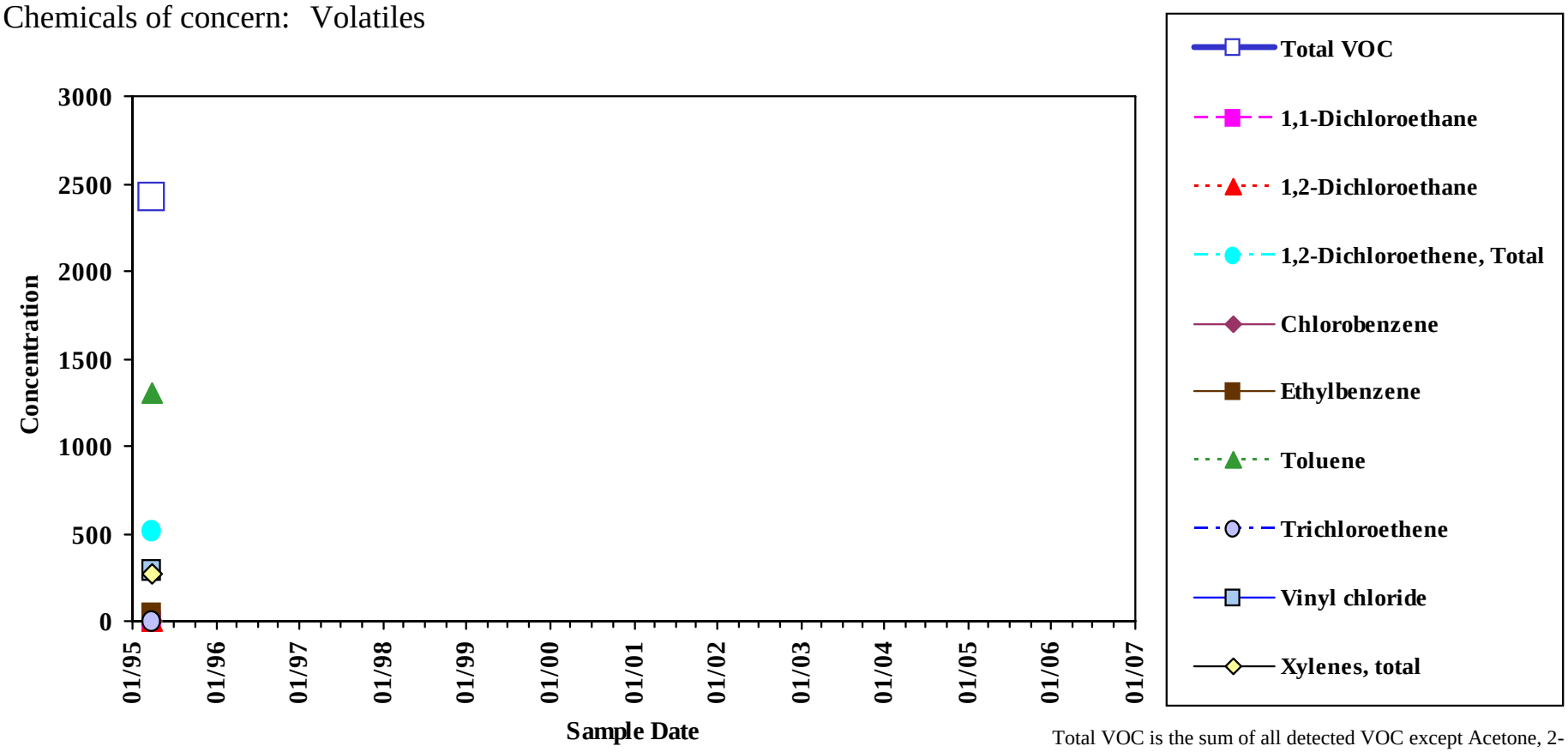
Sample Location:

MW-216B

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

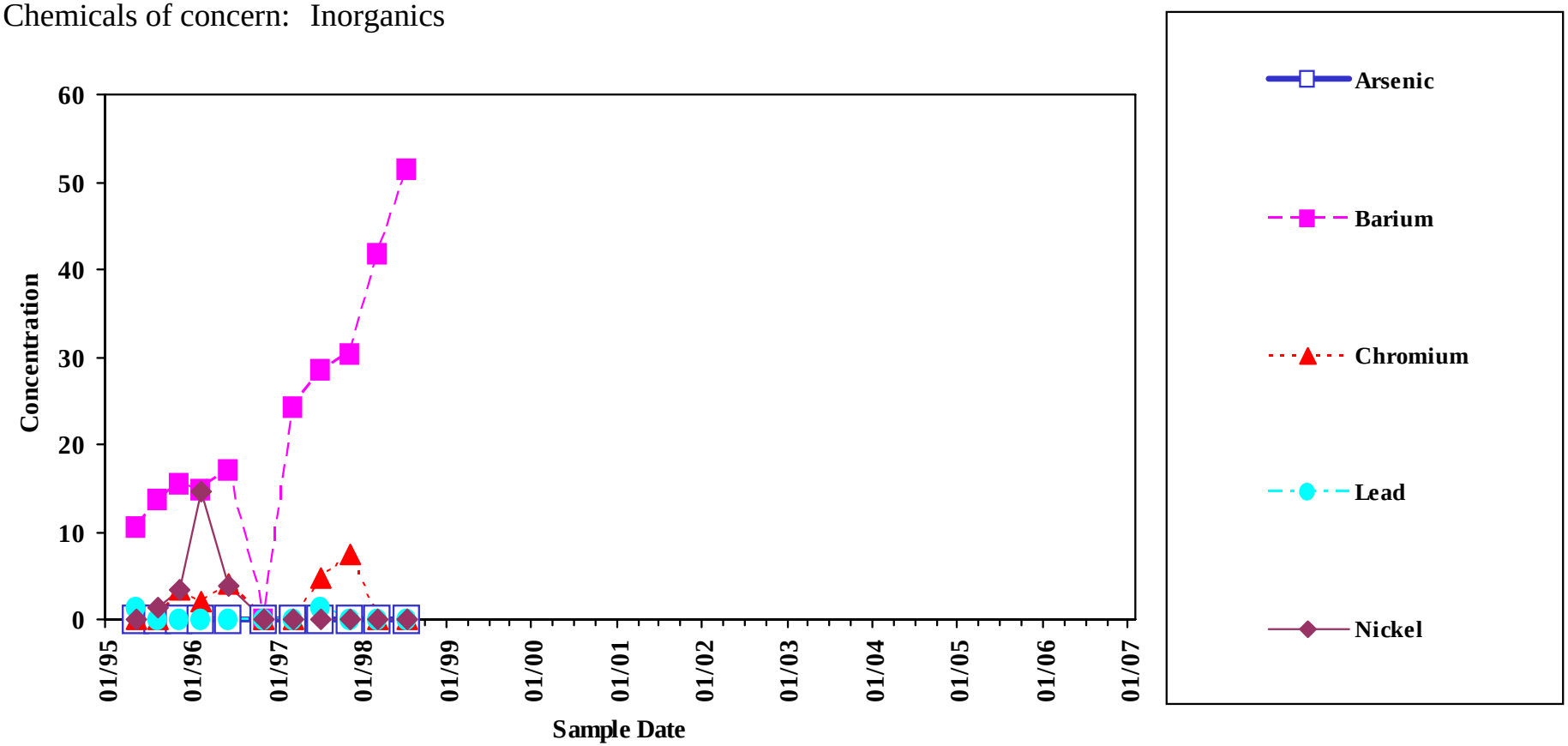
Sample Location:

MW-217A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

Chromium	Lead	Nickel
100	15	--

MCL	Arsenic	Barium
	10	2000

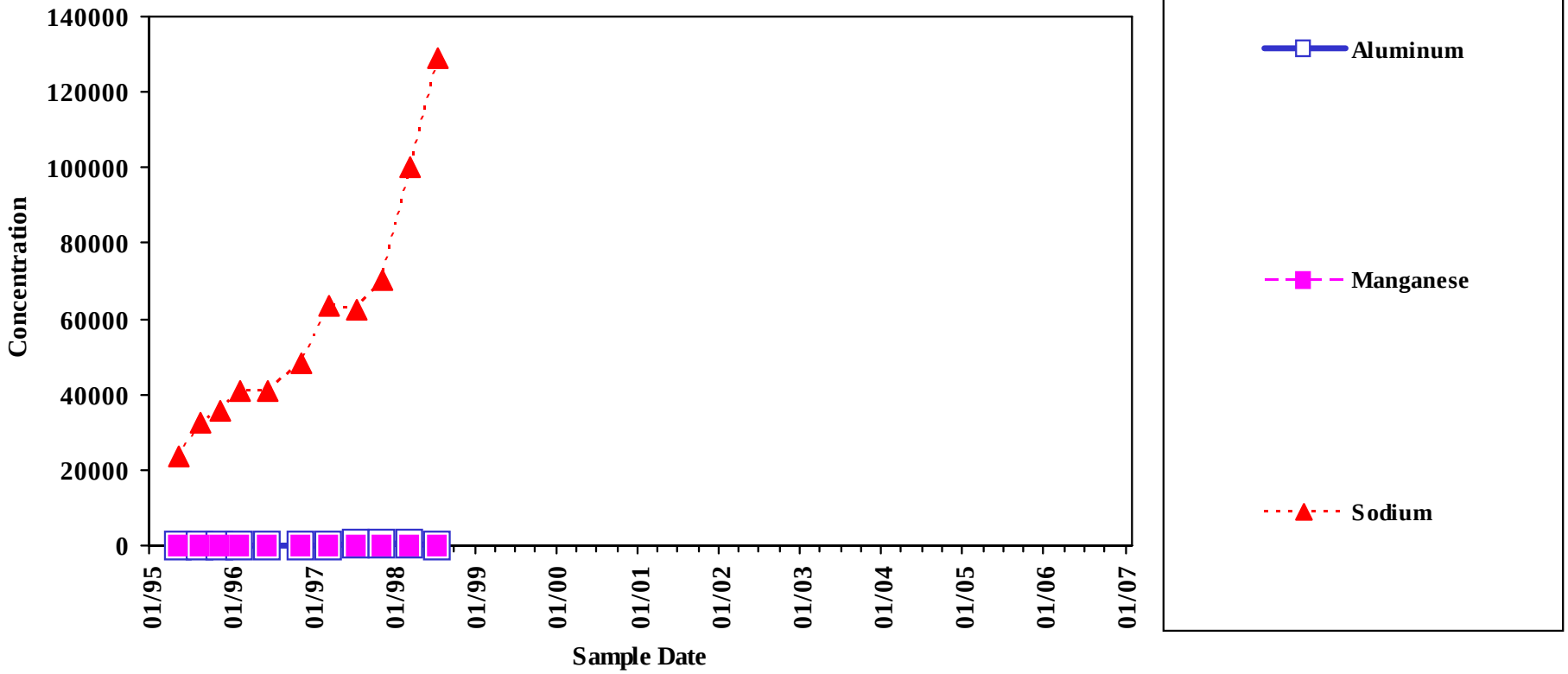
Sample Location:

MW-217A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

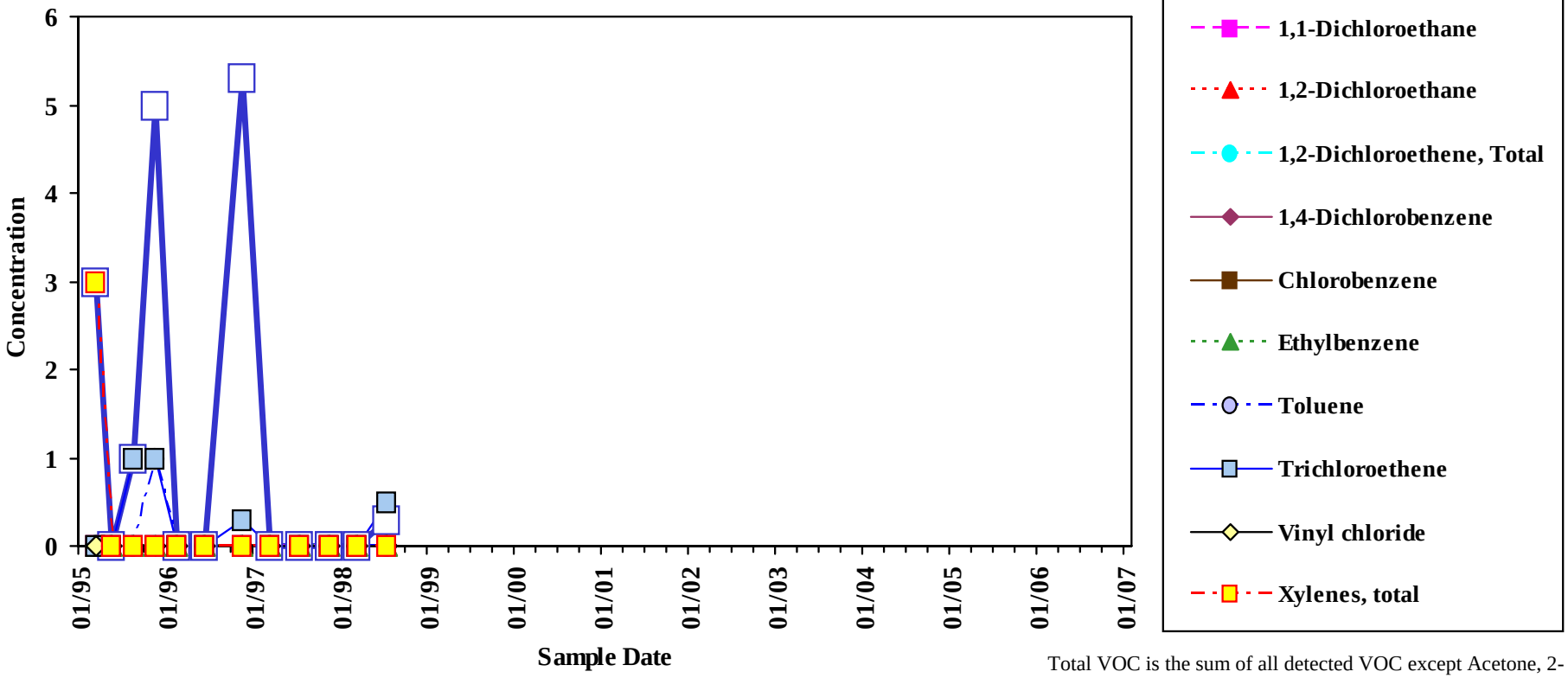
Sample Location:

MW-217A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

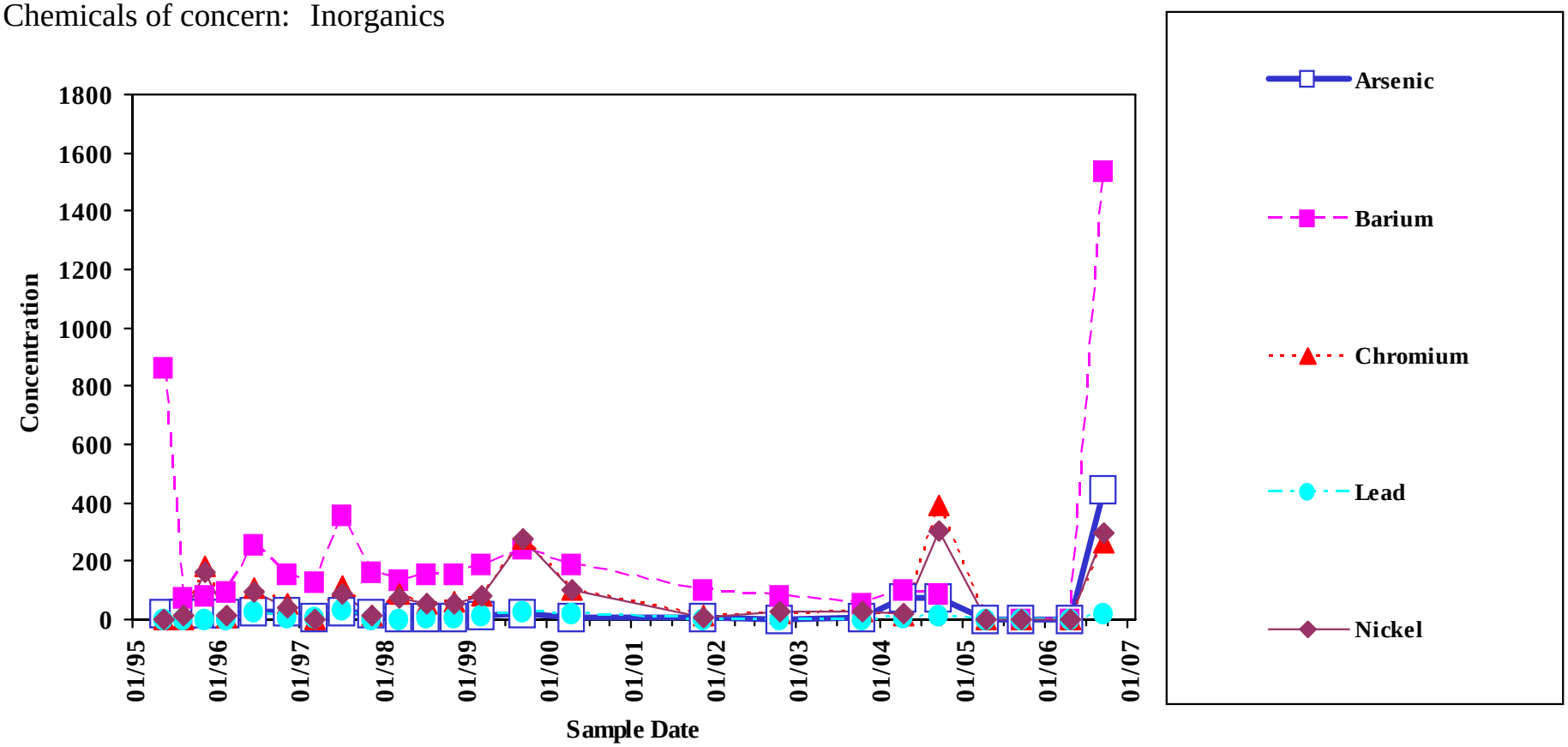
Sample Location:

MW-217B

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140
Chromium	Lead	Nickel			
100	15	--			

MCL	Arsenic	Barium
	10	2000

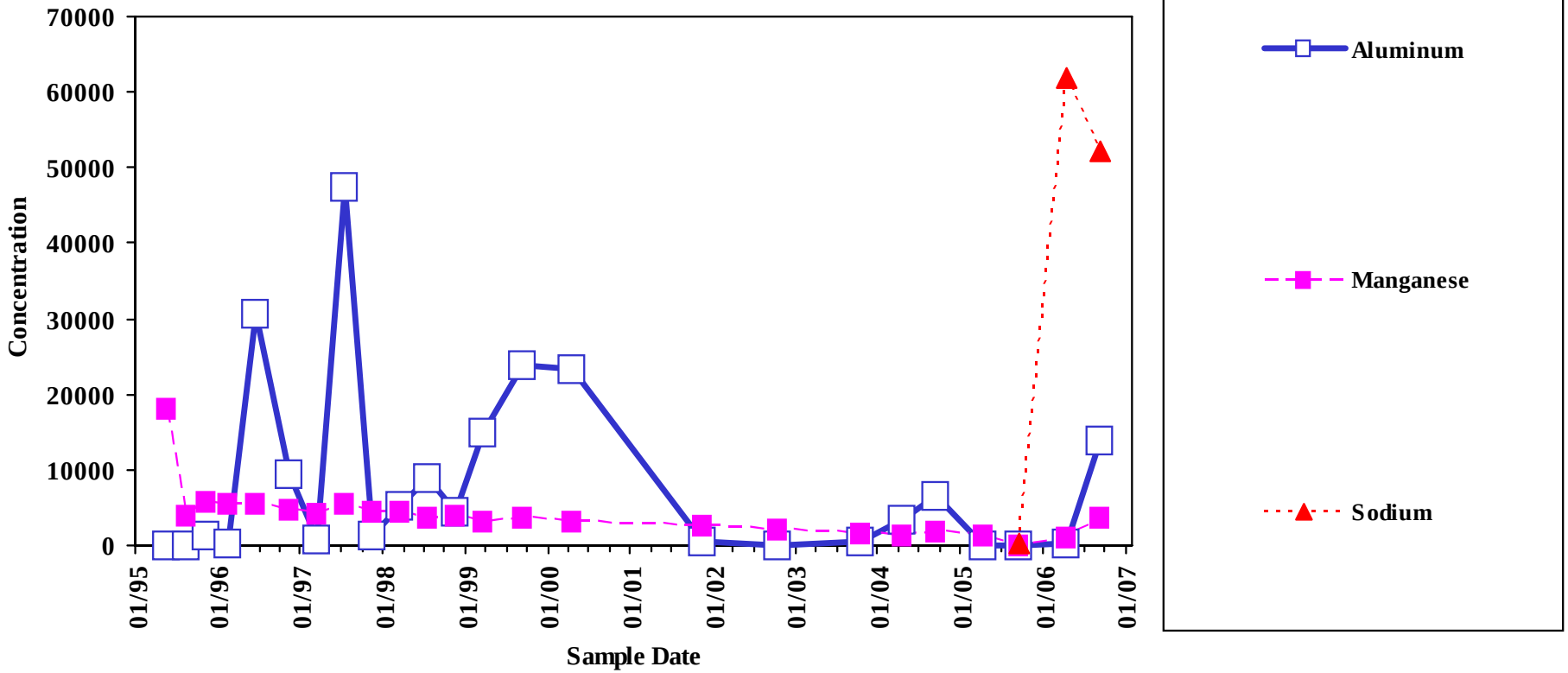
Sample Location:

MW-217B

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

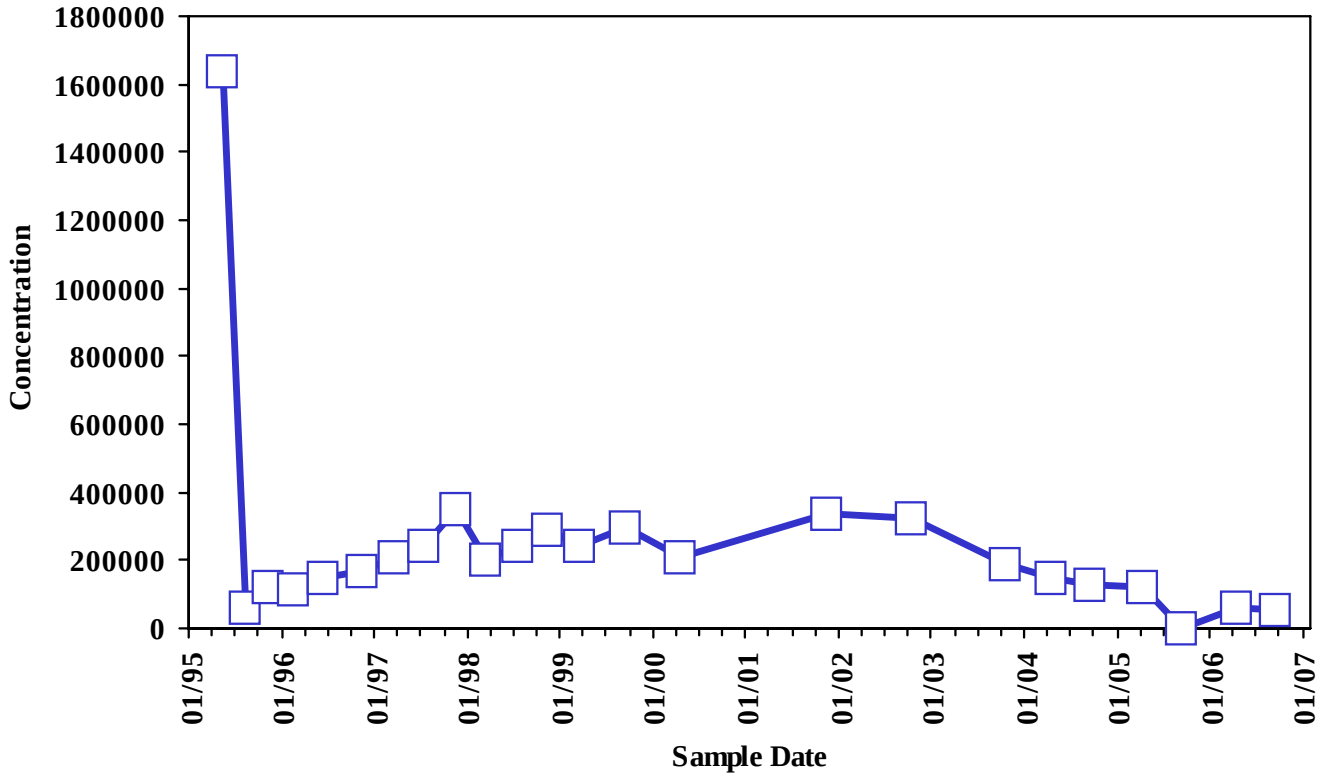
Sample Location:

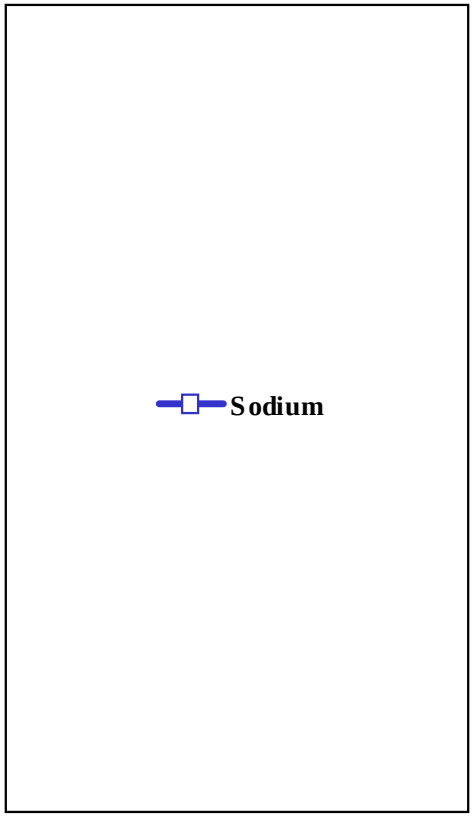
MW-217B

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics





Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Sodium	MCL	Sodium
	20000		--

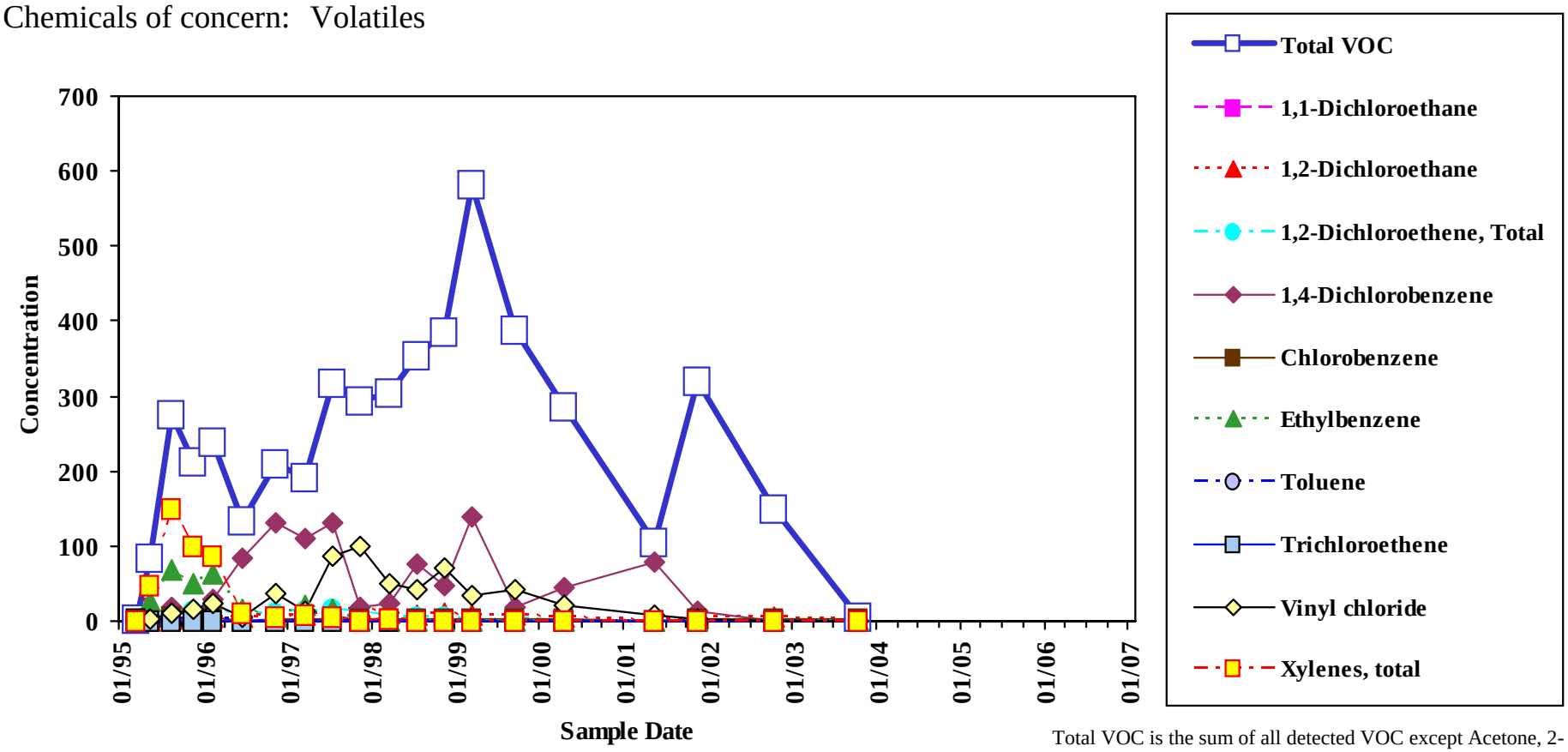
Sample Location:

MW-217B

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

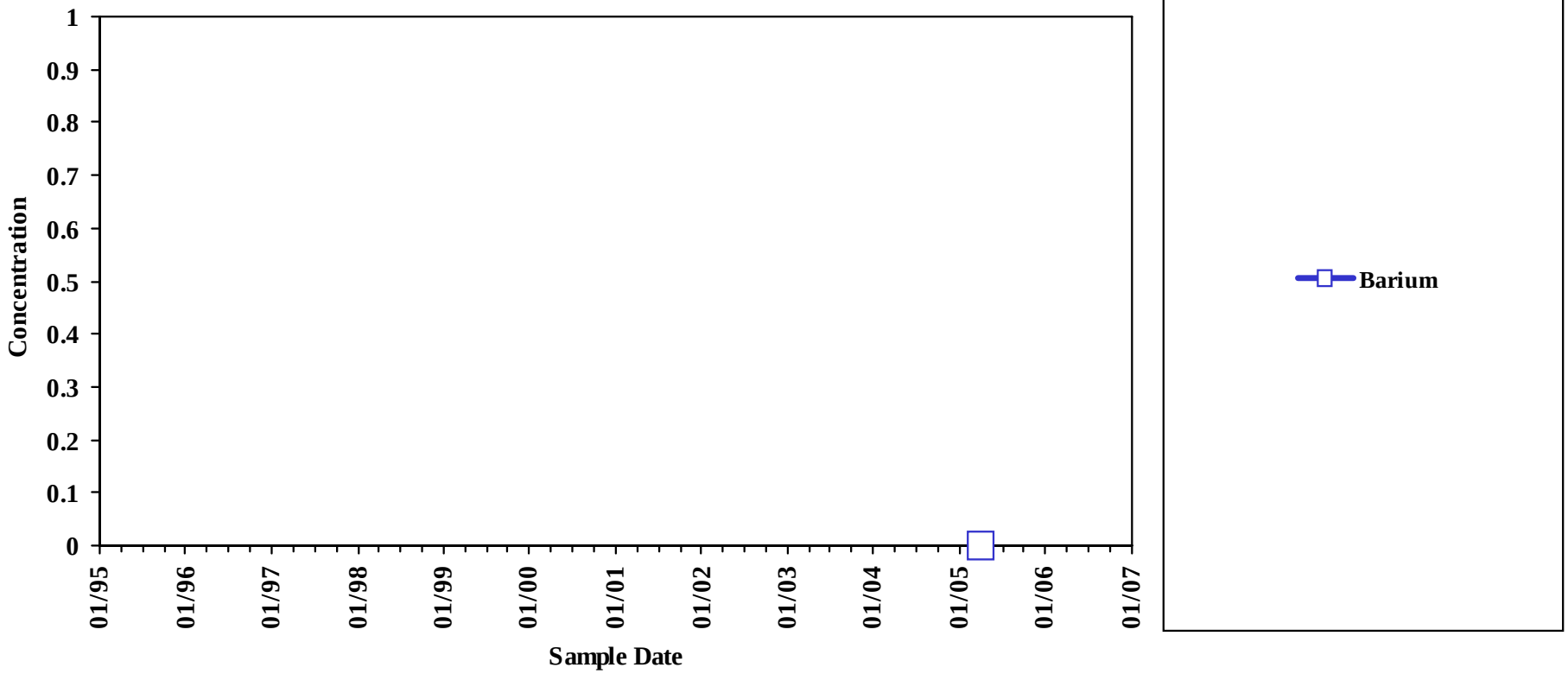
Sample Location:

MW-217B

Deep Diffusion Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

Chromium	Lead	Nickel
100	15	--

MCL	Arsenic	Barium
	10	2000

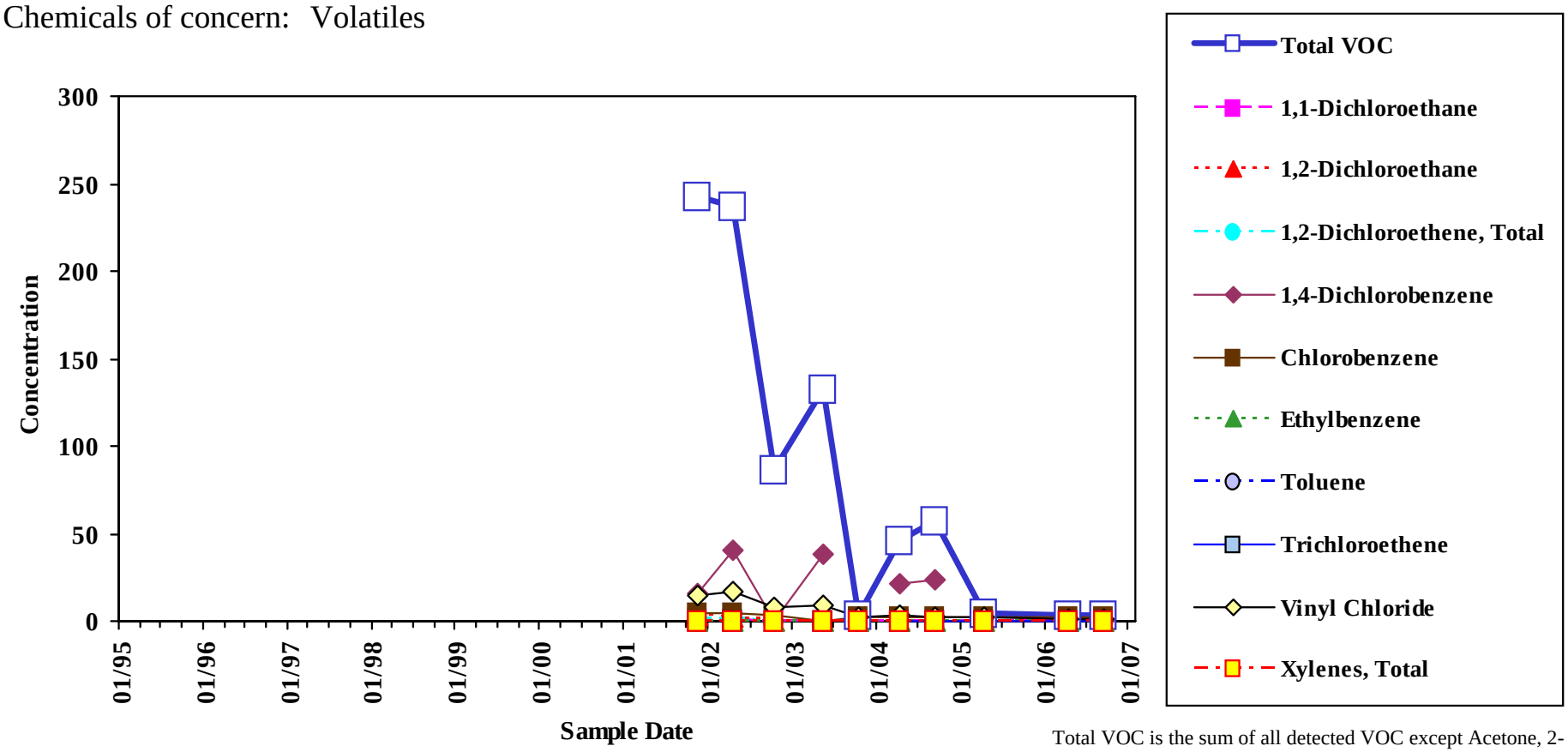
Sample Location:

MW-217B

Deep Diffusion Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

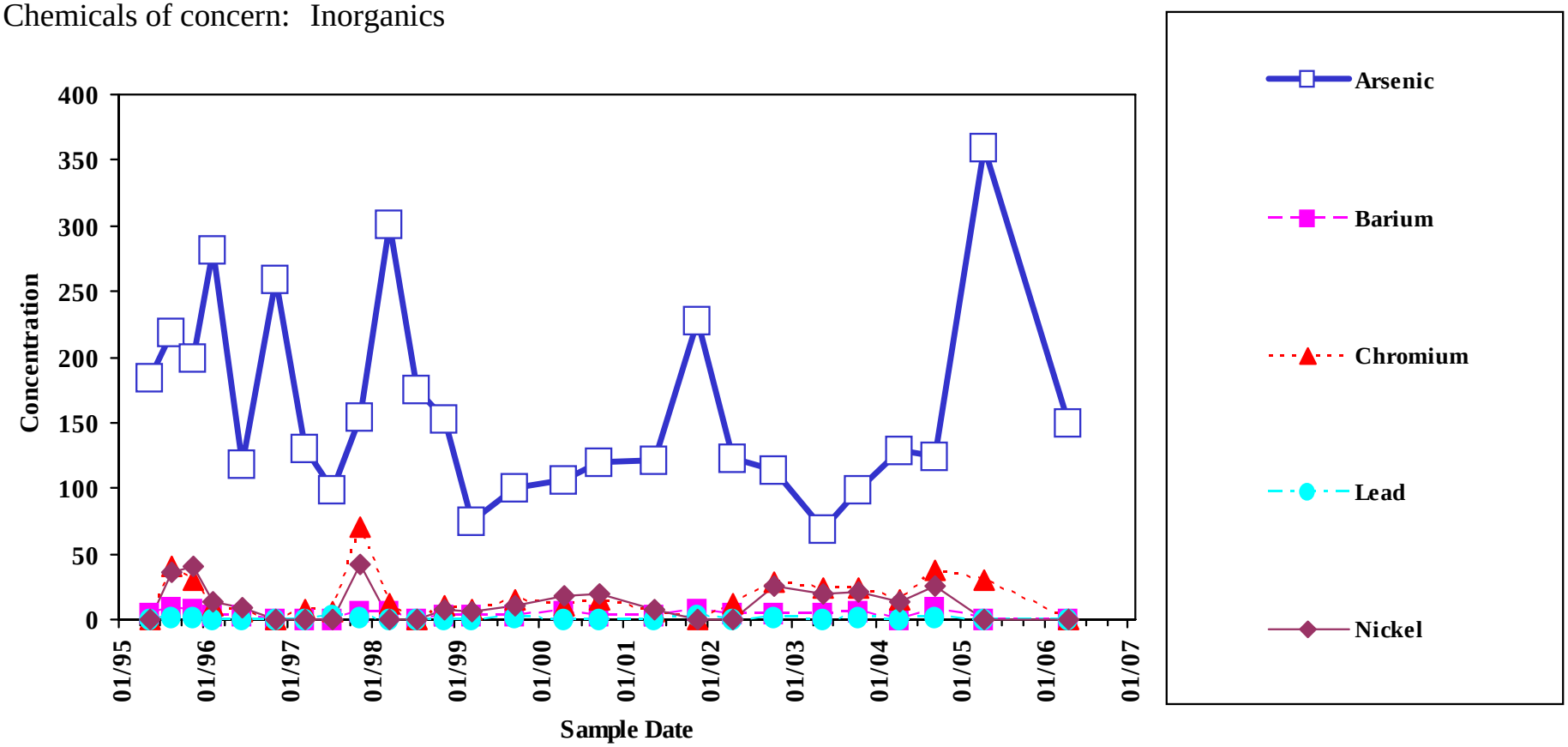
Sample Location:

MW-218

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140
Chromium	Lead	Nickel			
100	15	--			

MCL	Arsenic	Barium
	10	2000

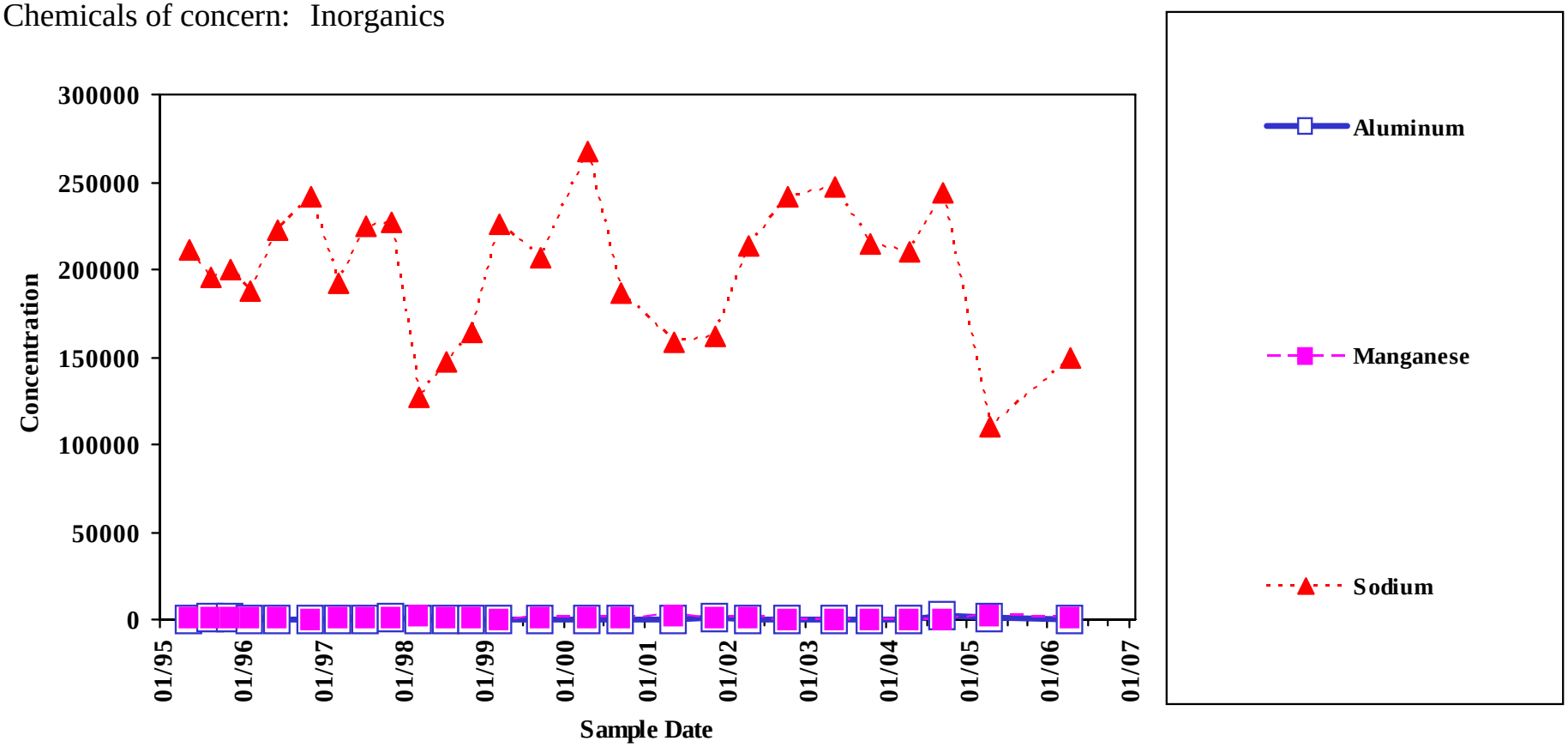
Sample Location:

MW-218

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

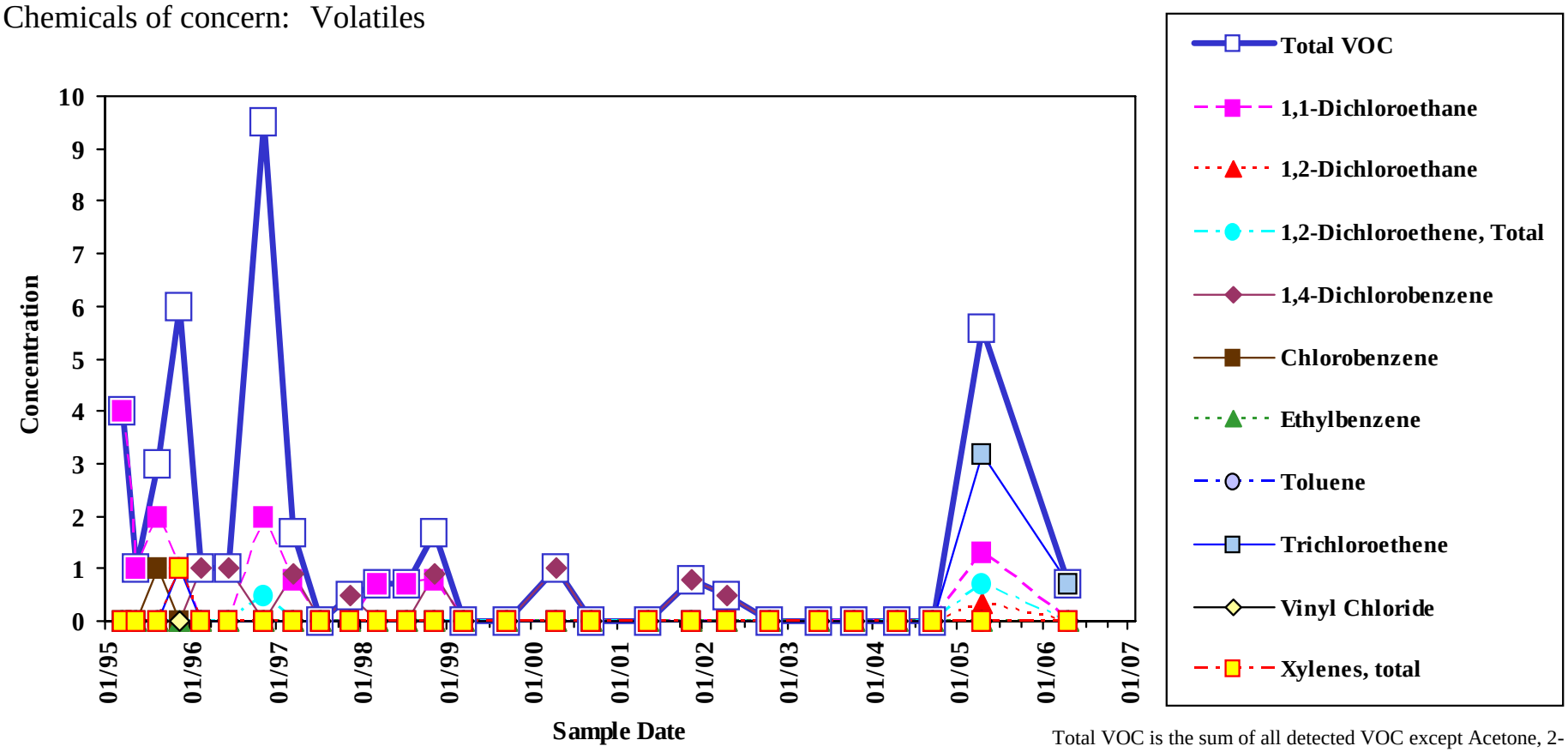
Sample Location:

MW-218

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

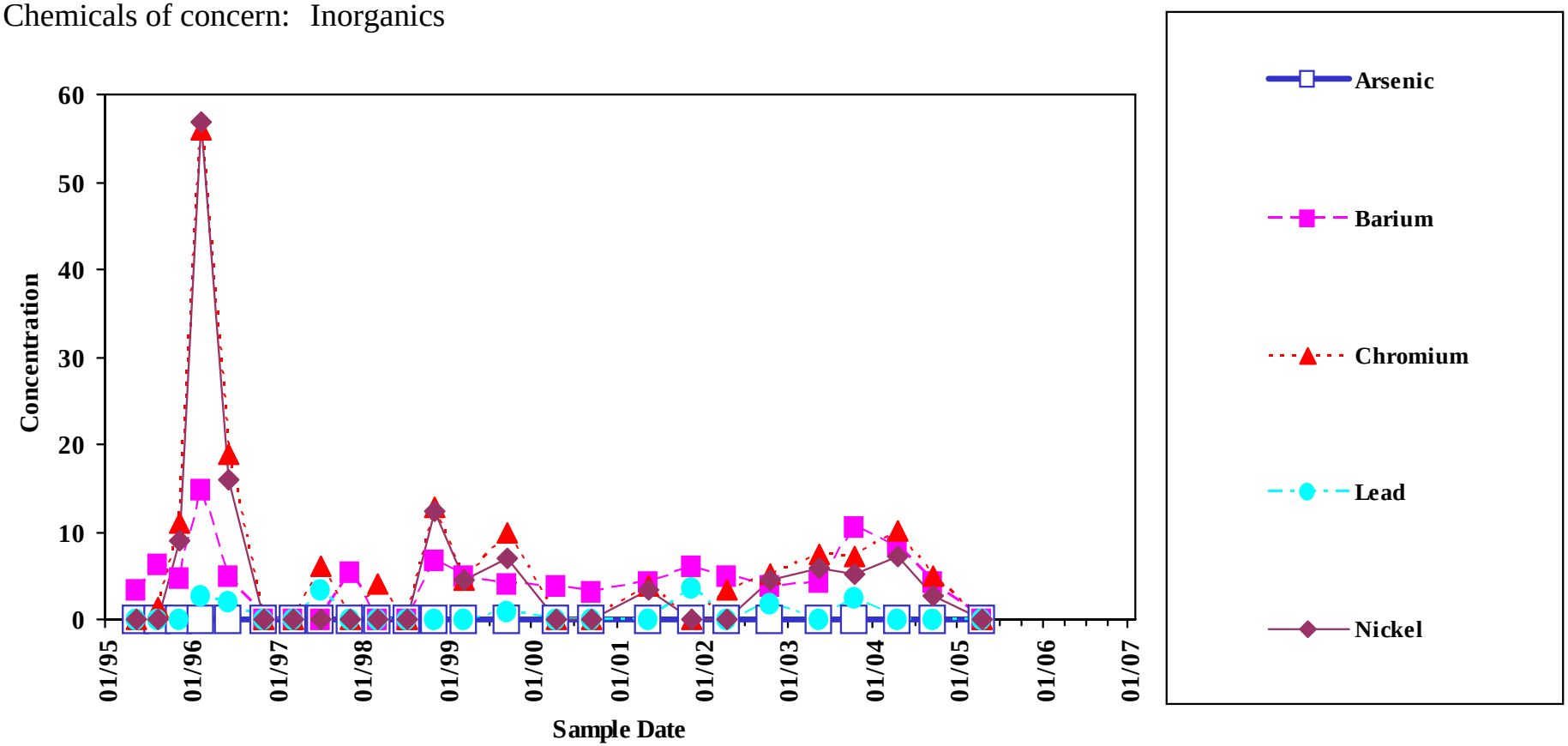
Sample Location:

MW-219

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

MCL	Arsenic	Barium
	10	2000

Chromium	Lead	Nickel
100	15	--

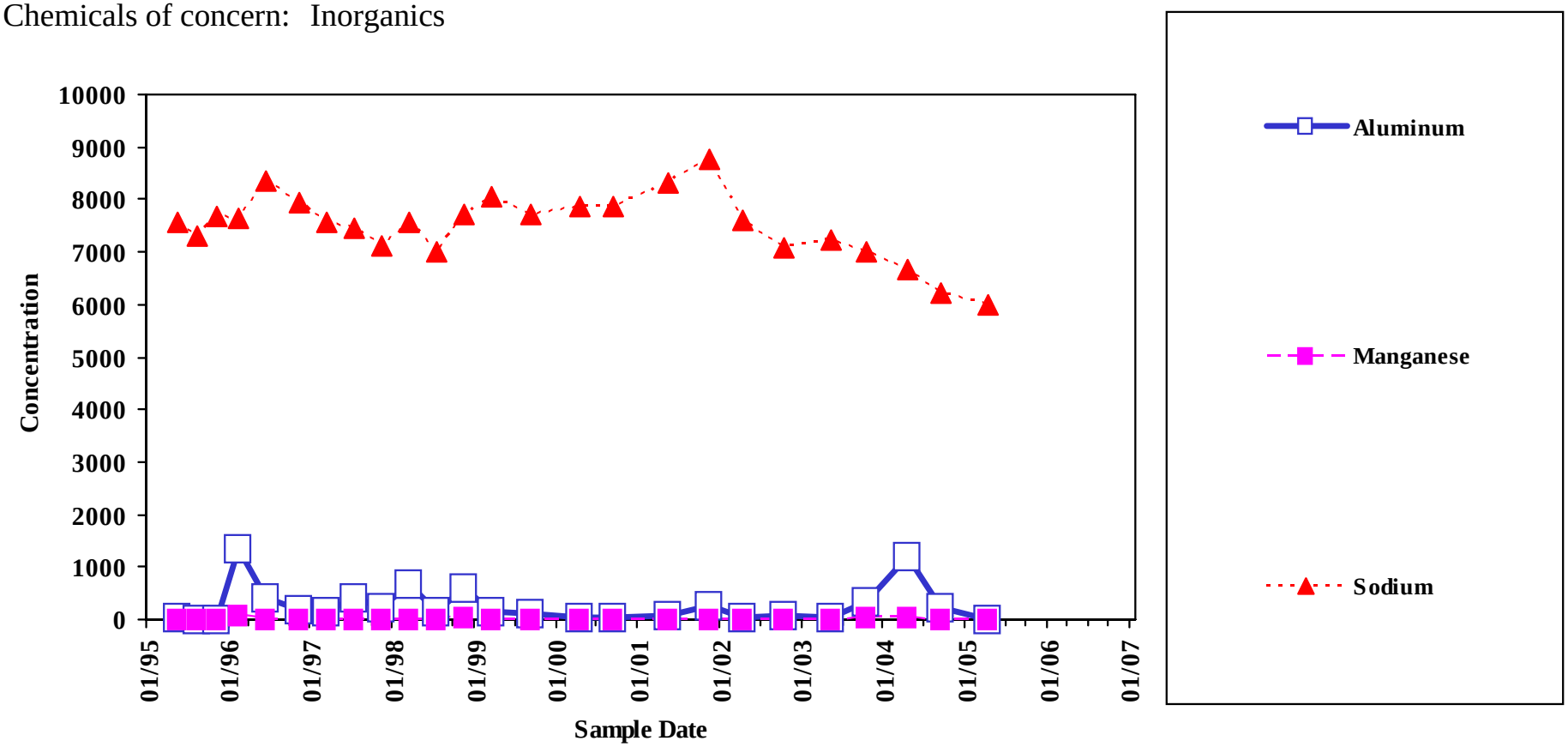
Sample Location:

MW-219

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

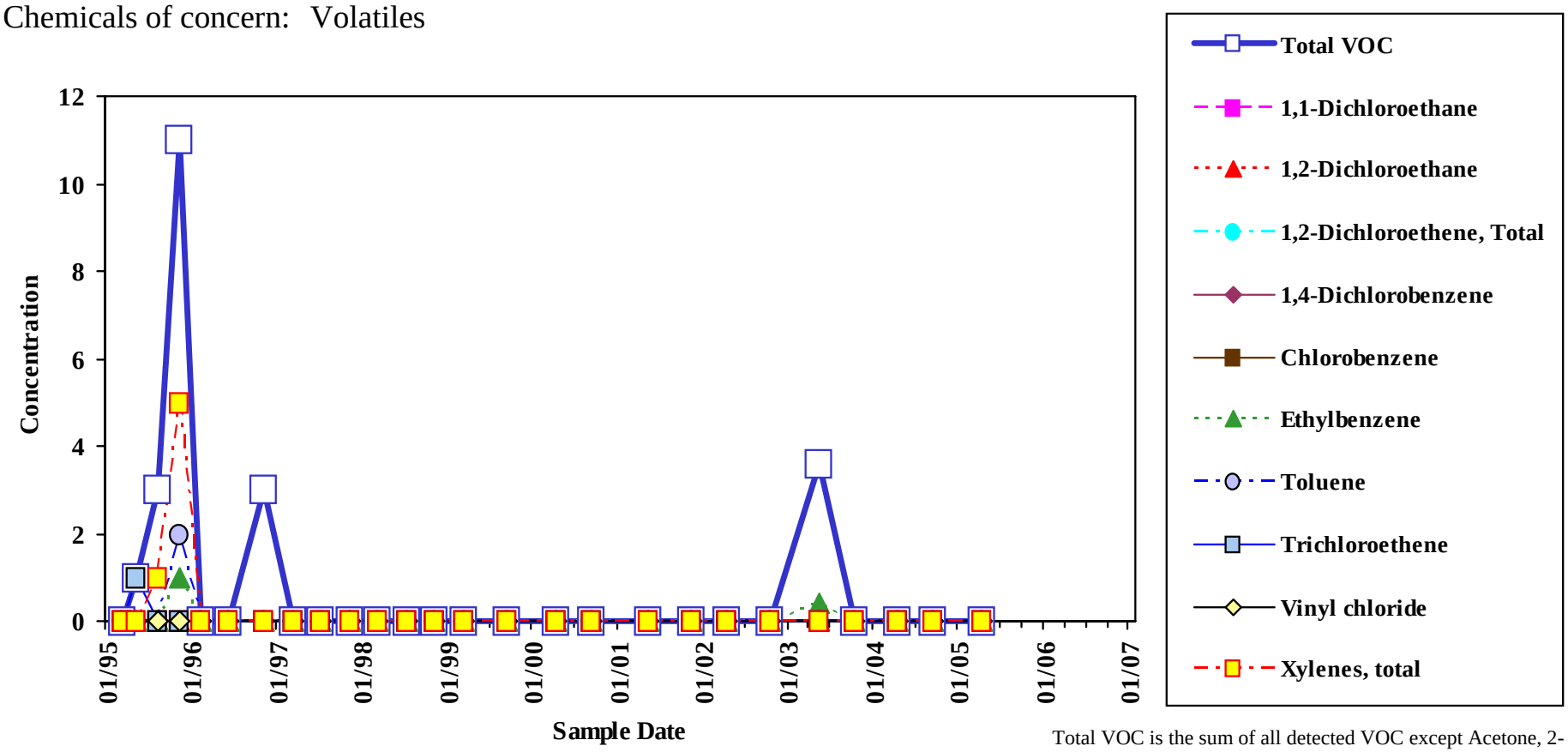
Sample Location:

MW-219

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

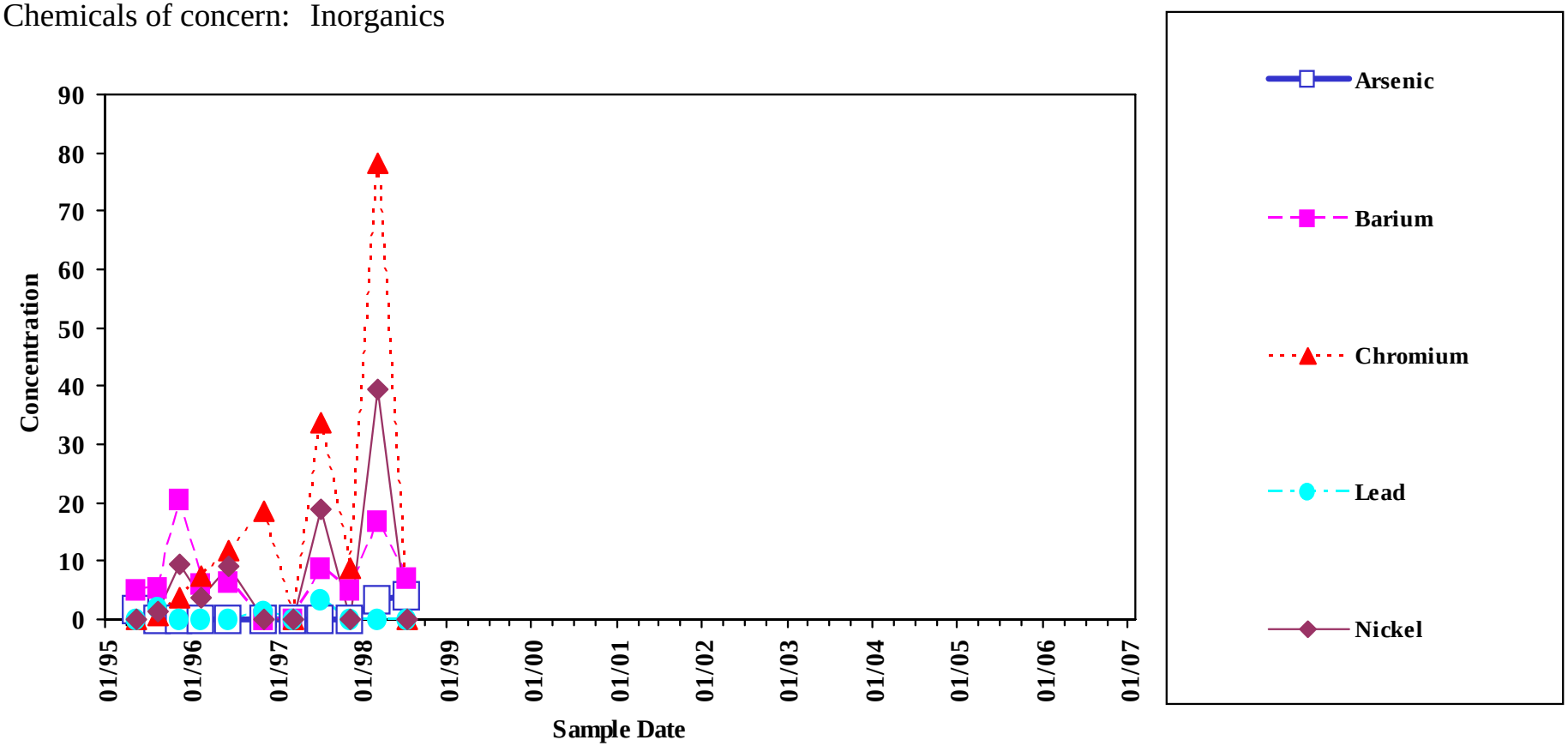
Sample Location:

MW-220

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

MCL	Arsenic	Barium
	10	2000

Chromium	Lead	Nickel
100	15	--

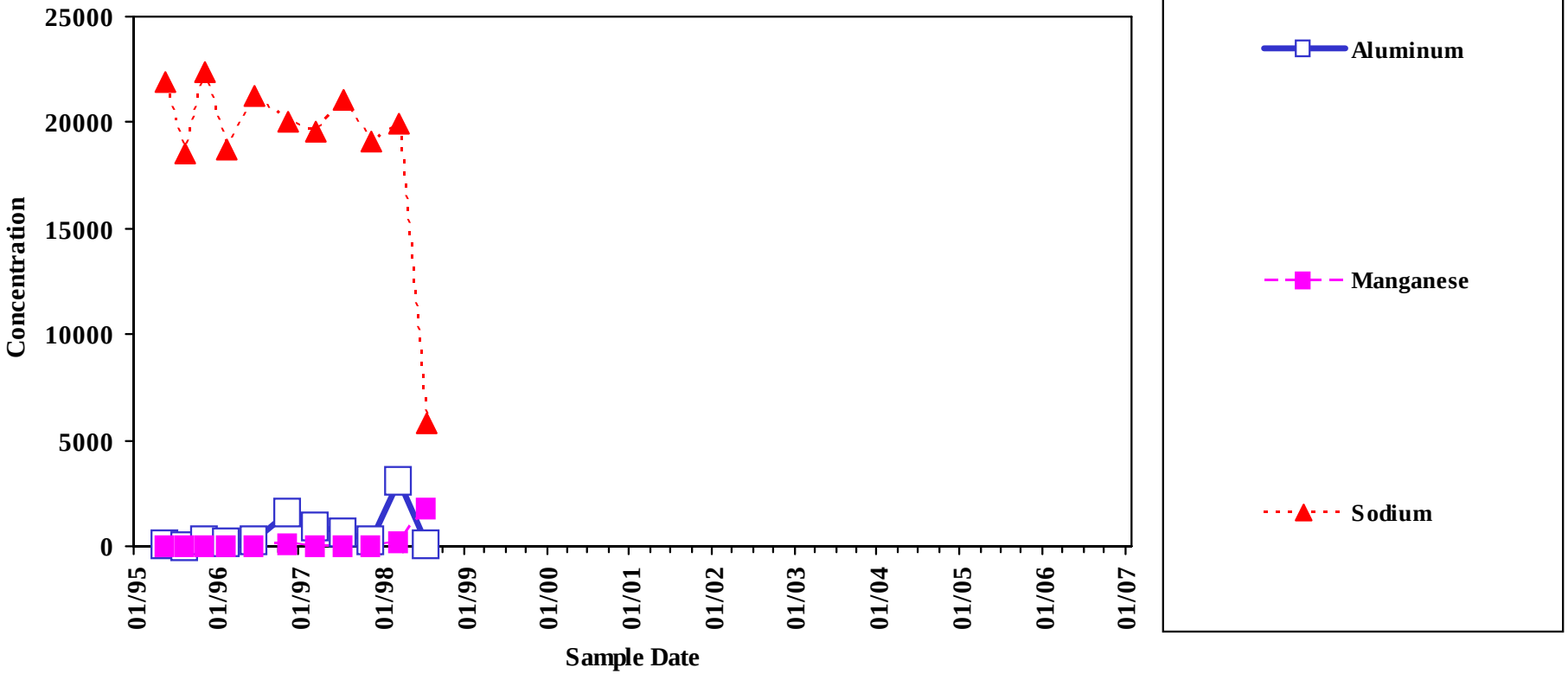
Sample Location:

MW-220

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

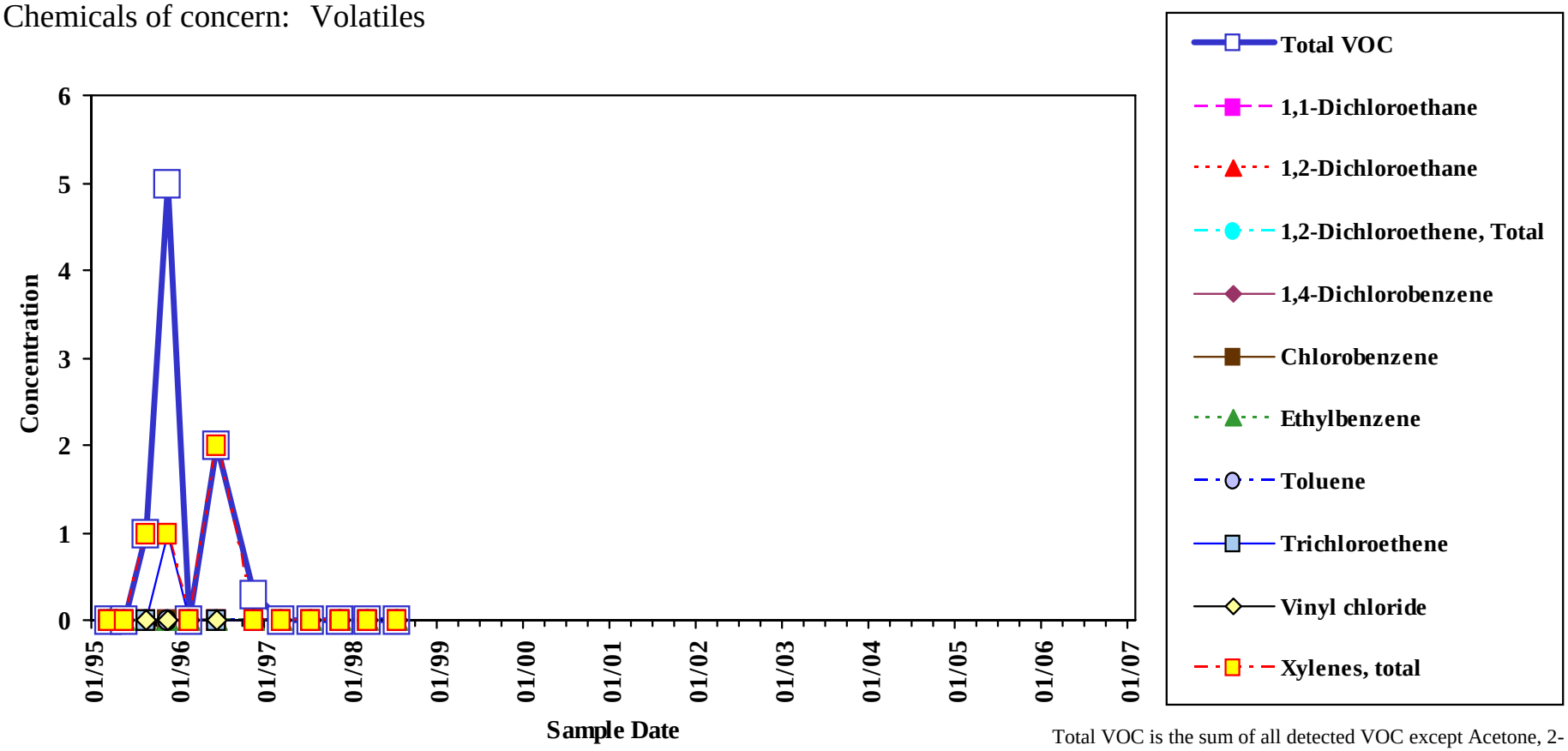
Sample Location:

MW-220

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

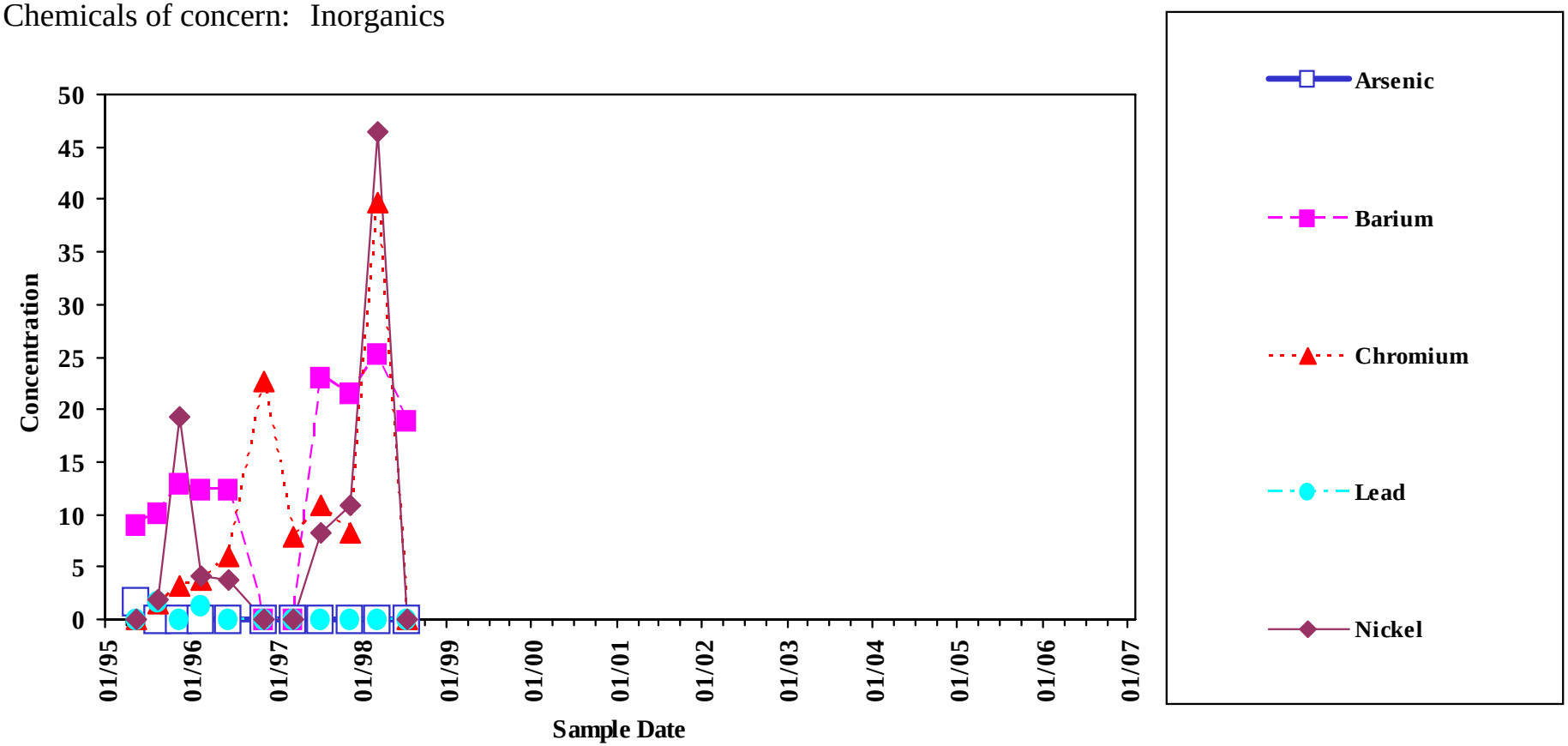
Sample Location:

MW-232A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140
Chromium	Lead	Nickel			
100	15	--			

MCL	Arsenic	Barium
	10	2000

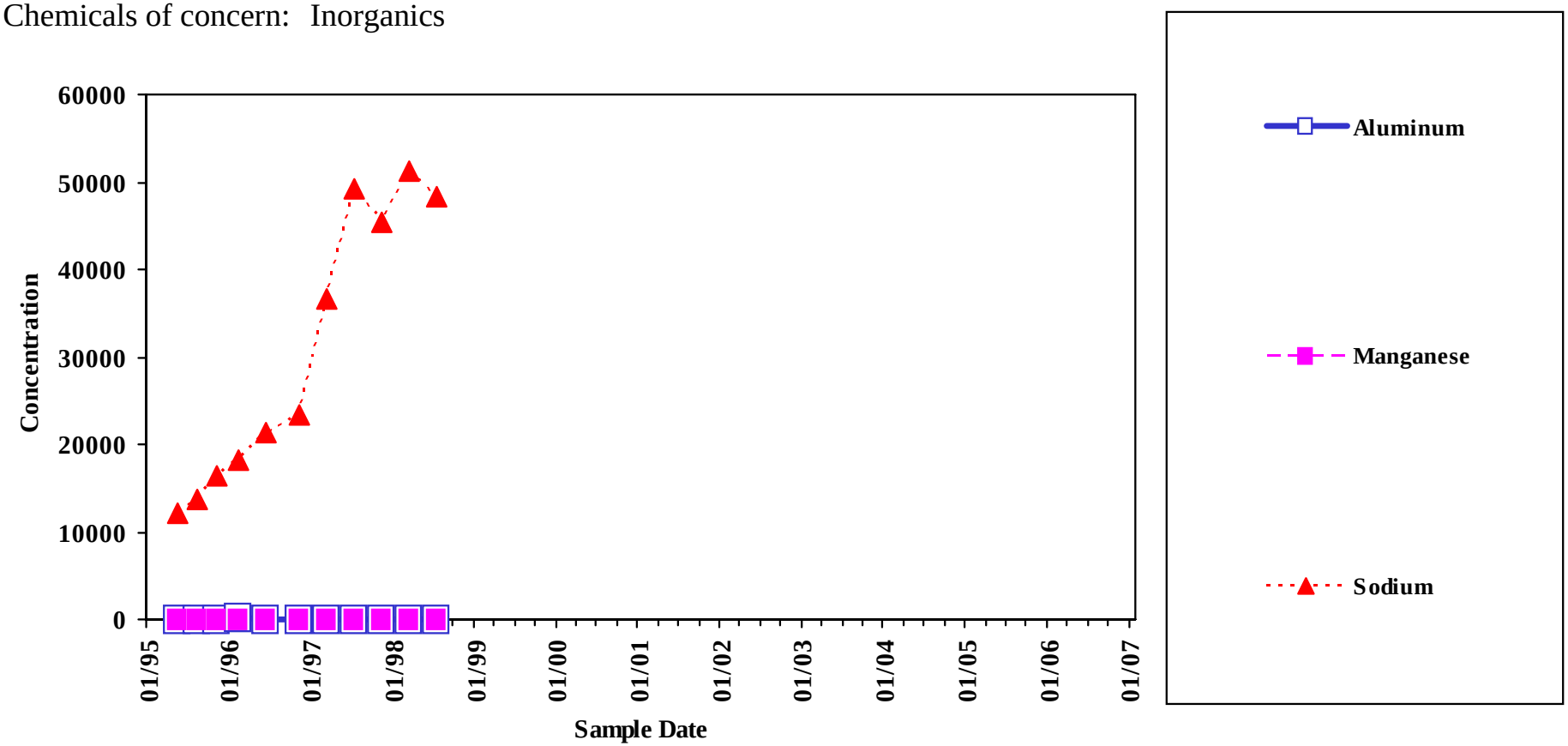
Sample Location:

MW-232A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

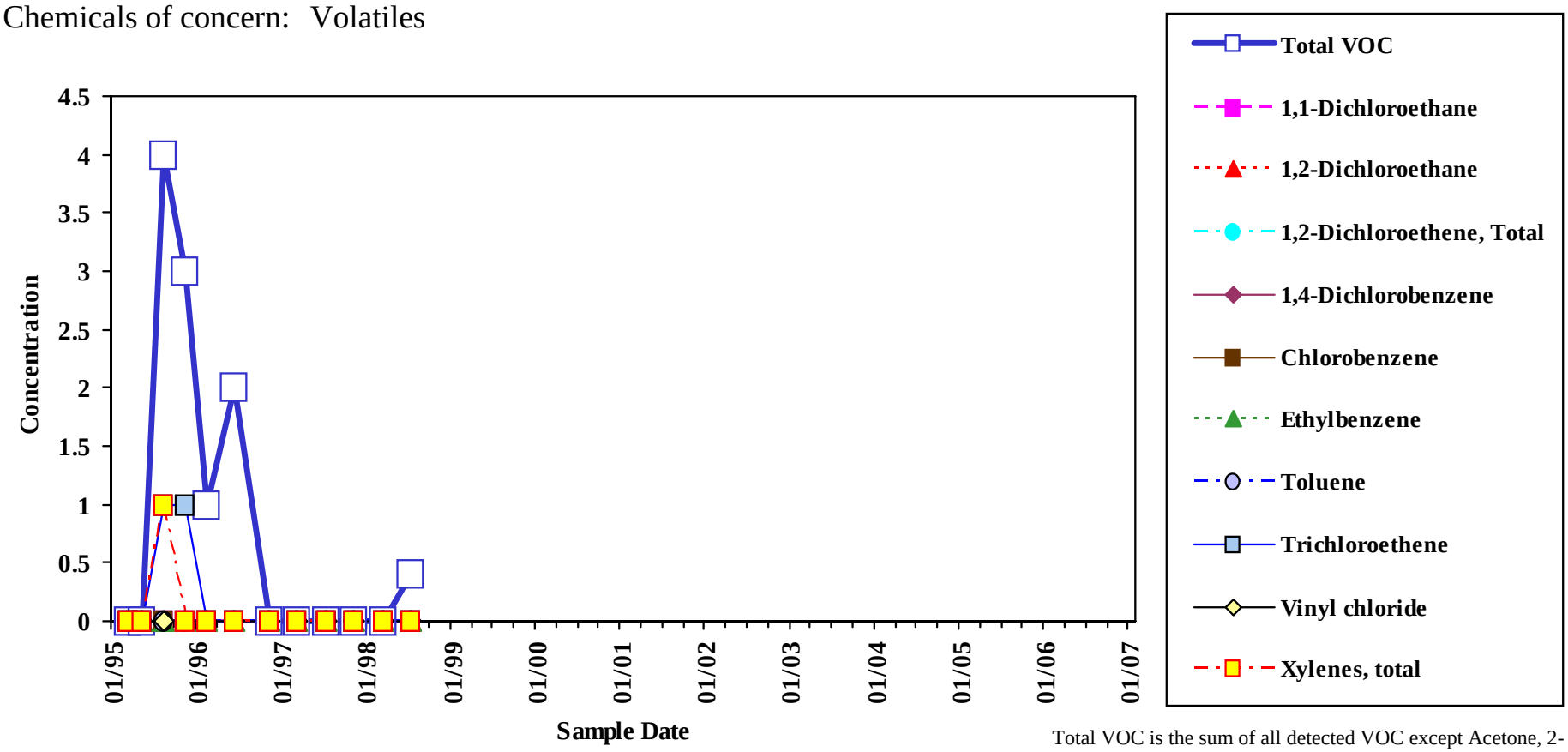
Sample Location:

MW-232A

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

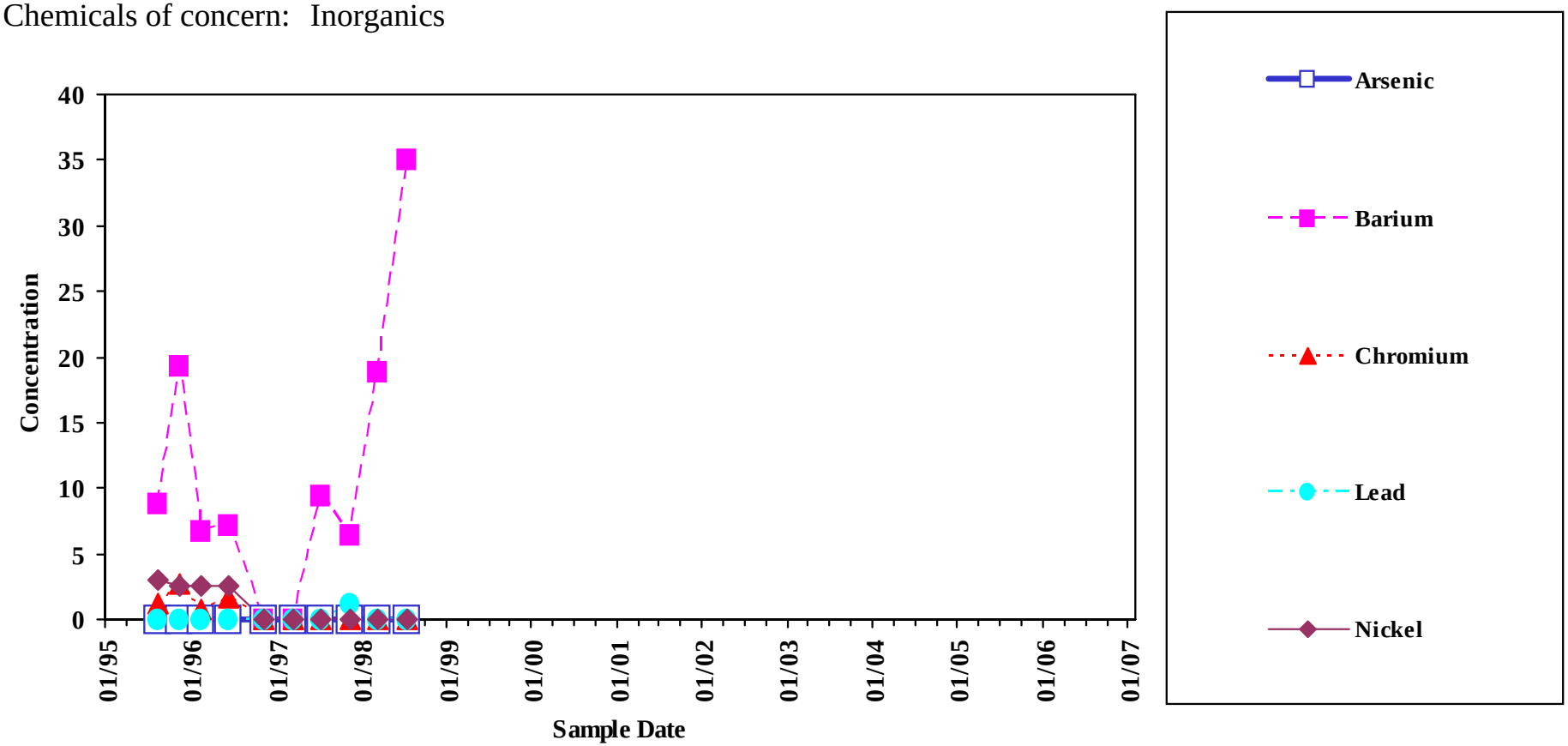
Sample Location:

MW-234R

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

MCL	Arsenic	Barium
	10	2000

Chromium	Lead	Nickel
100	15	--

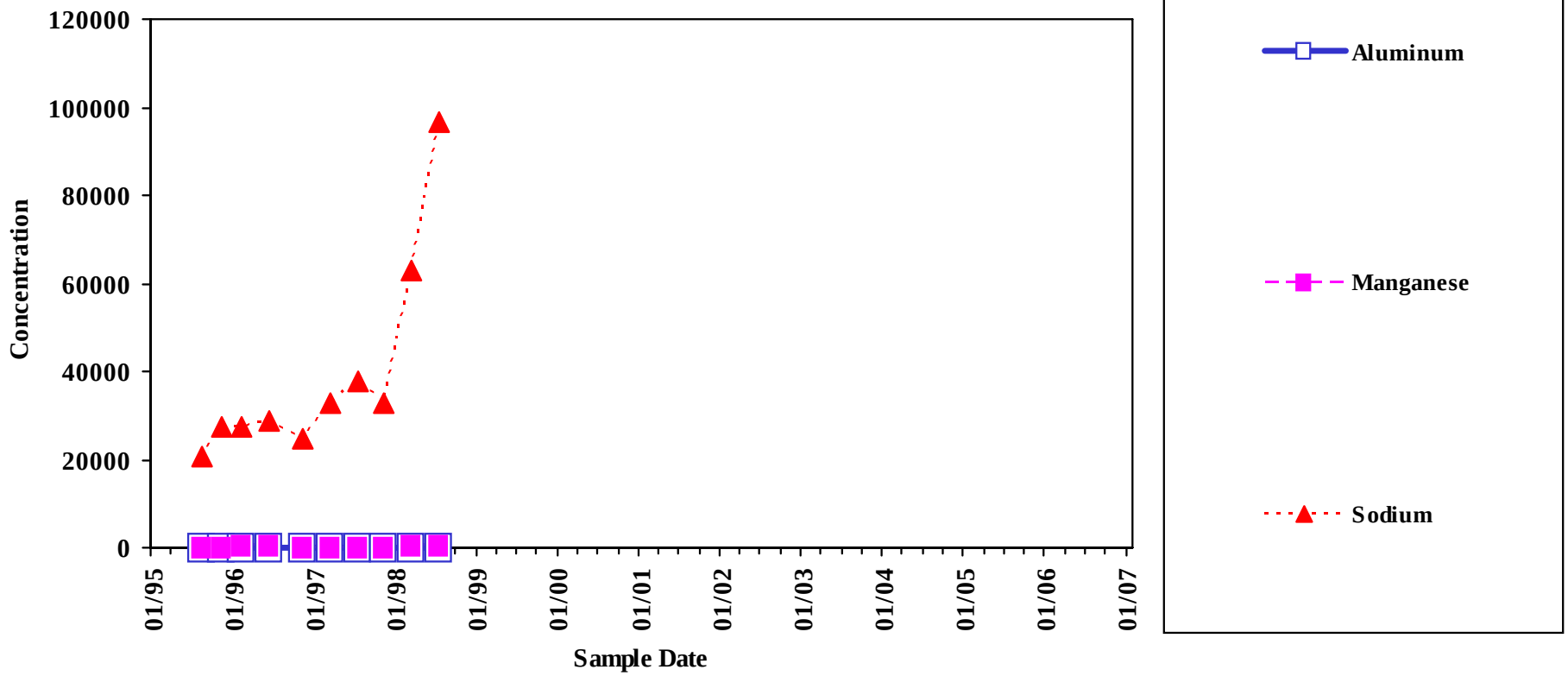
Sample Location:

MW-234R

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

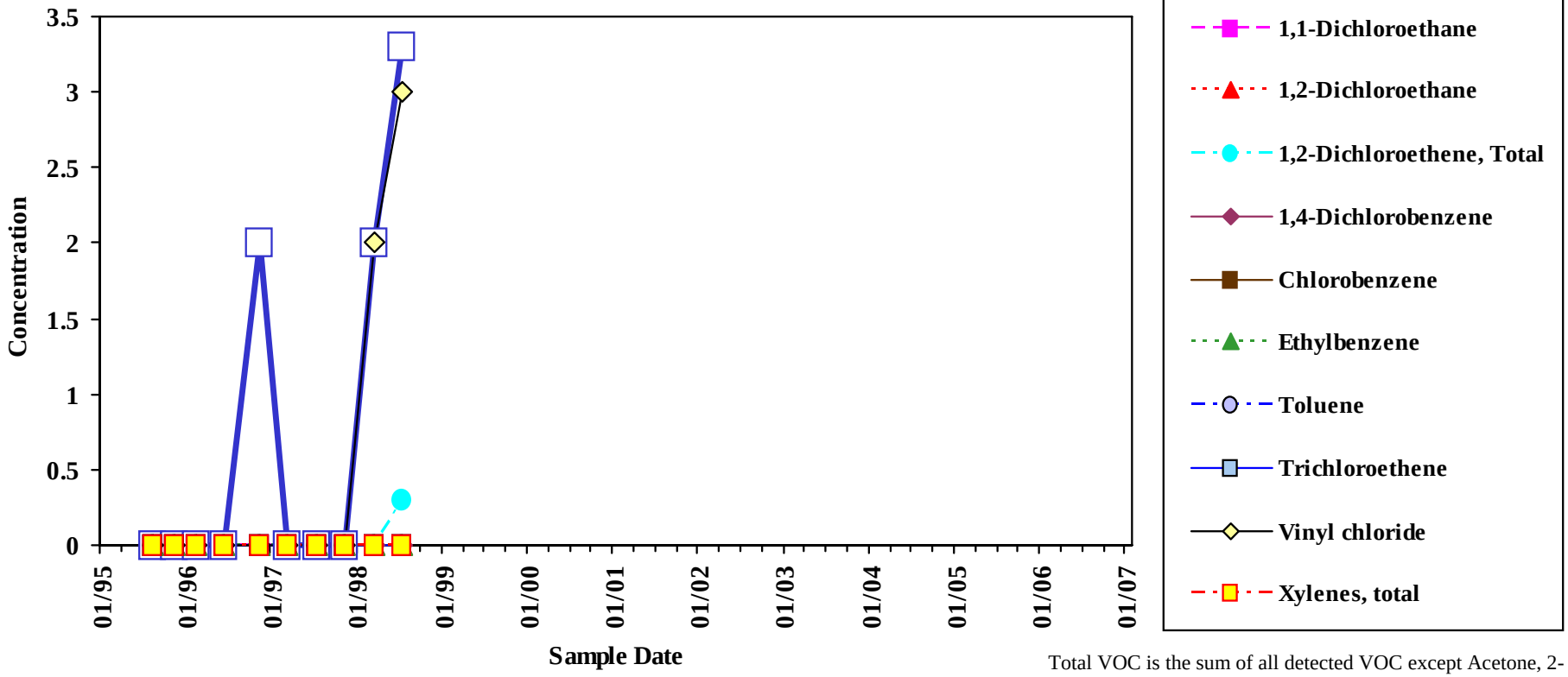
Sample Location:

MW-234R

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

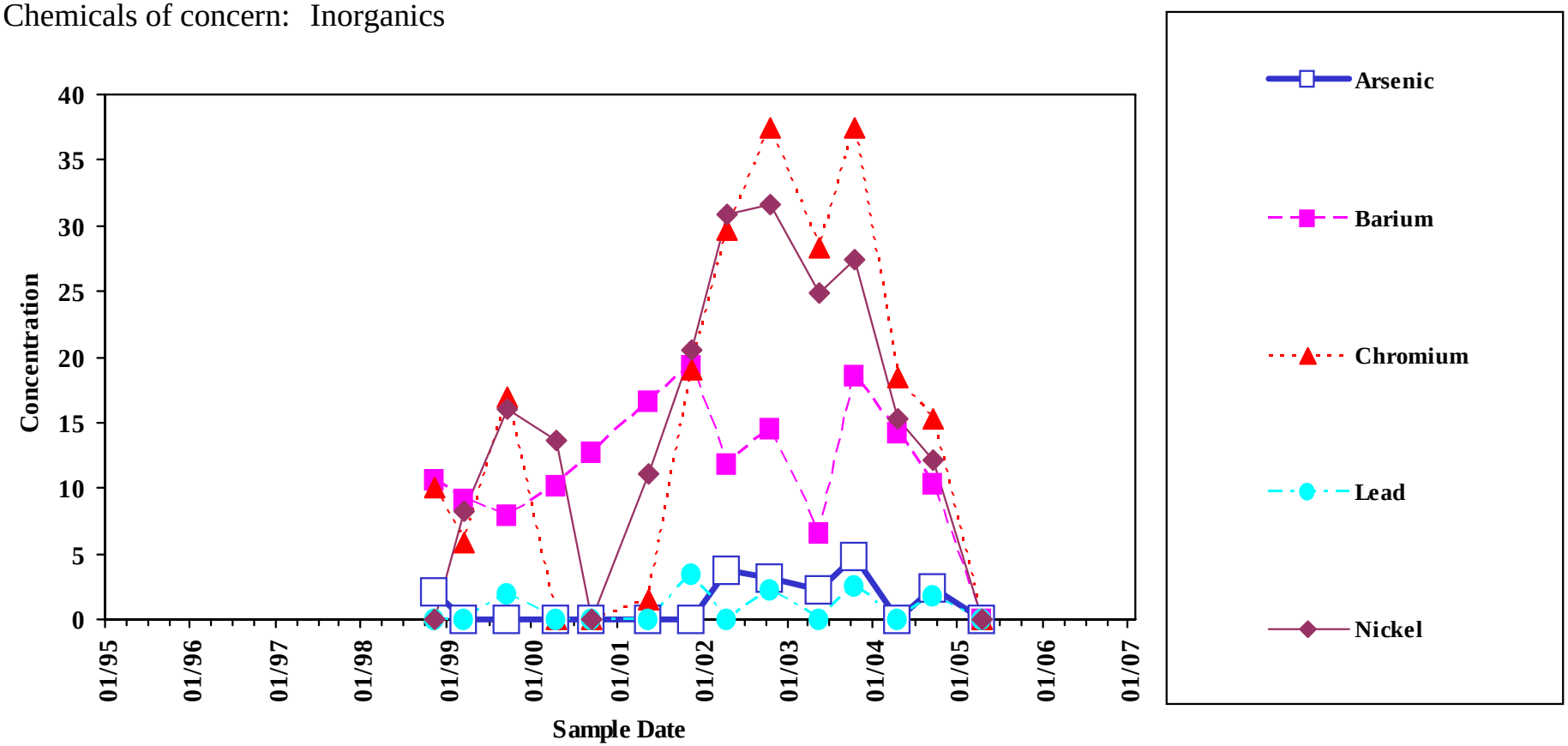
Sample Location:

MW-240

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140
Chromium	Lead	Nickel			
100	15	--			

MCL	Arsenic	Barium
	10	2000

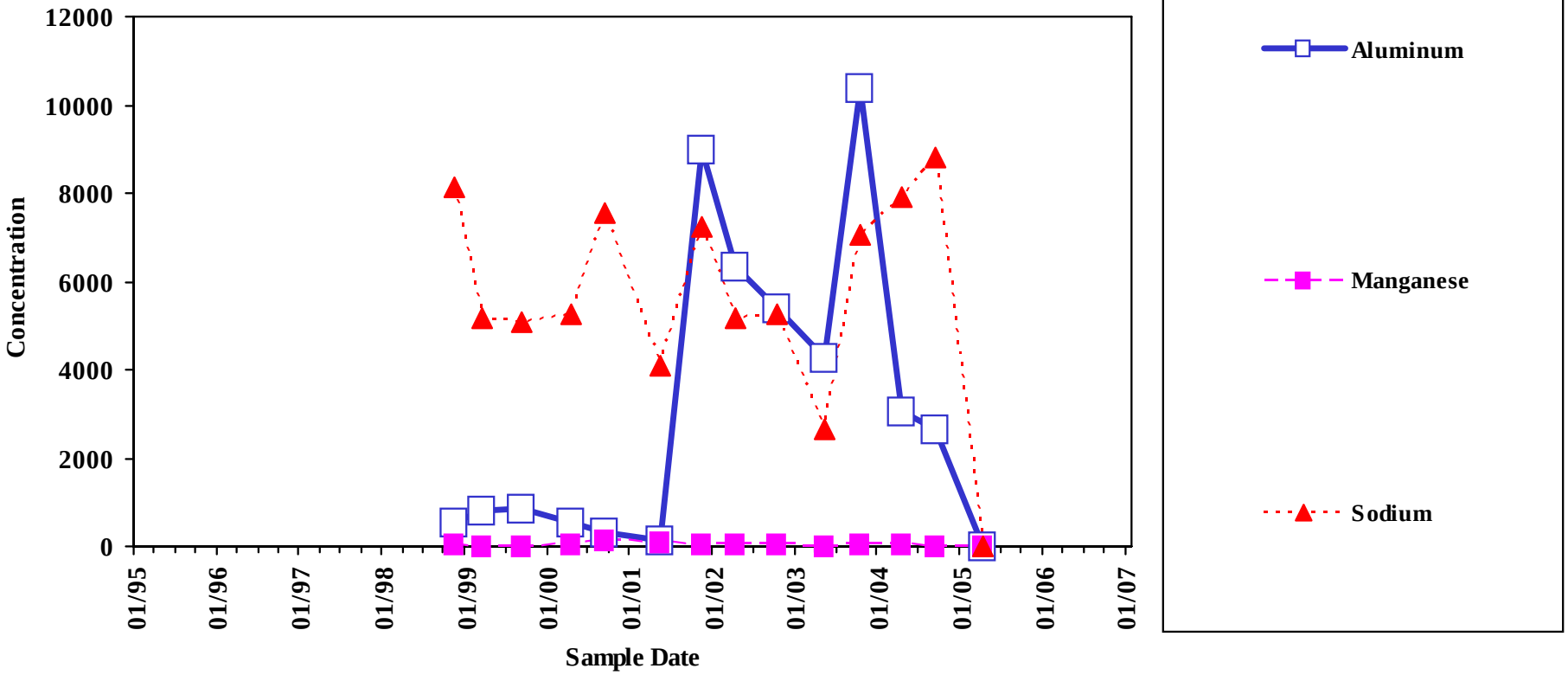
Sample Location:

MW-240

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

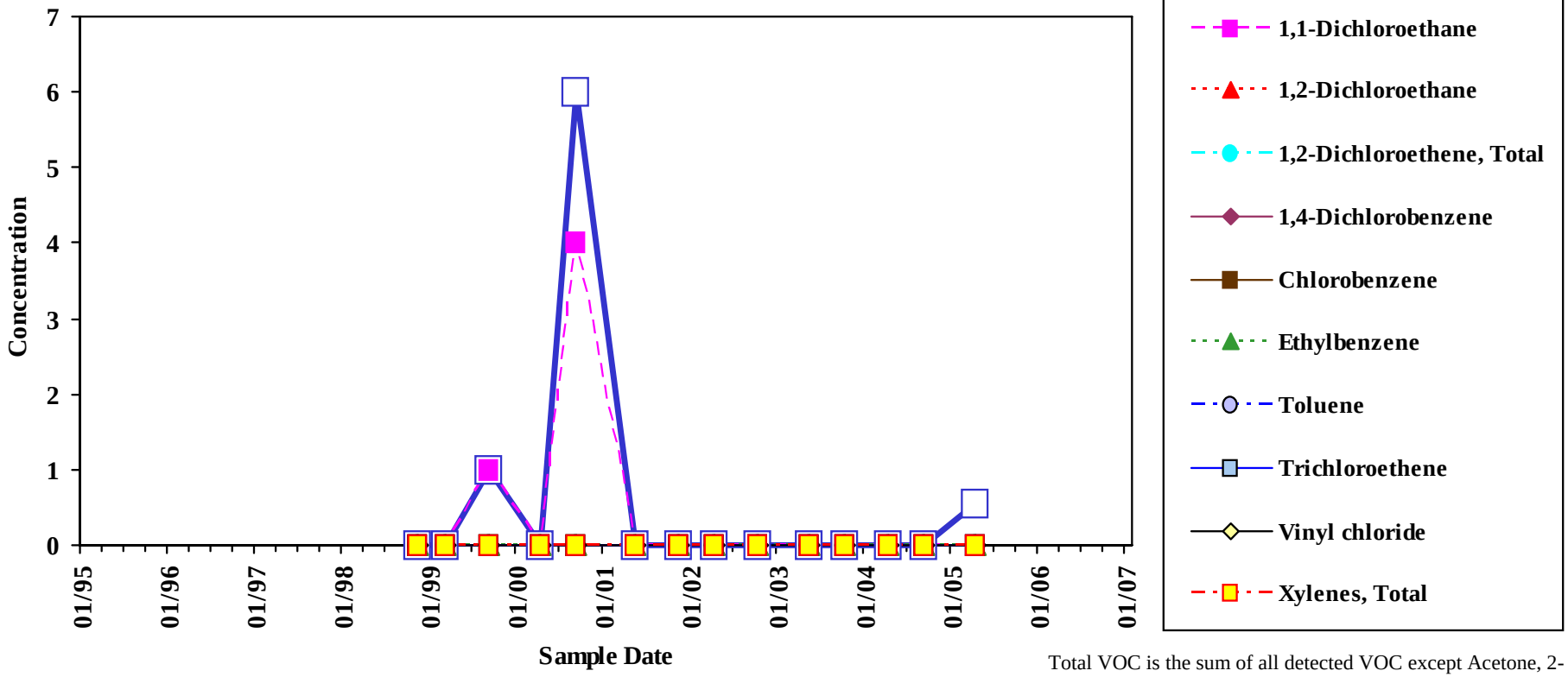
Sample Location:

MW-240

Low-flow Sample

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

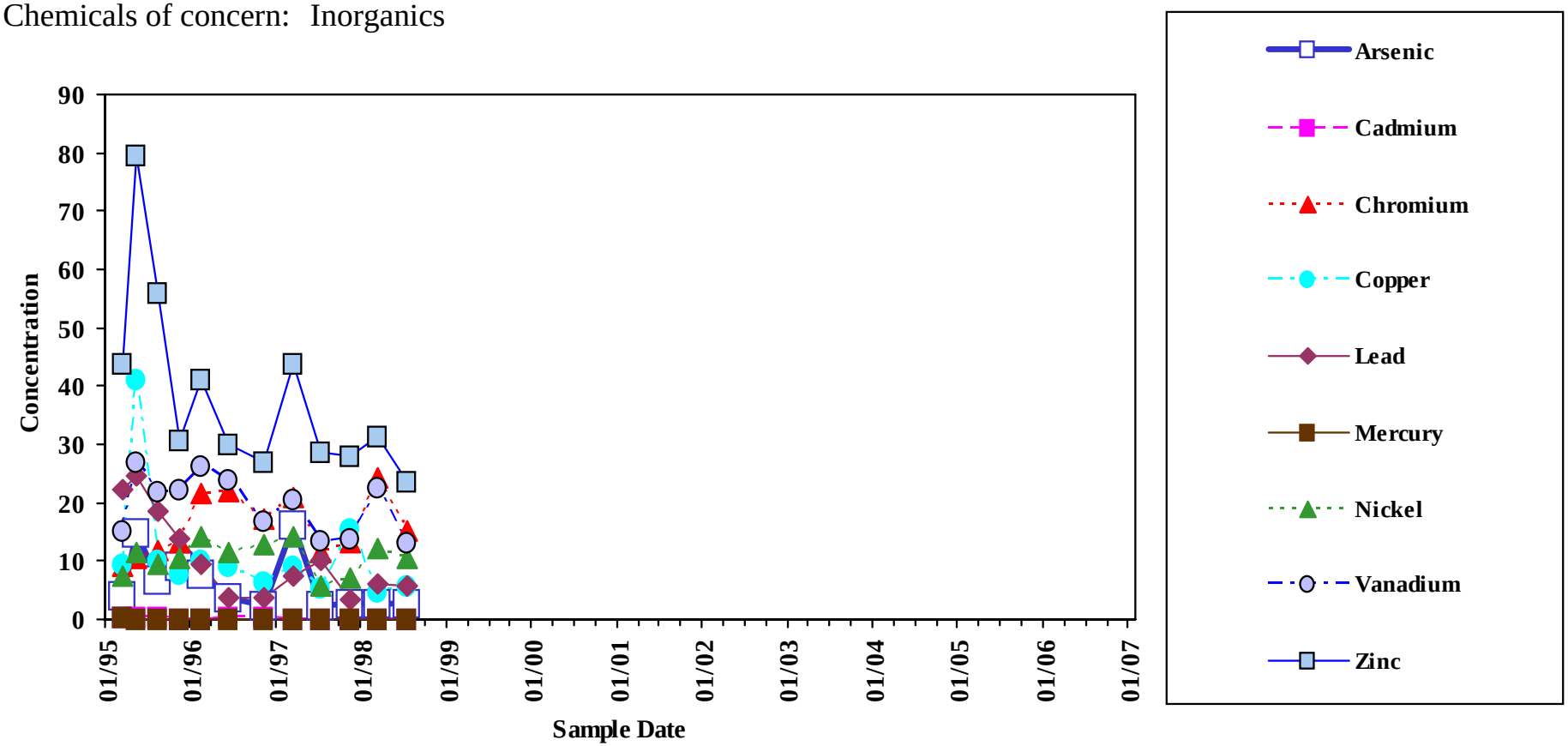
MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

Sample Location:

SED-01

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

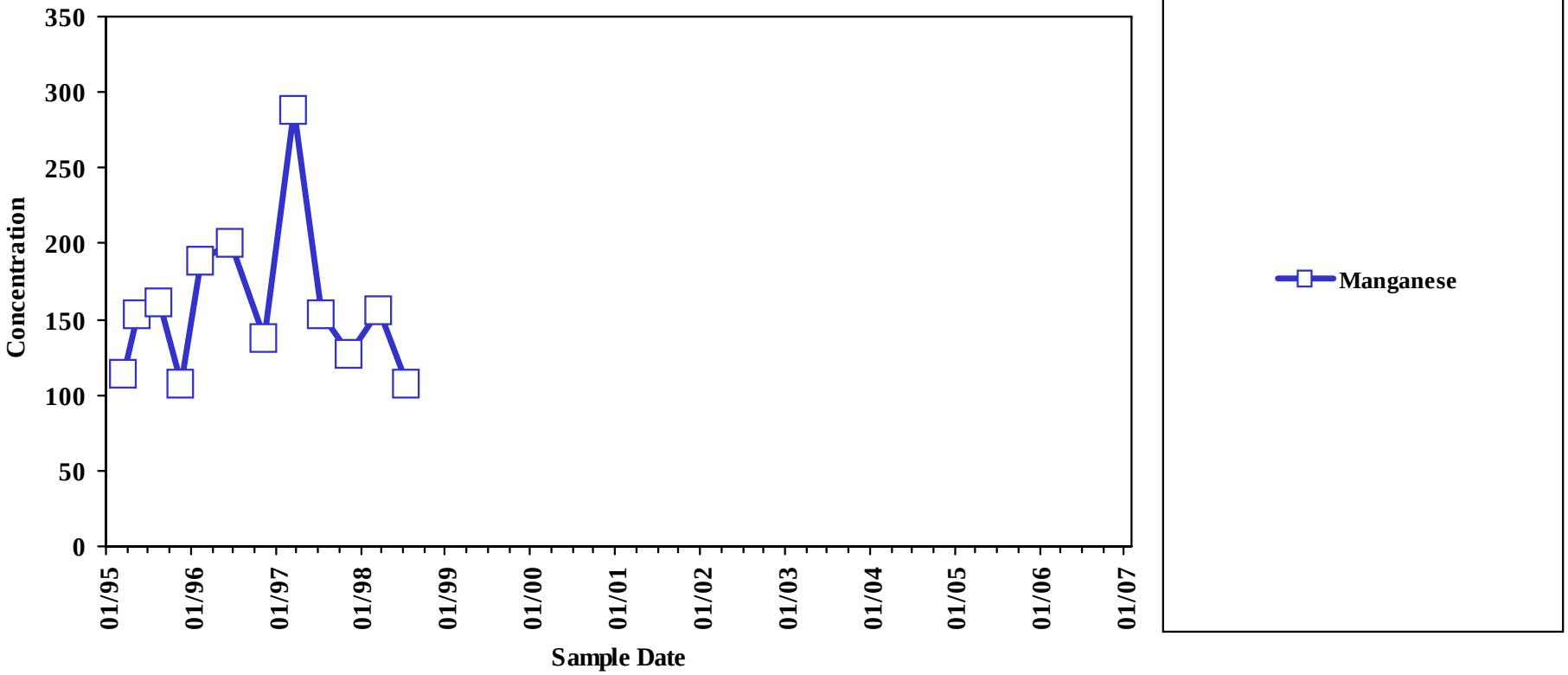
Zinc
--

Sample Location:

SED-01

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

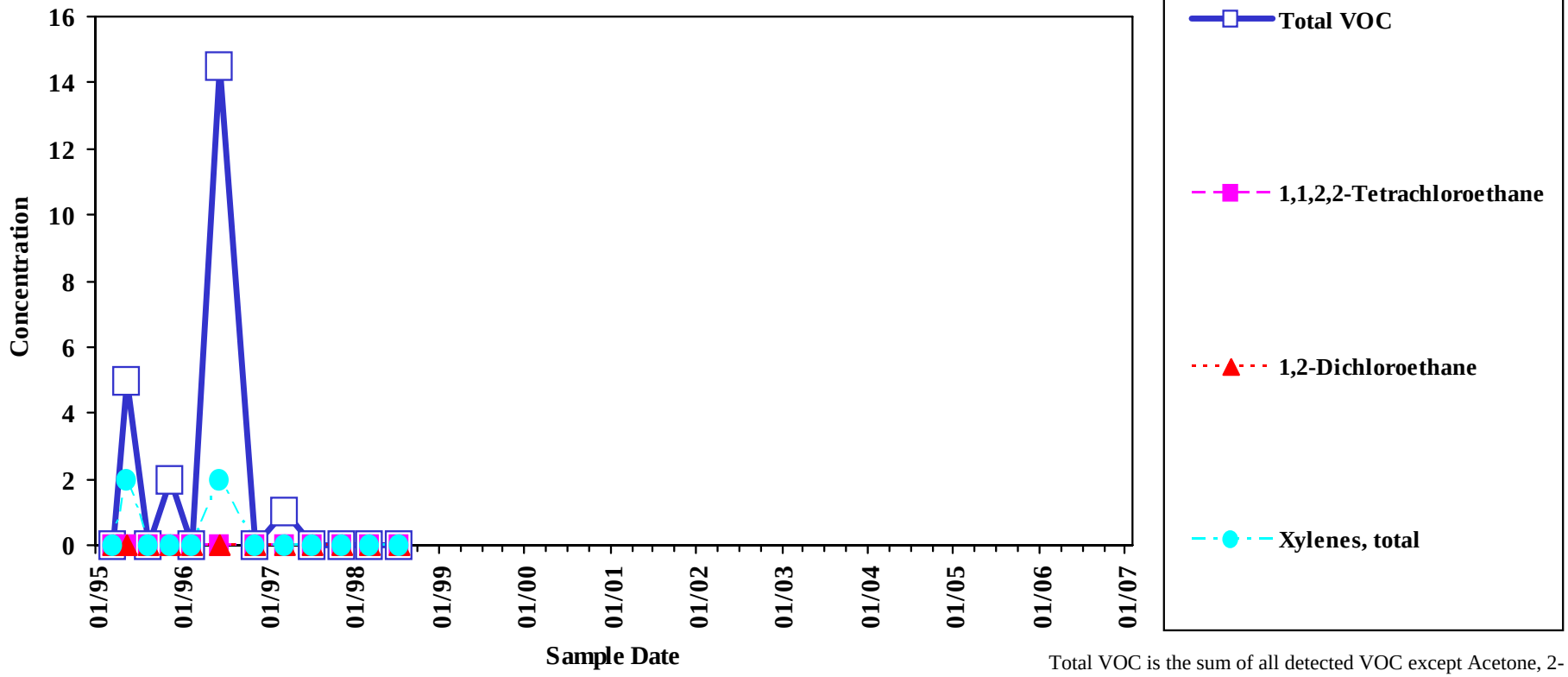
Clean-up Standard	Manganese
	630

Sample Location:

SED-01

Sites 1 & 3
Sediment

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/Kg

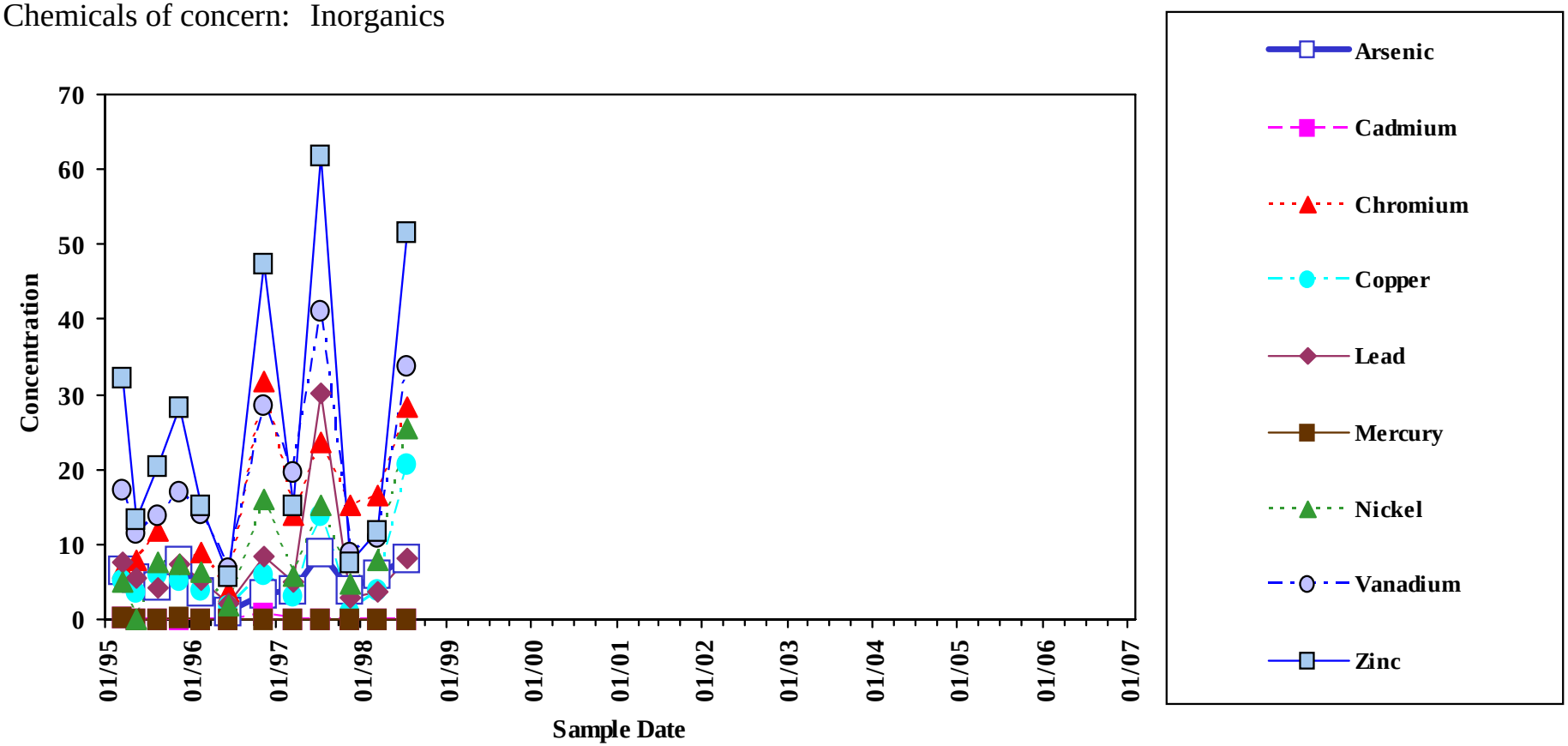
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,2-Dichloroethane	Xylenes, Total
	0.94	4.4	9.7

Sample Location:

SED-02

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

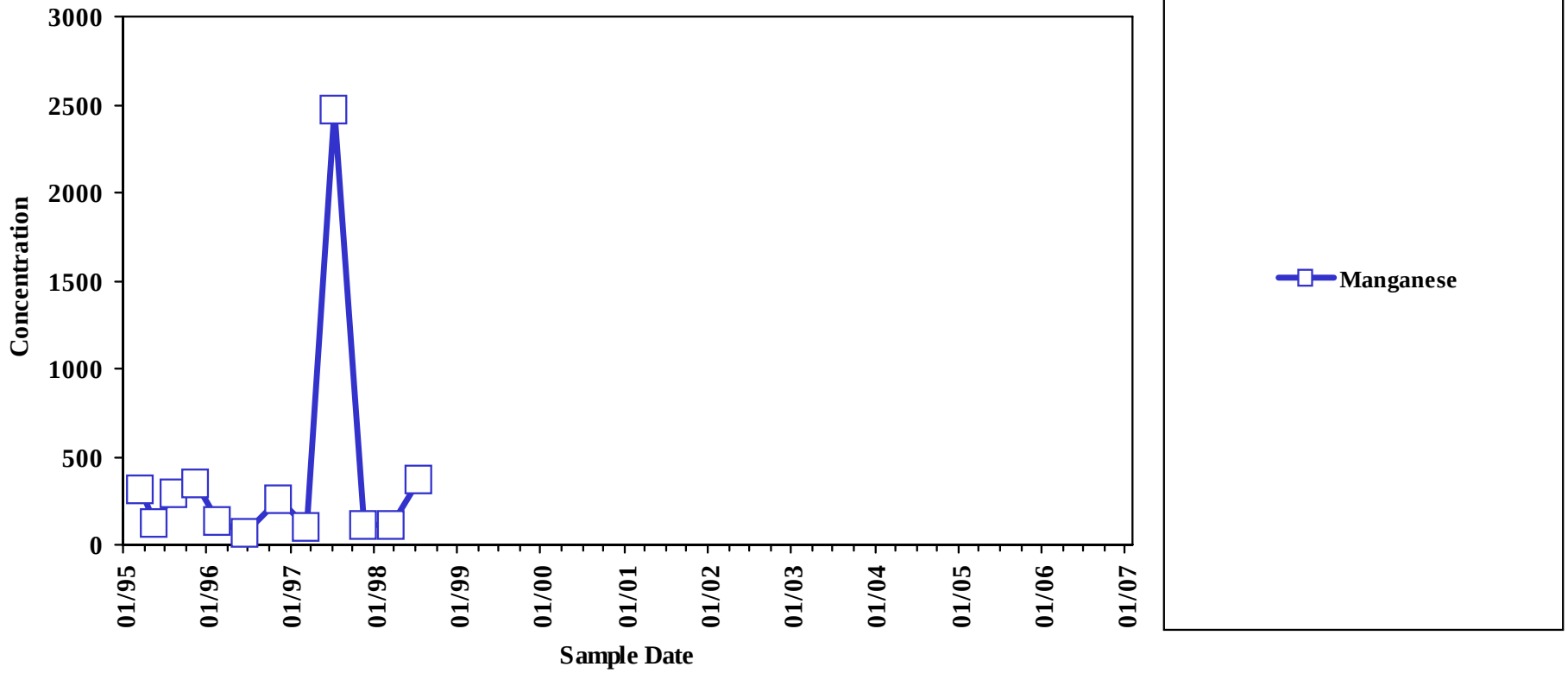
Zinc
--

Sample Location:

SED-02

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

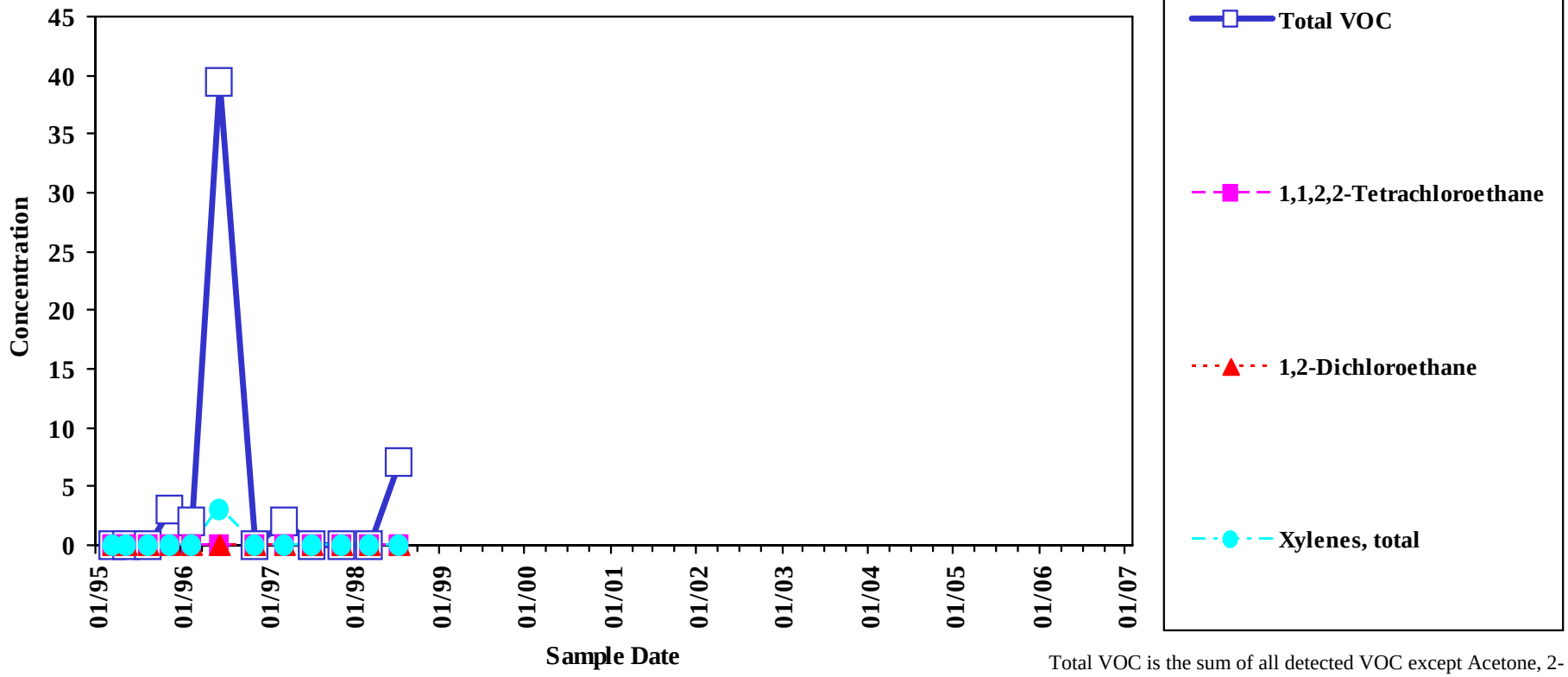
Clean-up Standard	Manganese
	630

Sample Location:

SED-02

Sites 1 & 3
Sediment

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/Kg

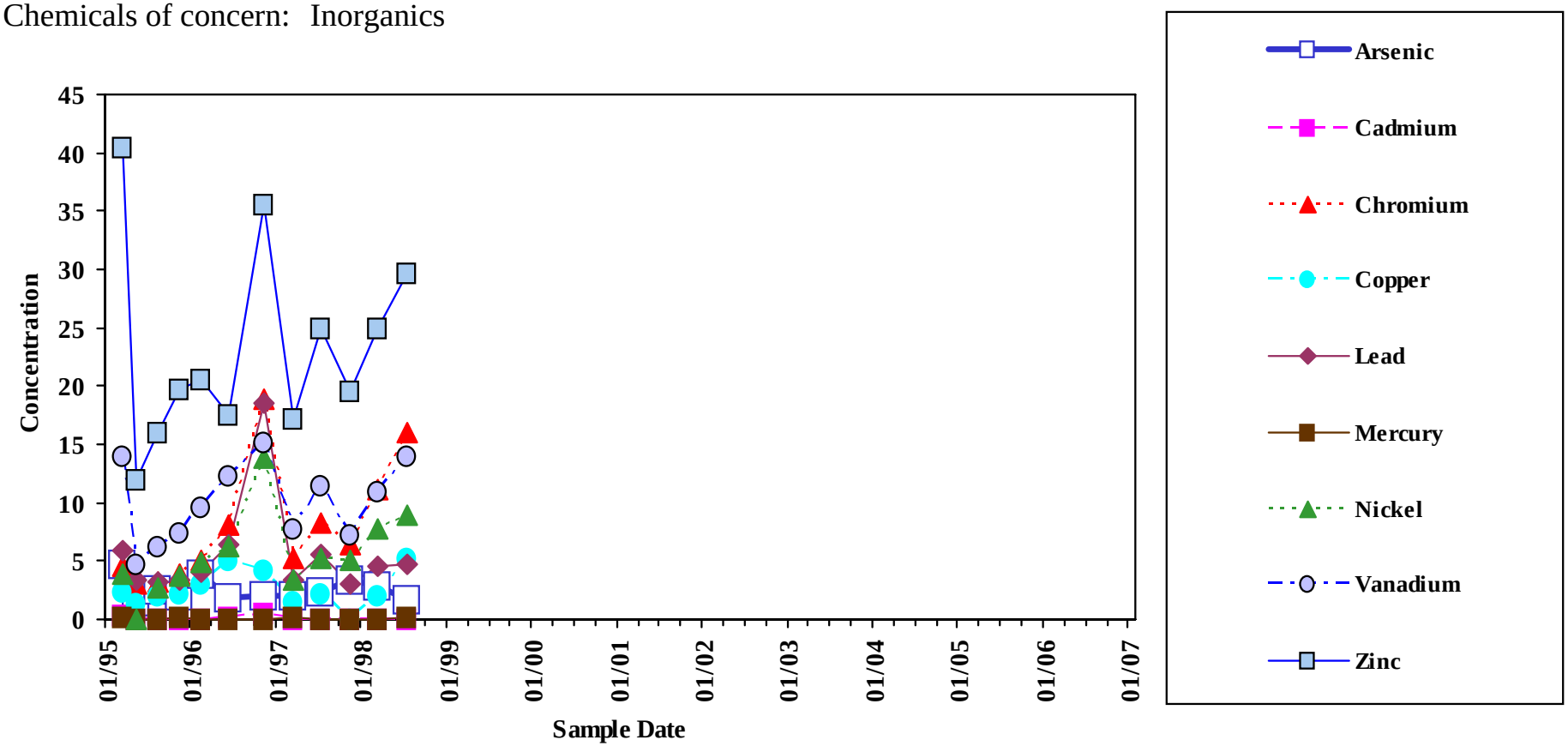
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,2-Dichloroethane	Xylenes, Total
	0.94	4.4	9.7

Sample Location:

SED-03

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

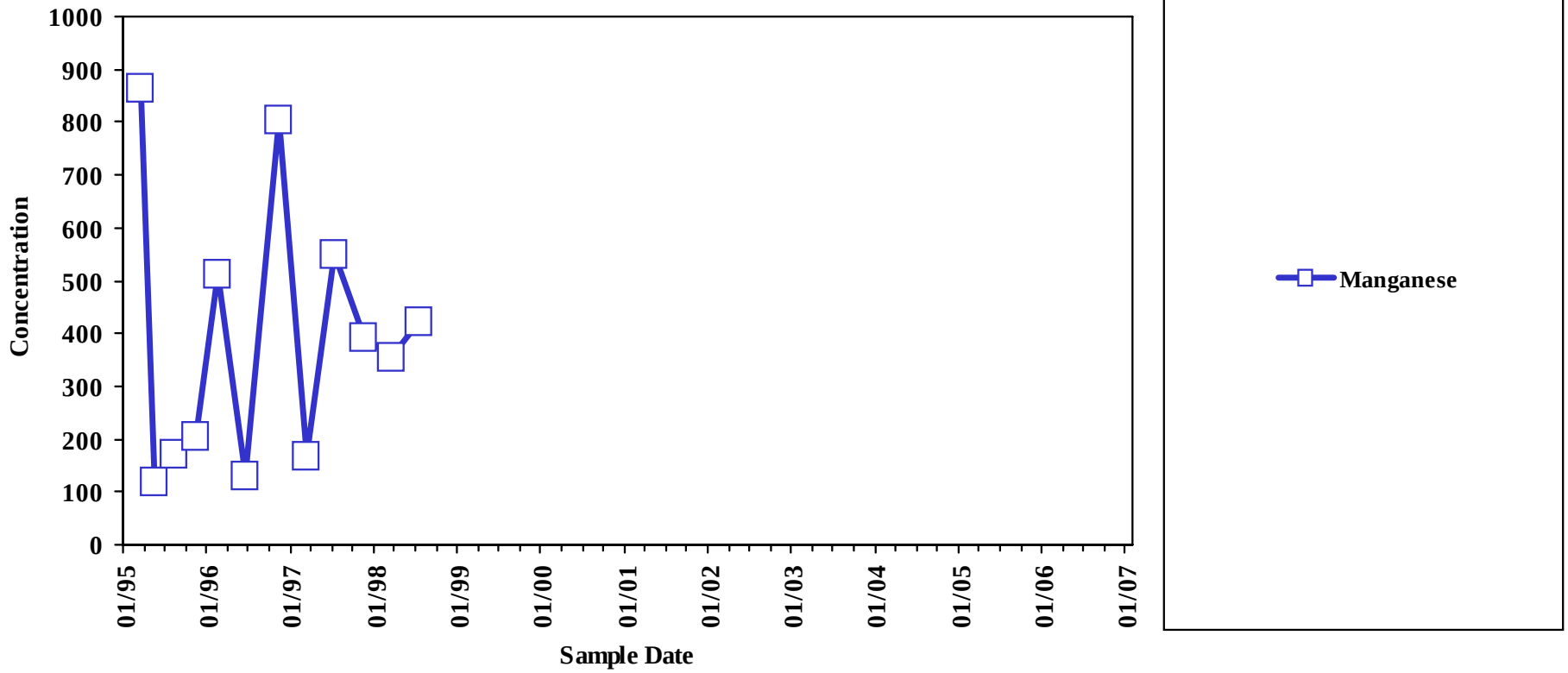
Zinc
--

Sample Location:

SED-03

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

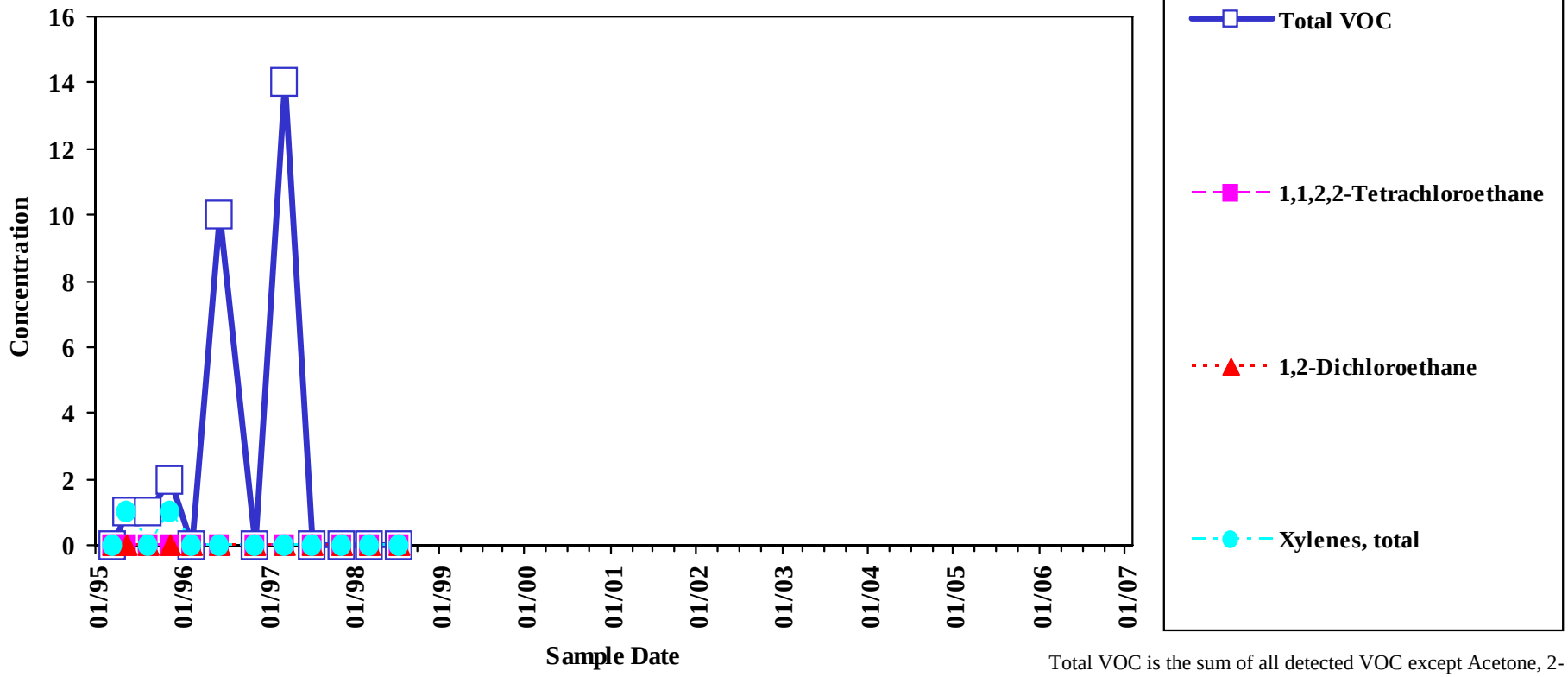
Clean-up Standard	Manganese
	630

Sample Location:

SED-03

Sites 1 & 3
Sediment

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/Kg

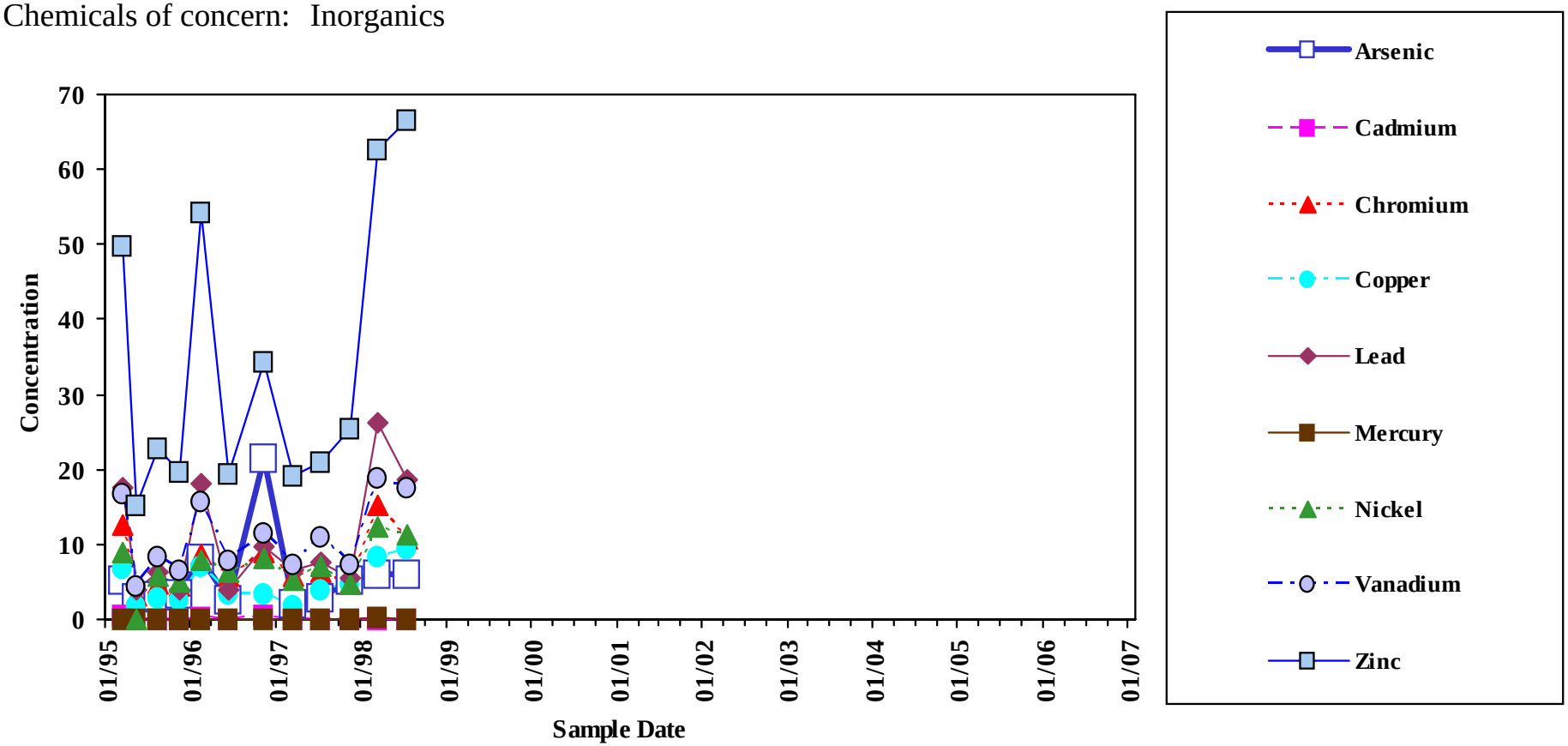
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,2-Dichloroethane	Xylenes, Total
	0.94	4.4	9.7

Sample Location:

SED-04

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

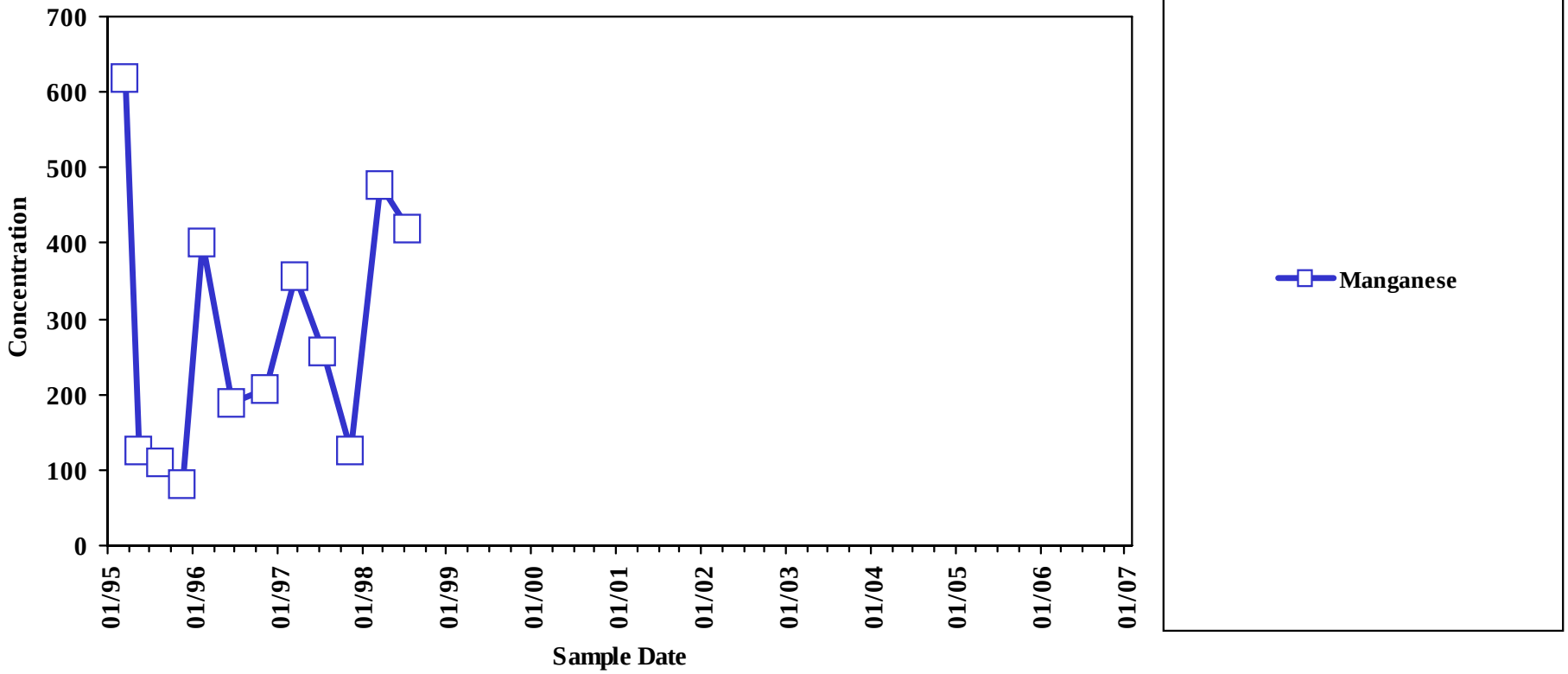
Zinc
--

Sample Location:

SED-04

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

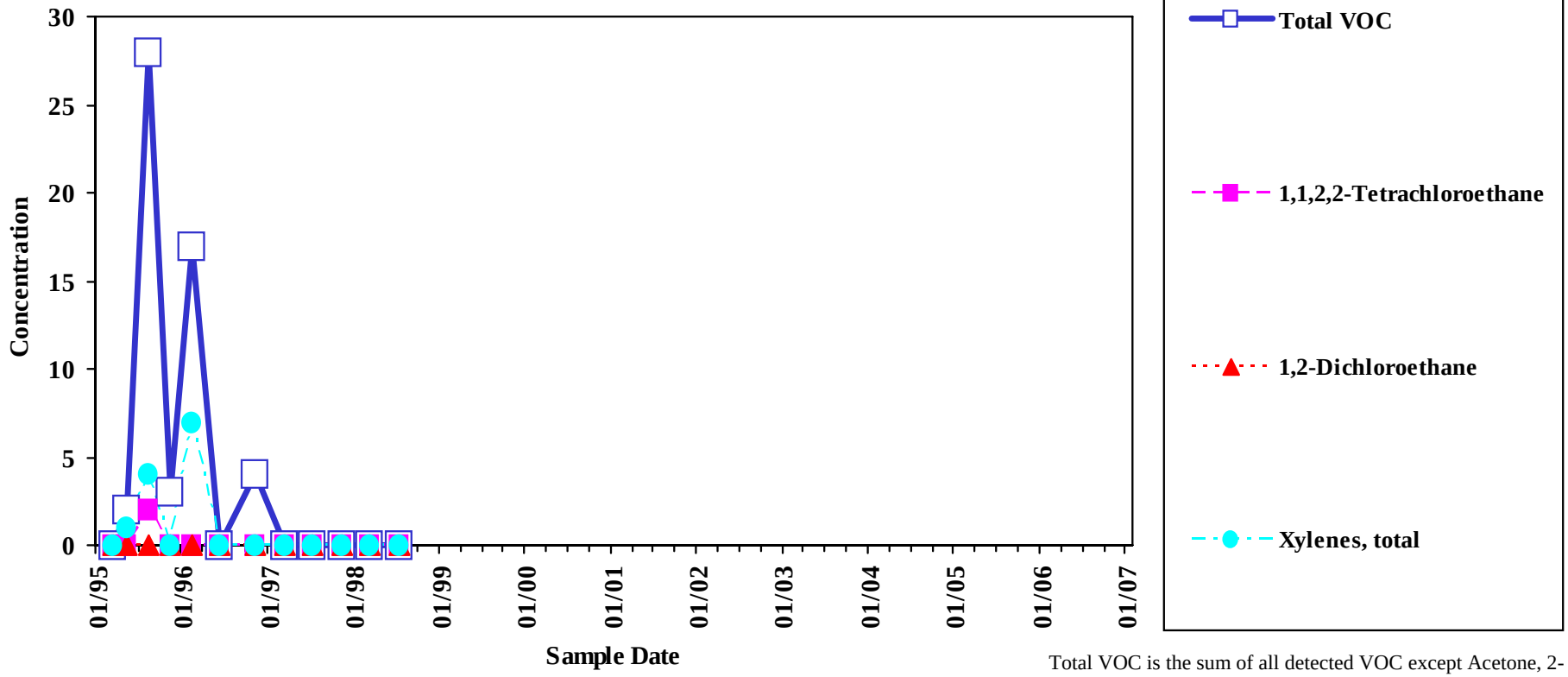
Clean-up Standard	Manganese
	630

Sample Location:

SED-04

Sites 1 & 3
Sediment

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/Kg

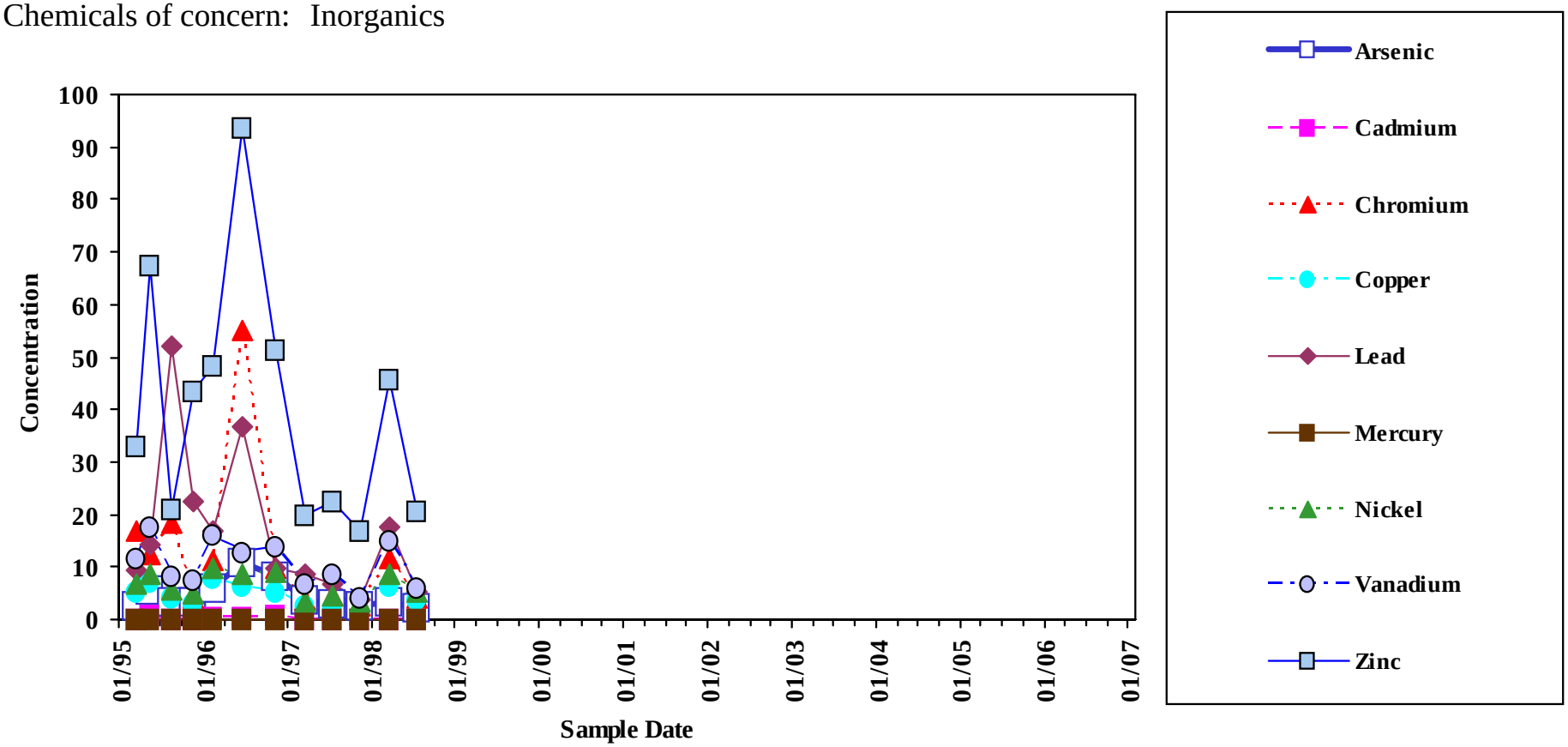
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,2-Dichloroethane	Xylenes, Total
	0.94	4.4	9.7

Sample Location:

SED-05

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

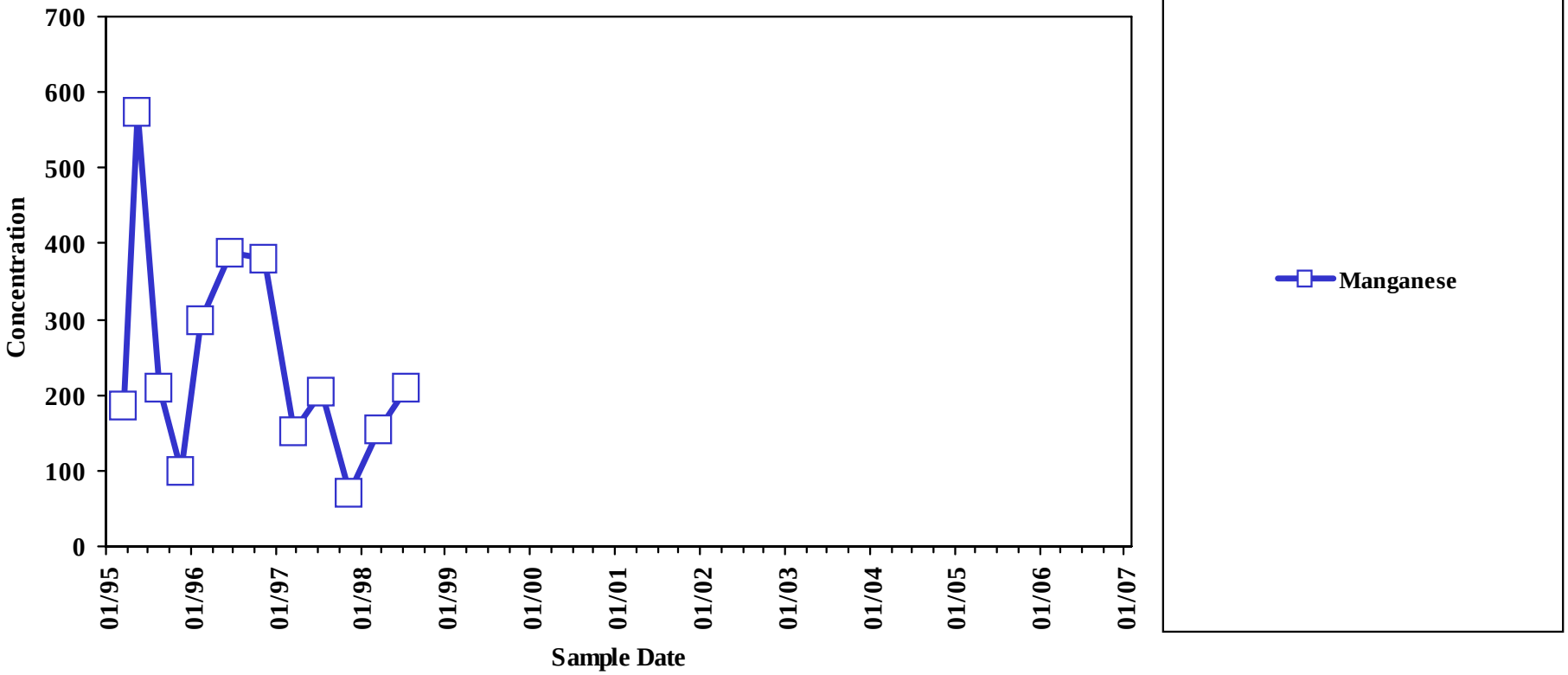
Zinc
--

Sample Location:

SED-05

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

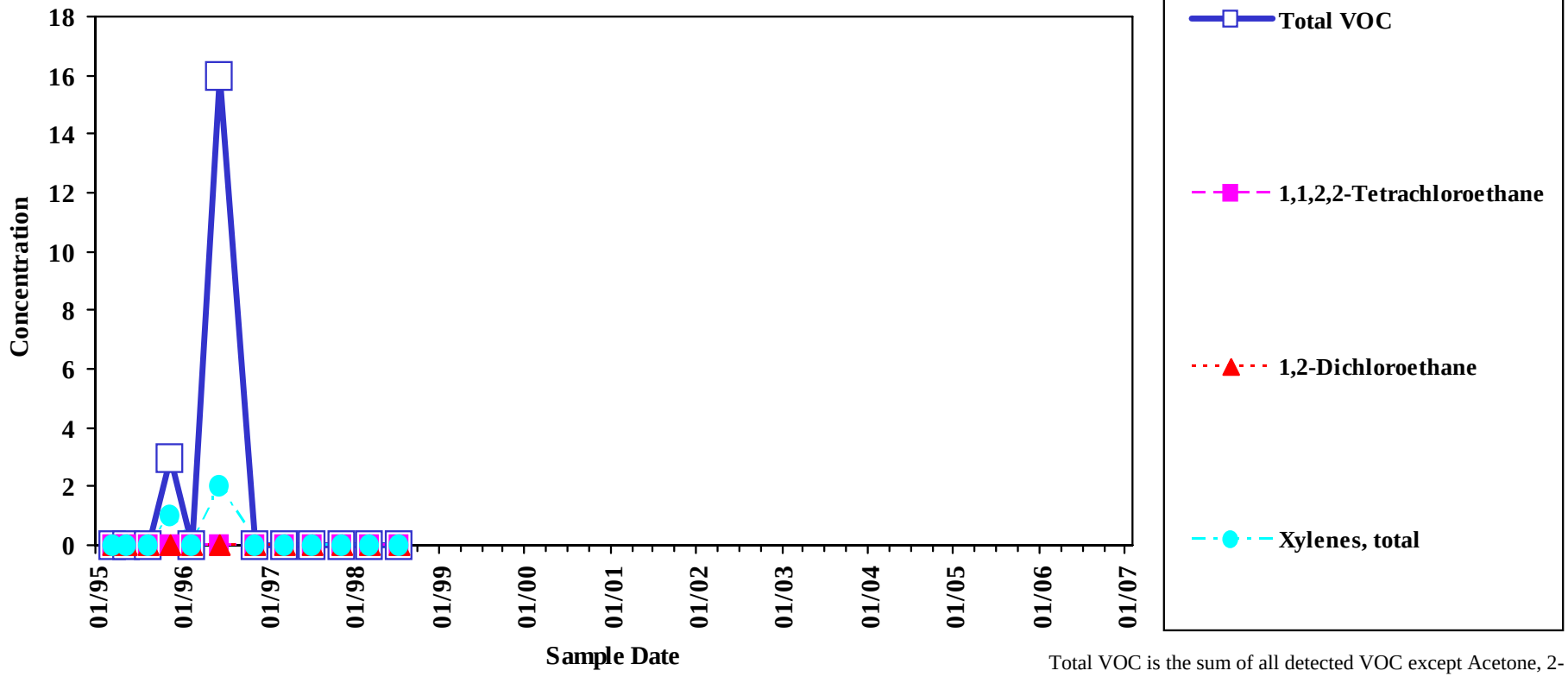
Clean-up Standard	Manganese
	630

Sample Location:

SED-05

Sites 1 & 3
Sediment

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/Kg

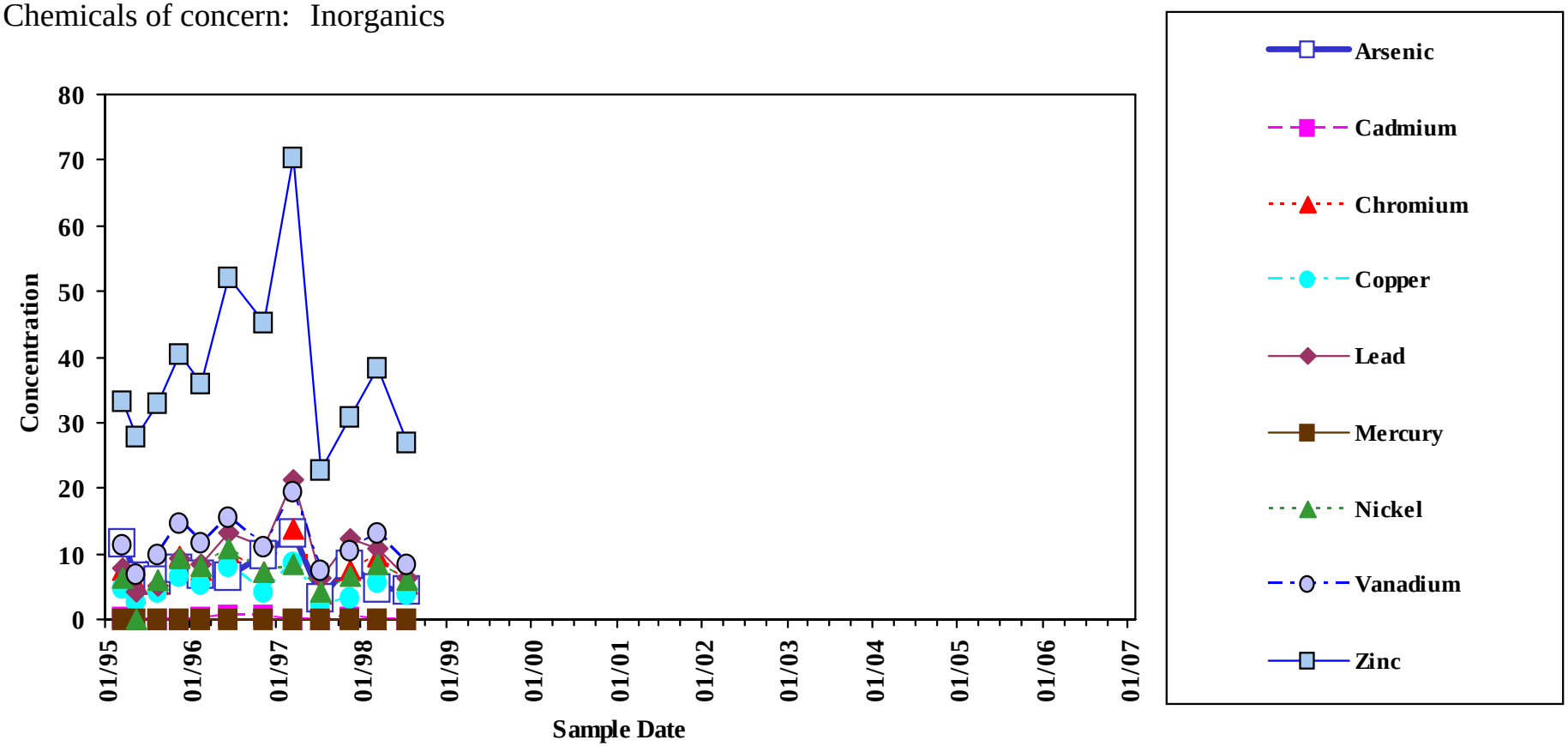
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,2-Dichloroethane	Xylenes, Total
	0.94	4.4	9.7

Sample Location:

SED-06

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

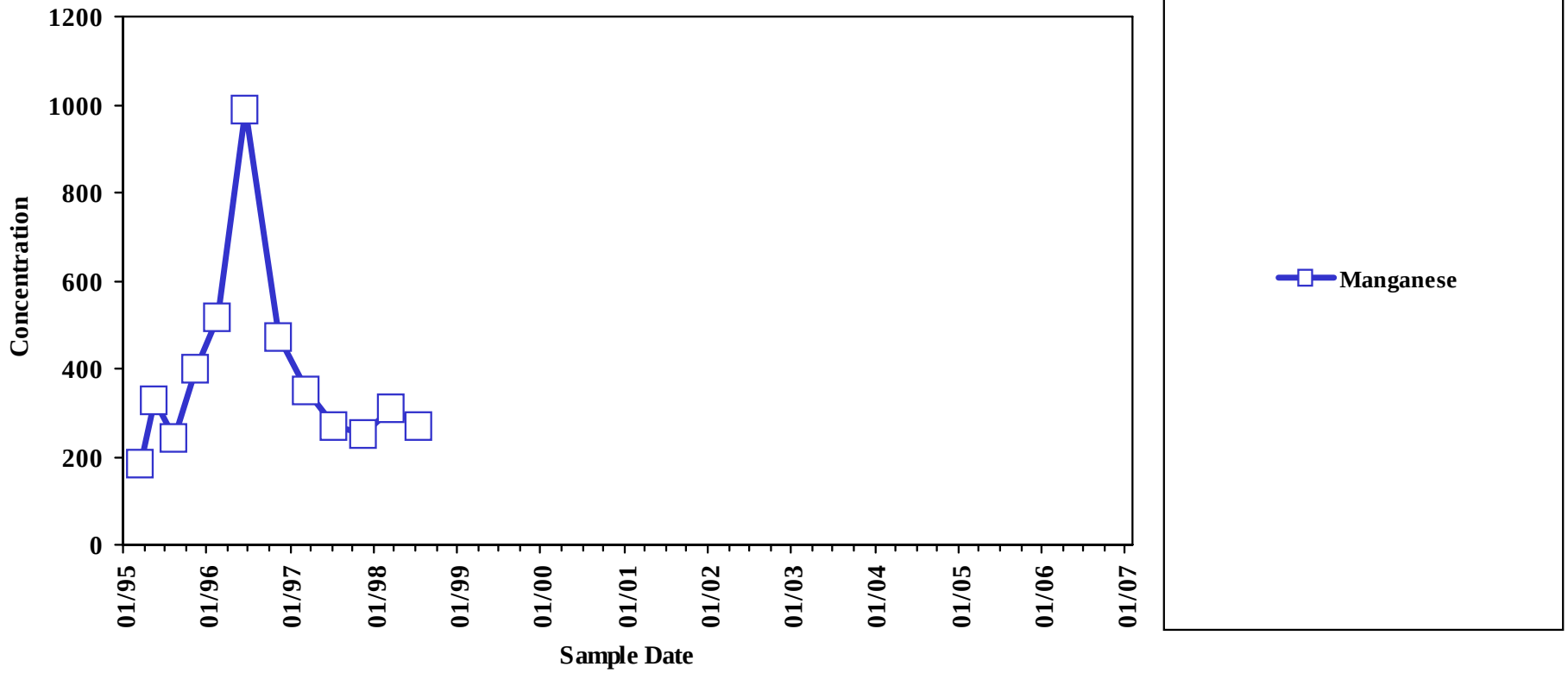
Zinc
--

Sample Location:

SED-06

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

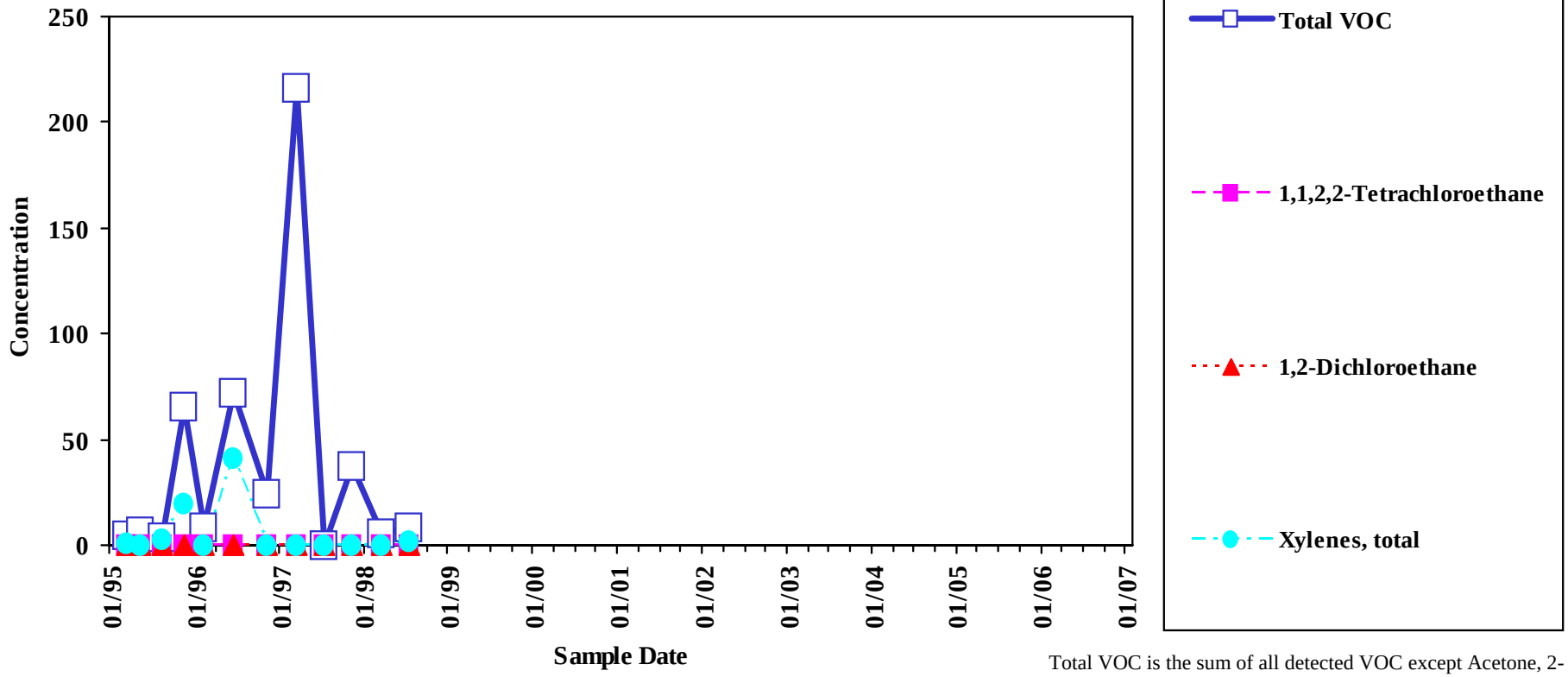
Clean-up Standard	Manganese
	630

Sample Location:

SED-06

Sites 1 & 3
Sediment

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/Kg

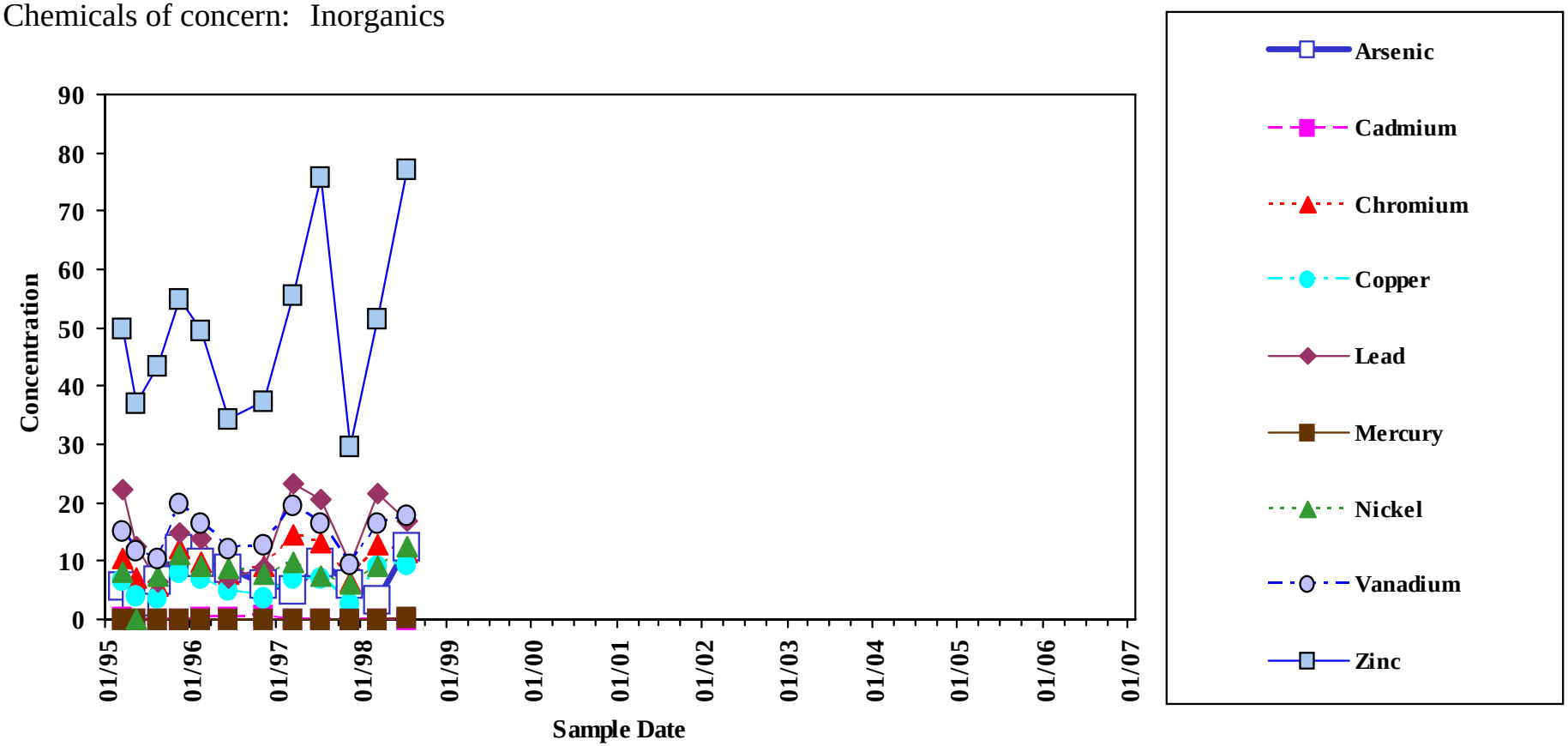
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,2-Dichloroethane	Xylenes, Total
	0.94	4.4	9.7

Sample Location:

SED-07

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

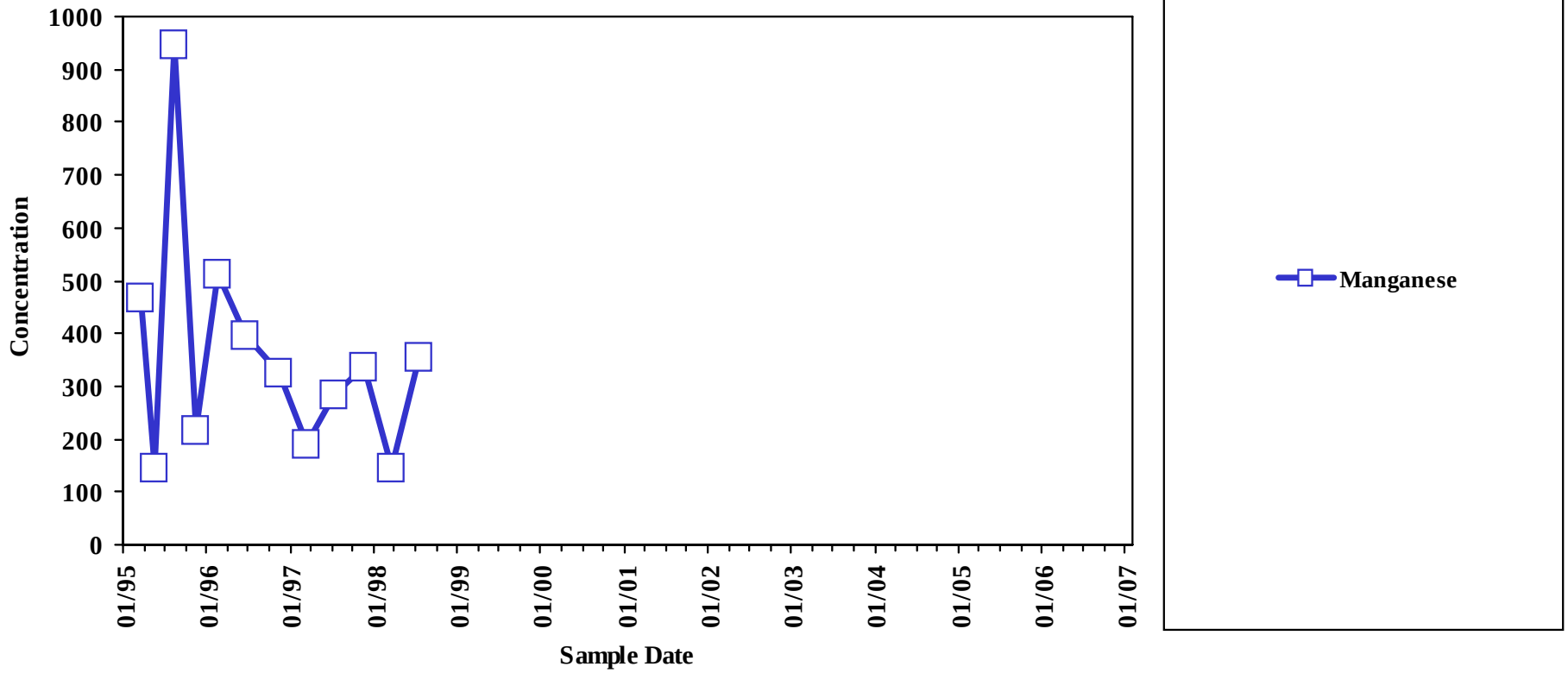
Zinc
--

Sample Location:

SED-07

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

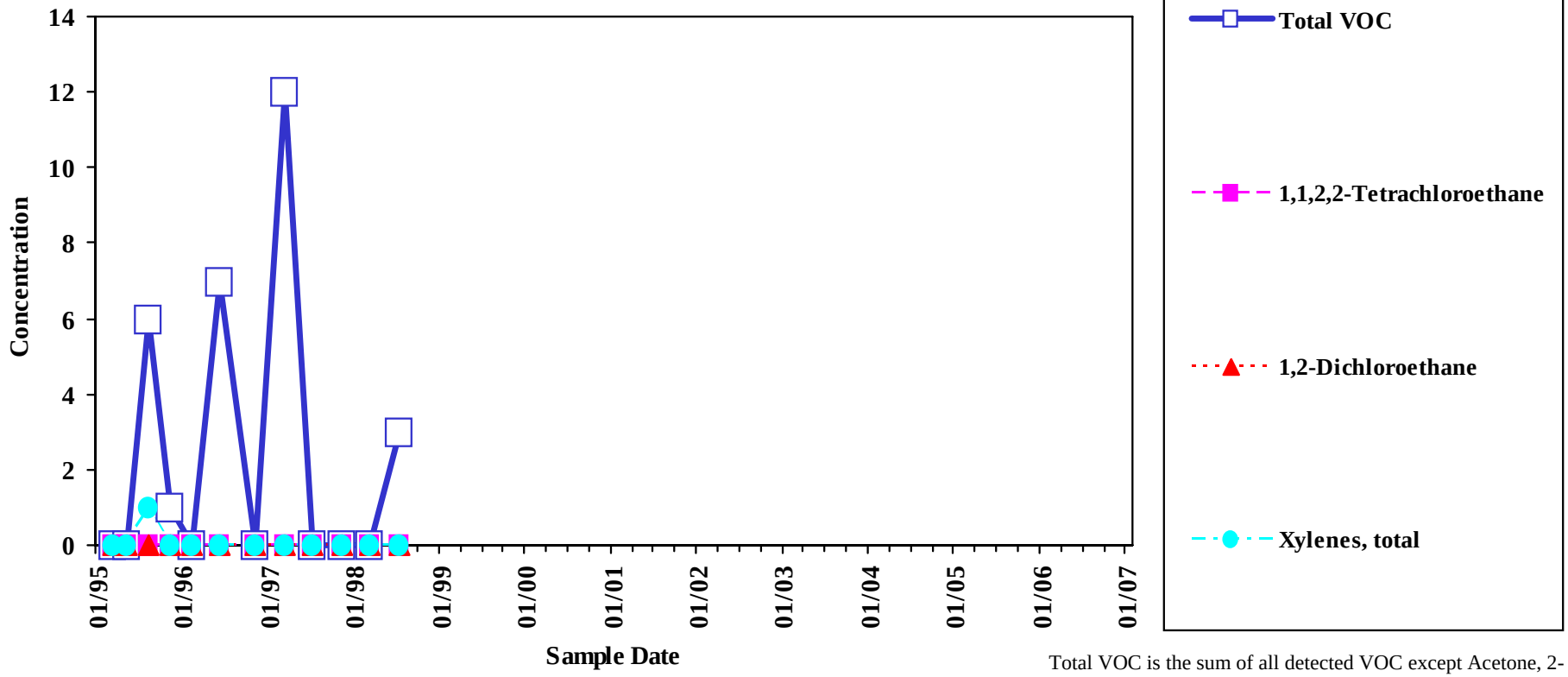
Clean-up Standard	Manganese
	630

Sample Location:

SED-07

Sites 1 & 3
Sediment

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/Kg

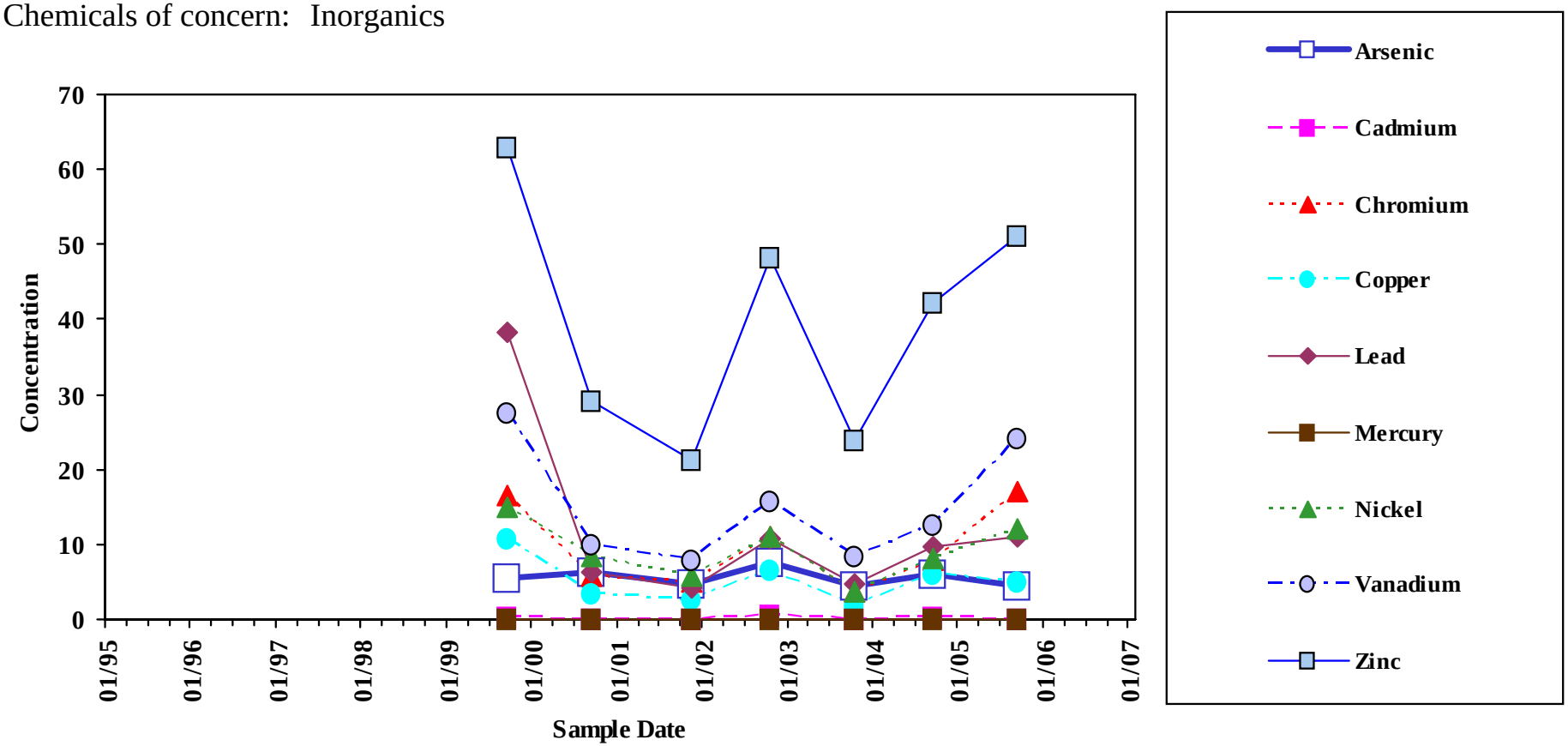
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,2-Dichloroethane	Xylenes, Total
	0.94	4.4	9.7

Sample Location:

SED-09

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

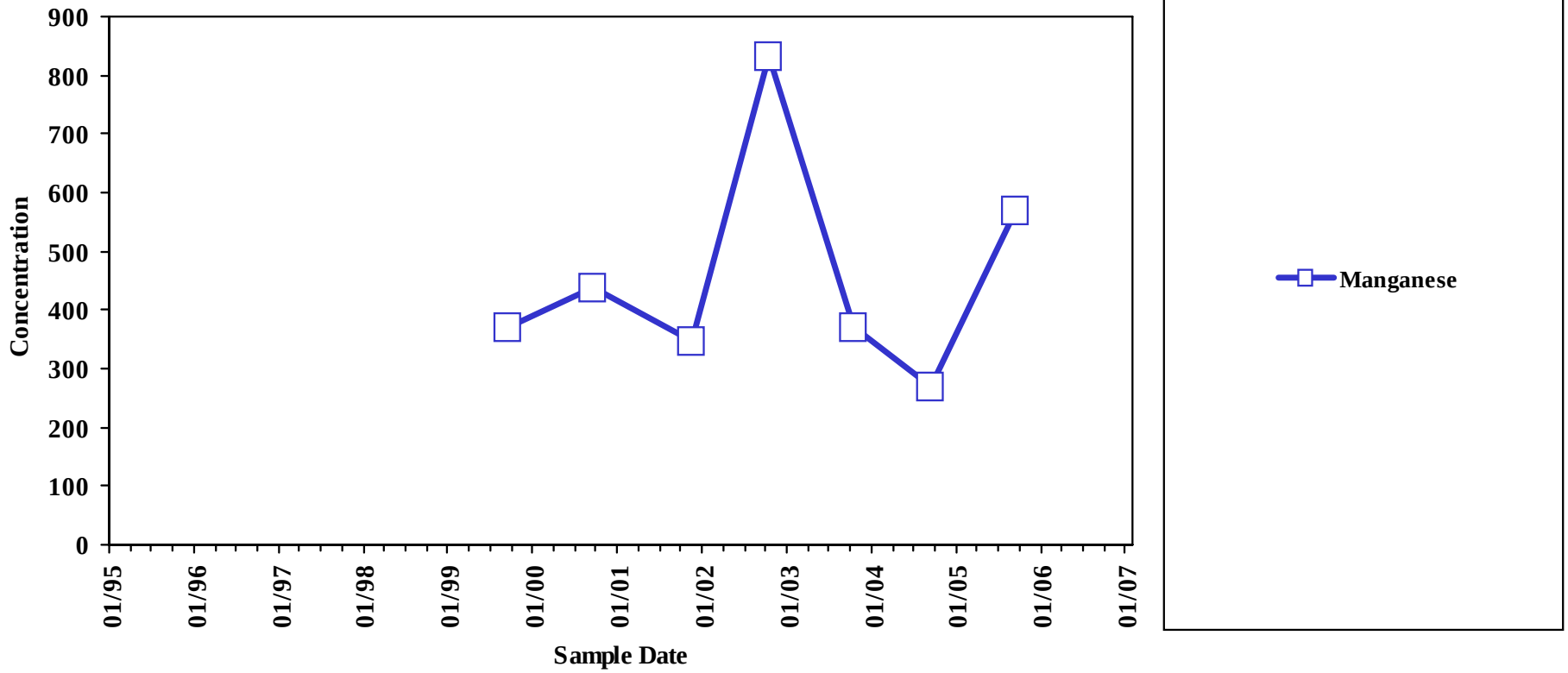
Zinc
--

Sample Location:

SED-09

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

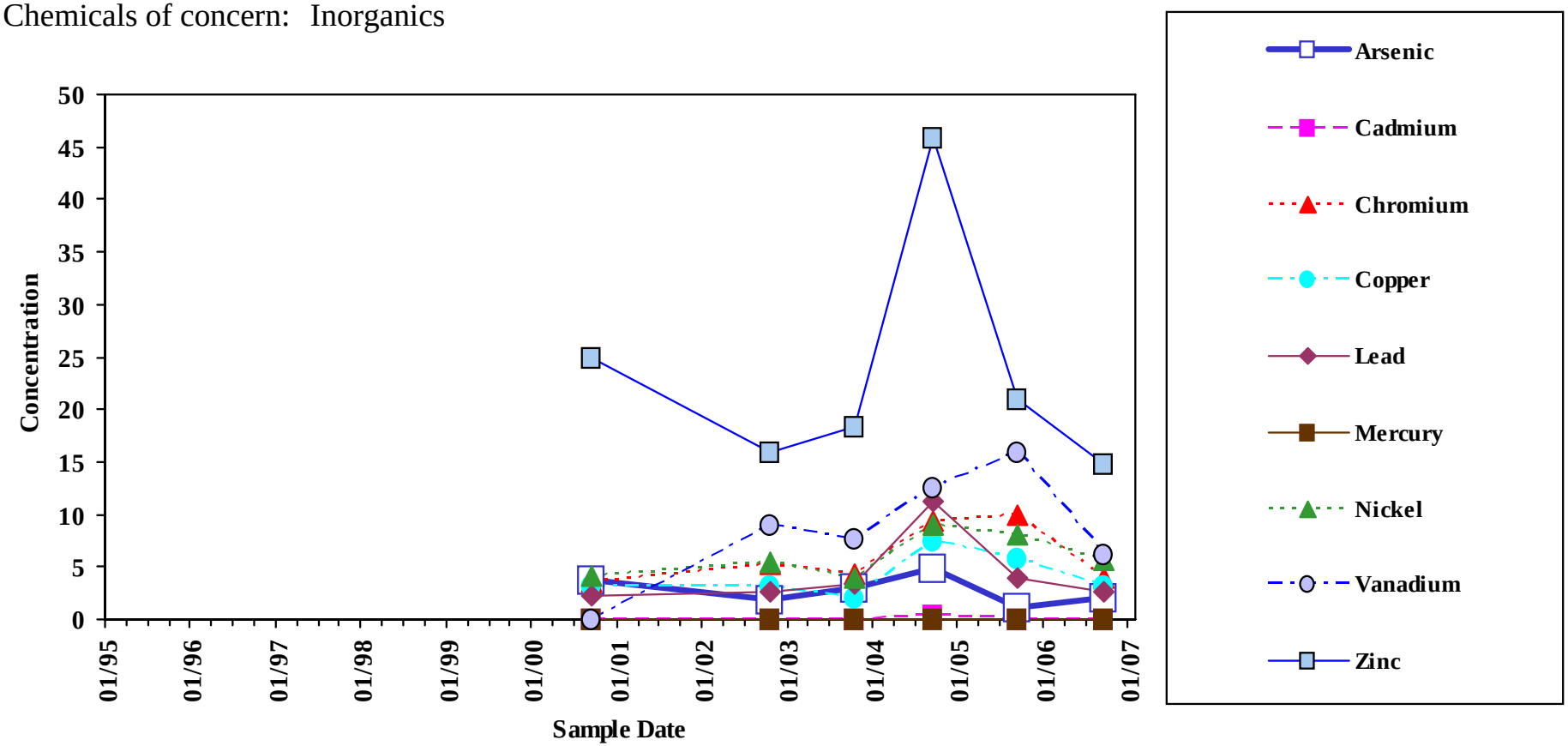
Clean-up Standard	Manganese
	630

Sample Location:

SED-15

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

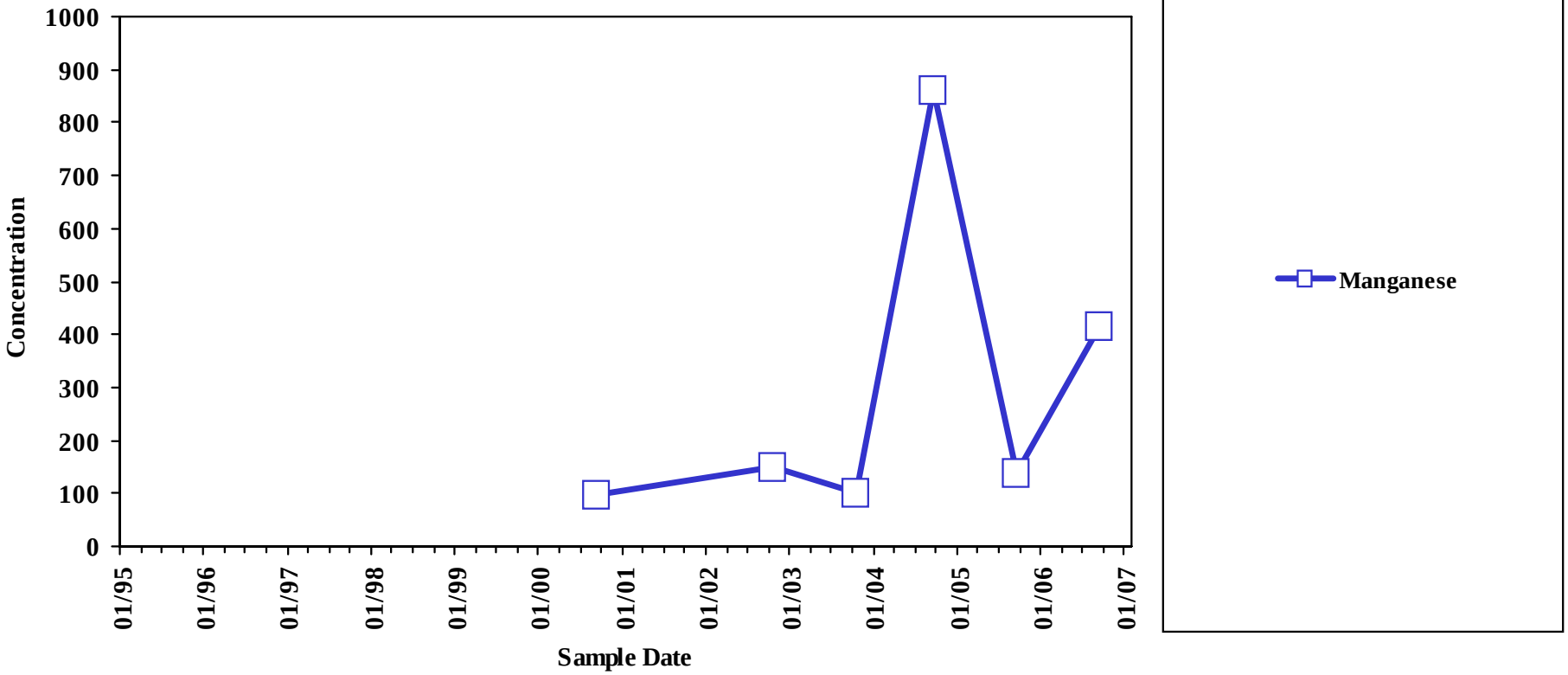
Zinc
--

Sample Location:

SED-15

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

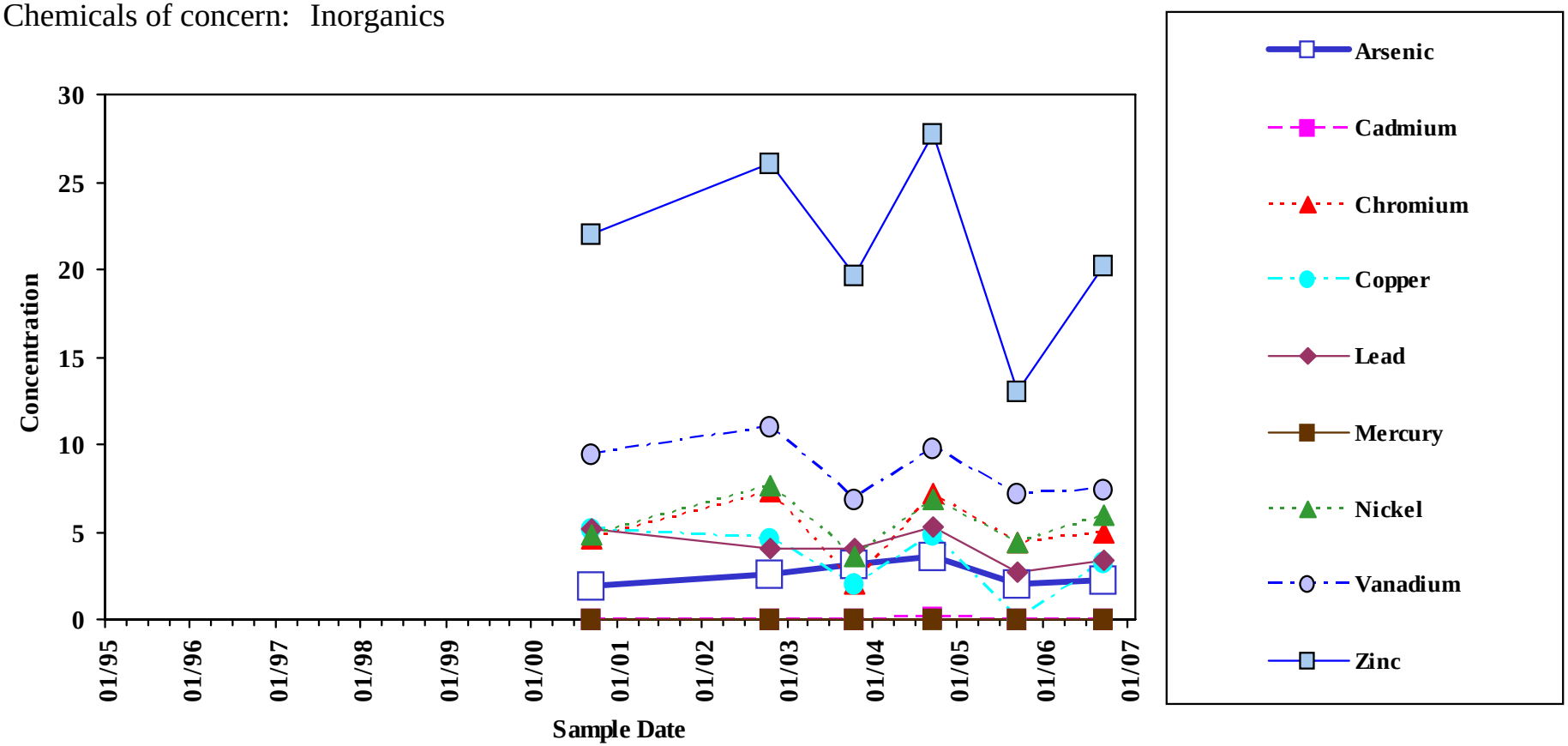
Clean-up Standard	Manganese
	630

Sample Location:

SED-16

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

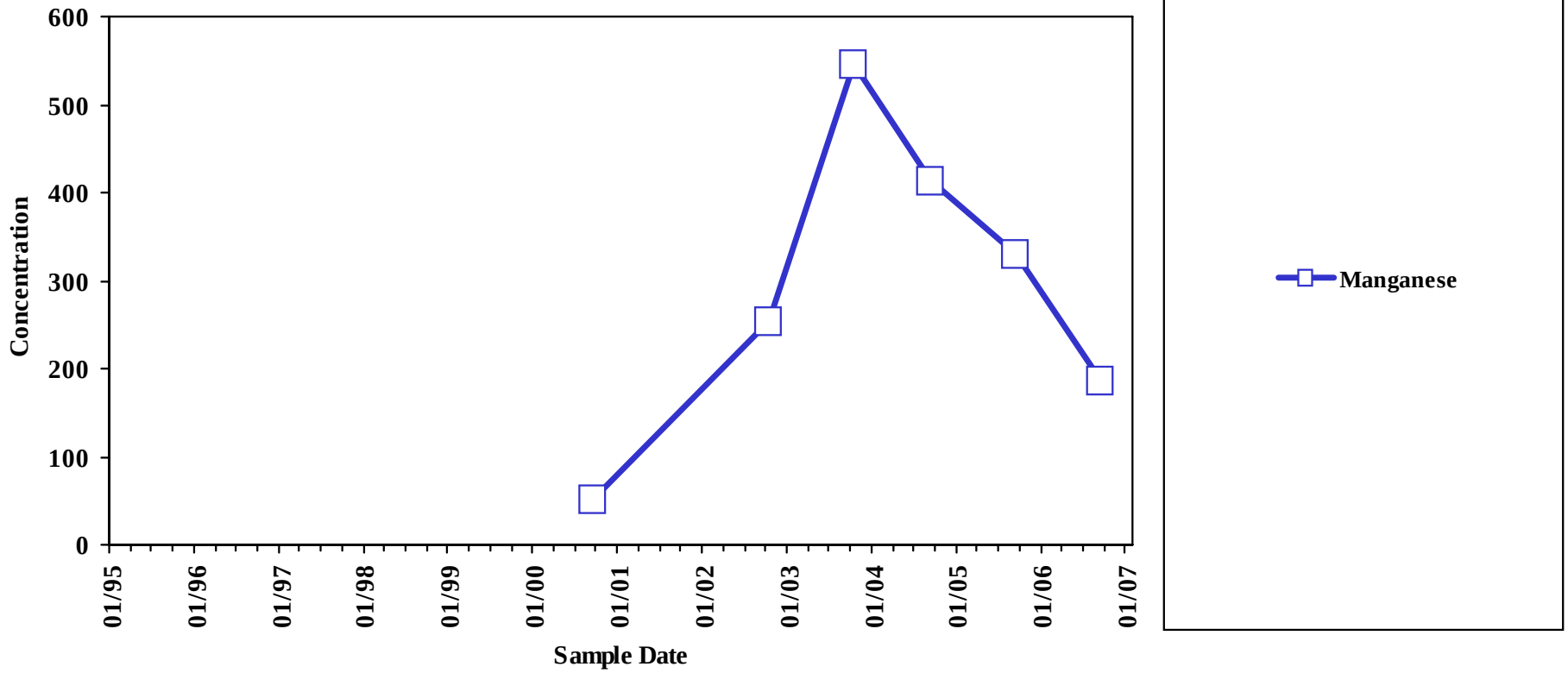
Zinc
--

Sample Location:

SED-16

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

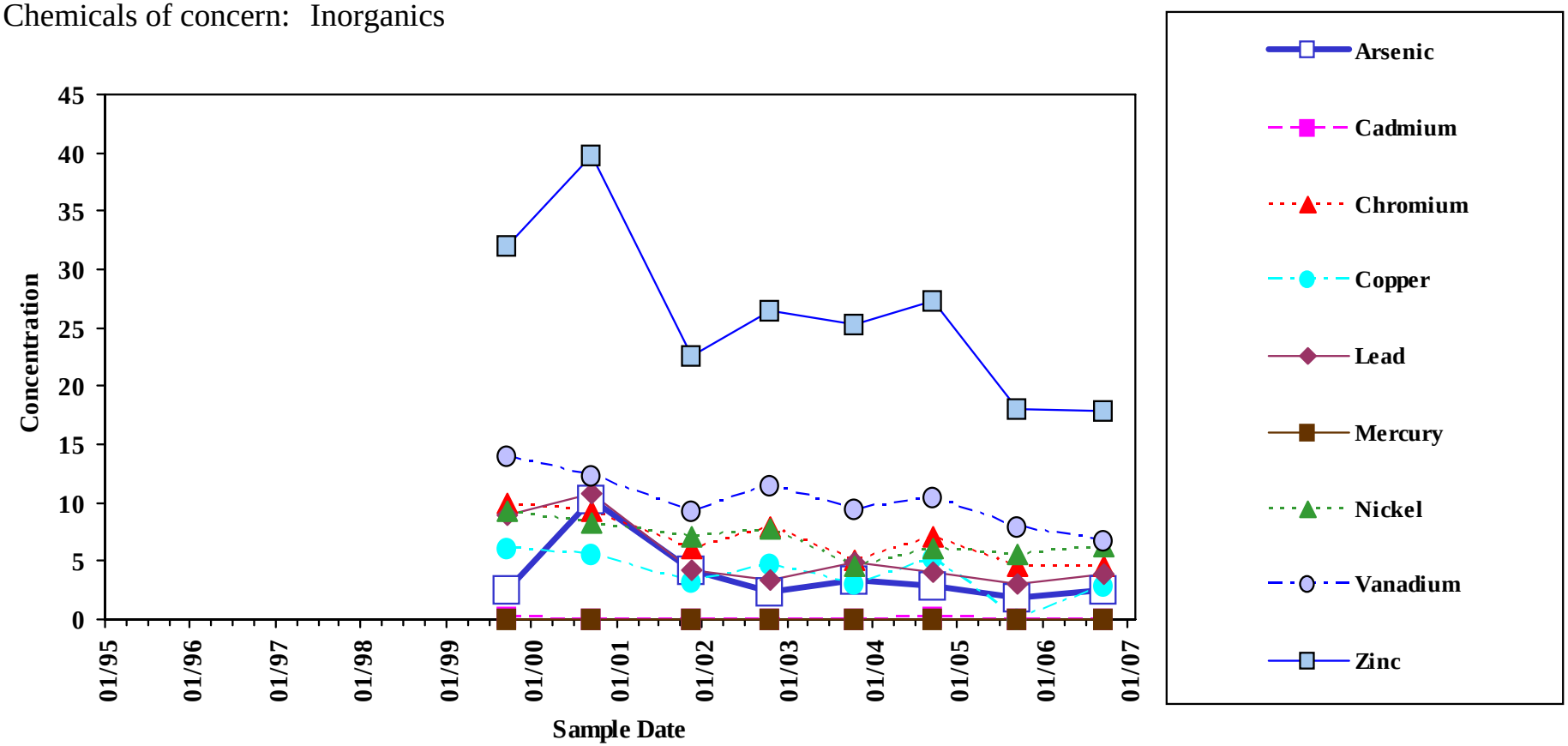
Clean-up Standard	Manganese
	630

Sample Location:

SED-17

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

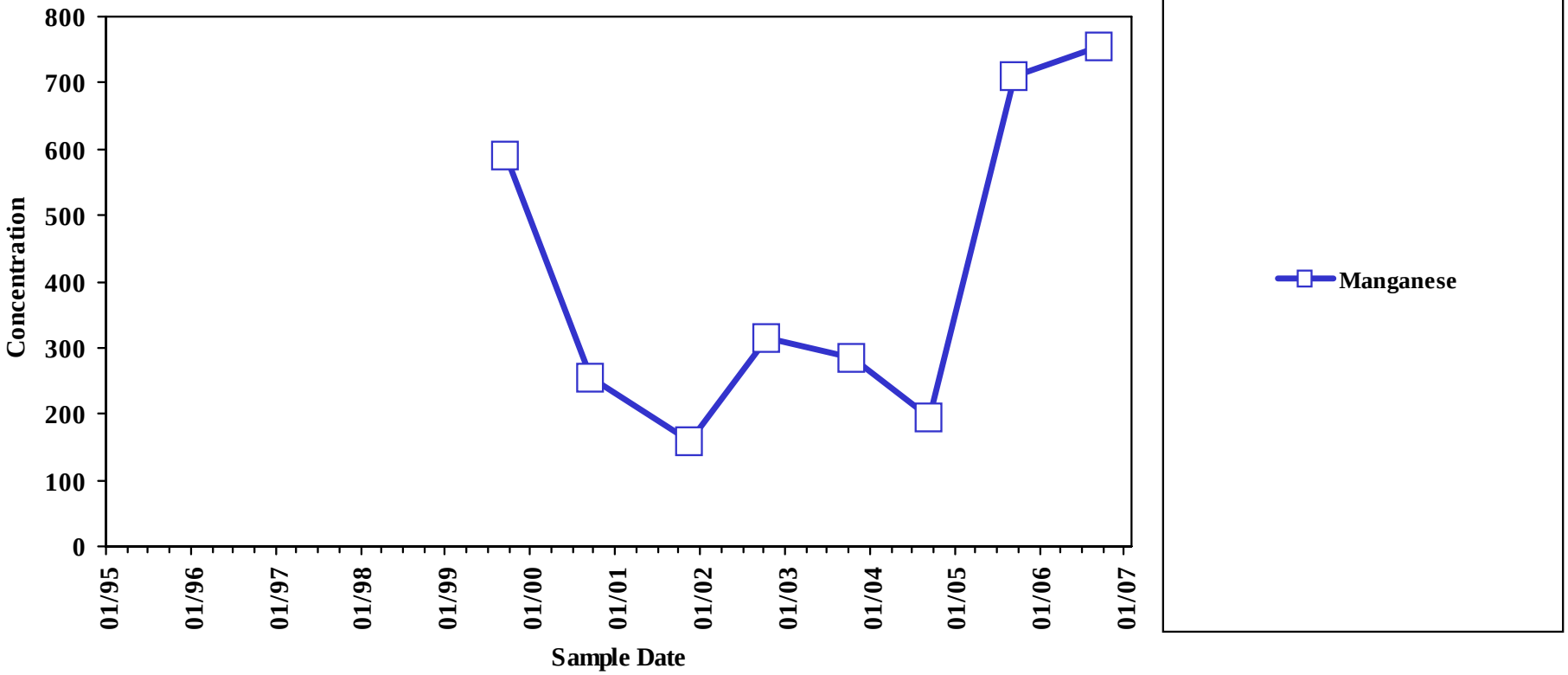
Zinc
--

Sample Location:

SED-17

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

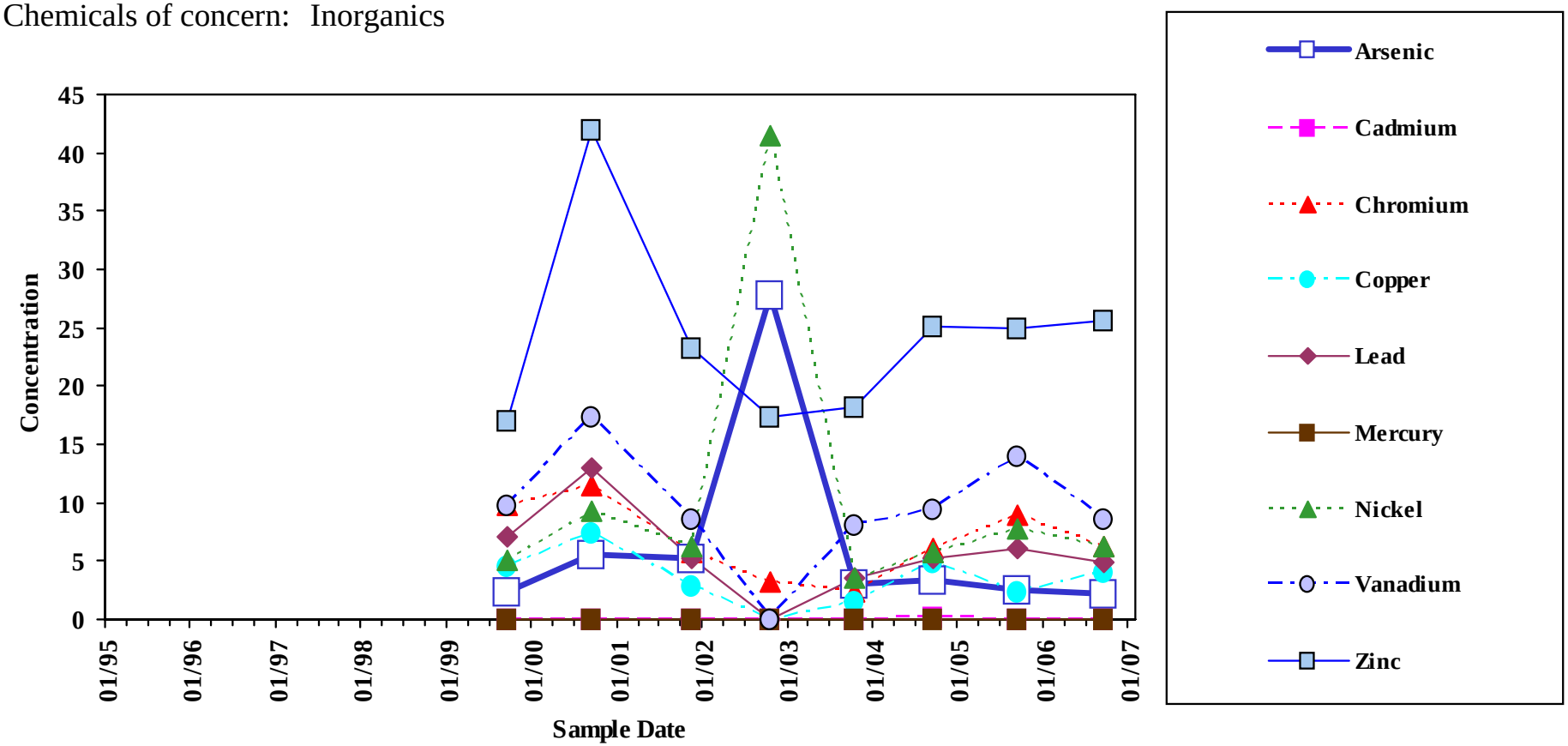
Clean-up Standard	Manganese
	630

Sample Location:

SED-18

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

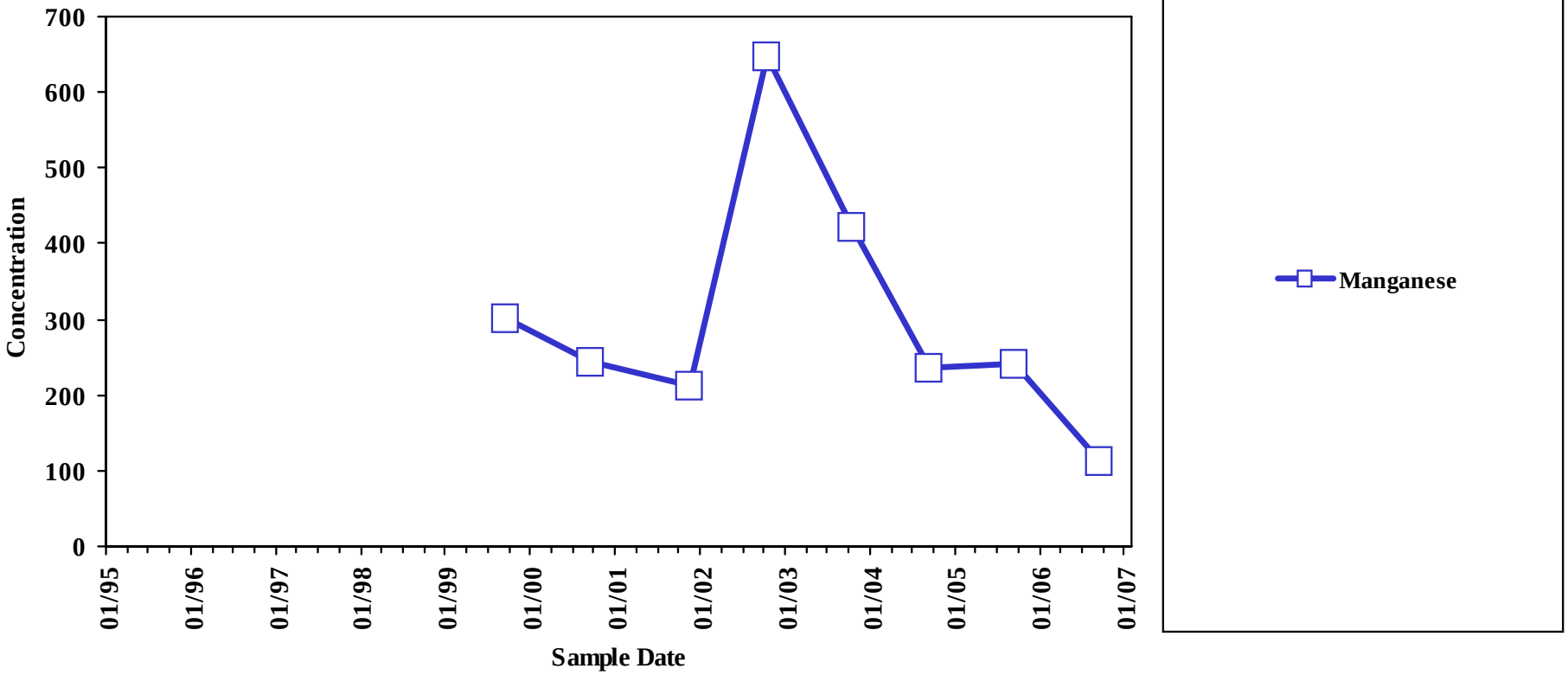
Zinc
--

Sample Location:

SED-18

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

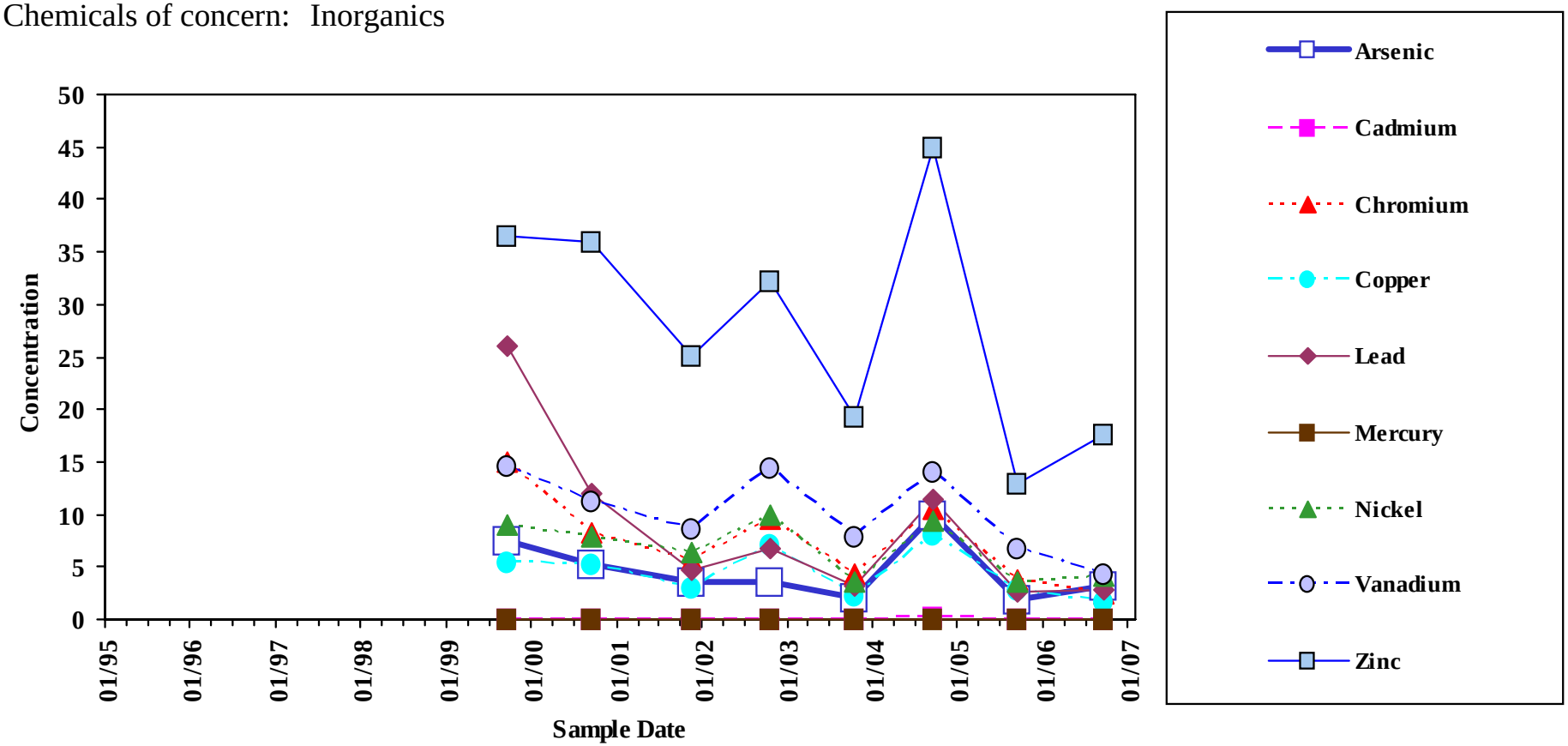
Clean-up Standard	Manganese
	630

Sample Location:

SED-19

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

Clean-up Standard	Arsenic	Cadmium	Chromium	Copper	Lead	Mercury	Nickel	Vanadium
	9.8	0.99	43.4	31.6	35.8	0.18	22.7	43

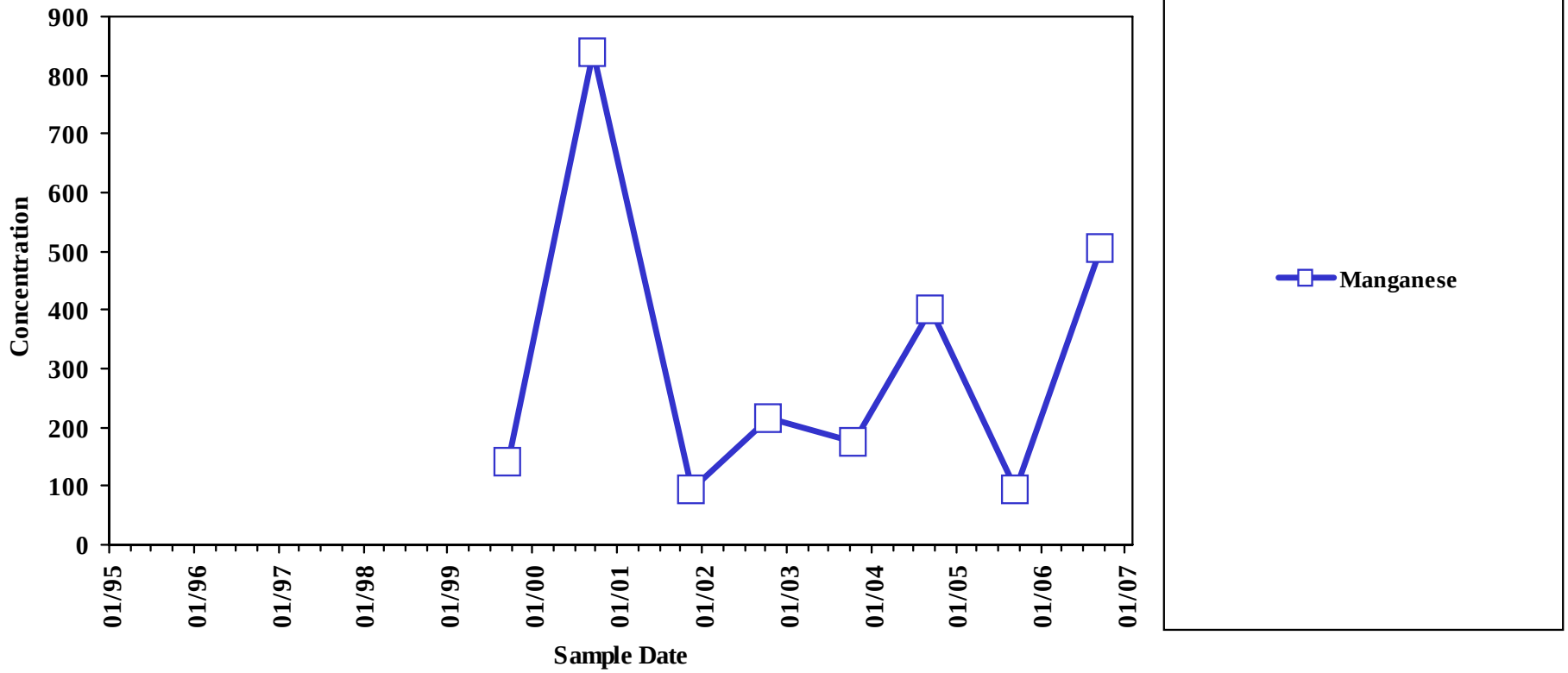
Zinc
--

Sample Location:

SED-19

Sites 1 & 3
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/Kg

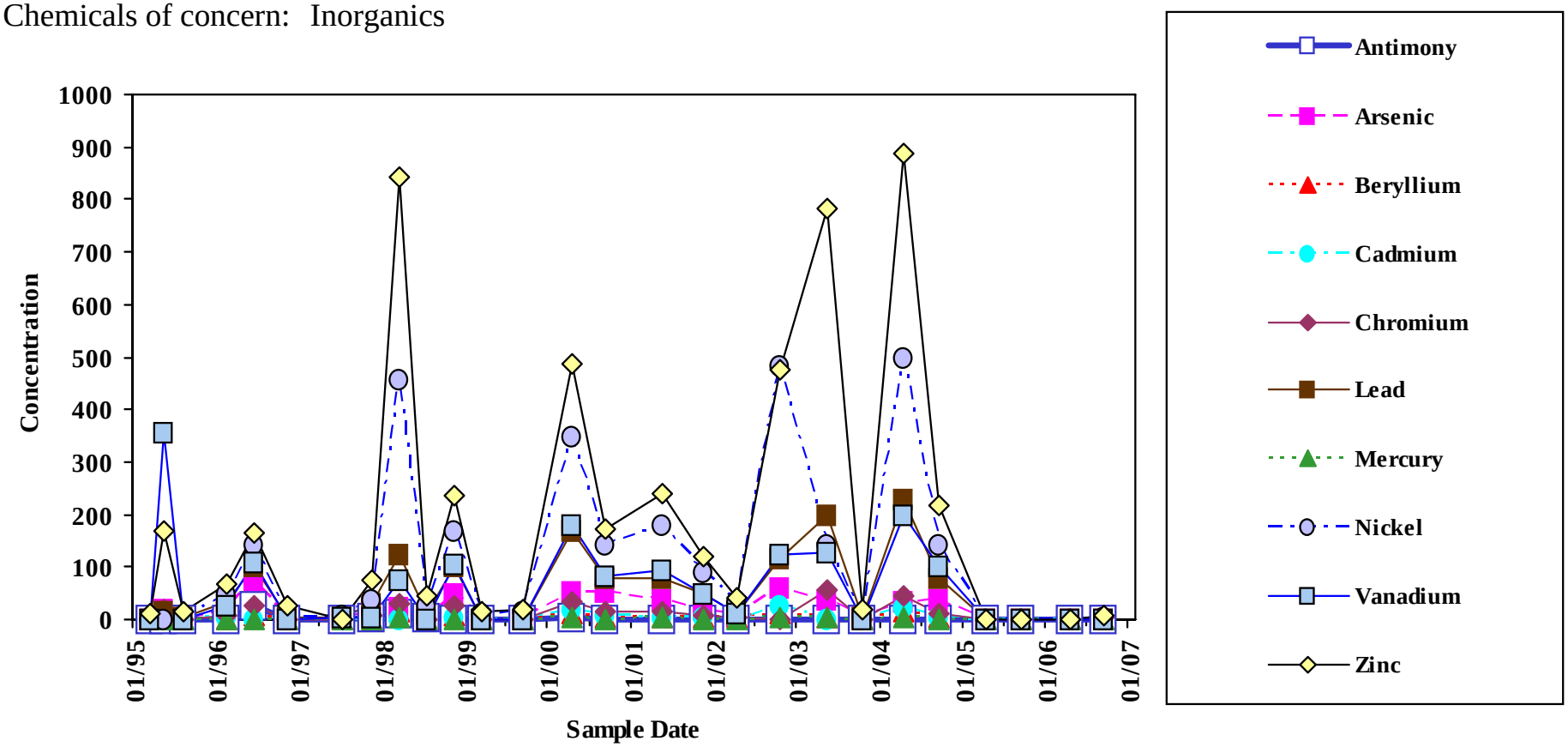
Clean-up Standard	Manganese
	630

Sample Location:

SEEP-01

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/L

Clean-up Standard	Antimony	Arsenic	Beryllium	Cadmium	Chromium	Lead	Mercury	Nickel
	30	150	0.66	0.08	11	0.41	0.91	13.4

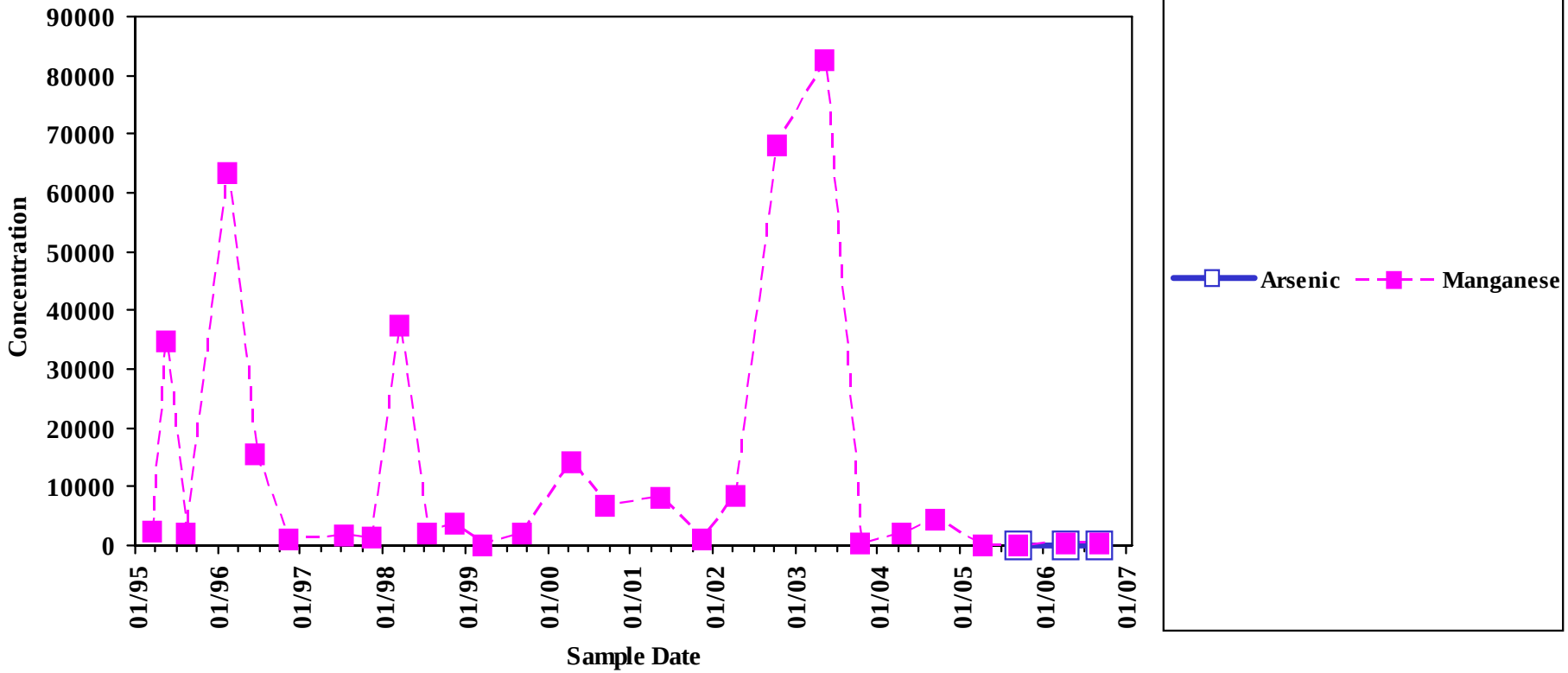
Vanadium	Zinc
20	--

Sample Location:

SEEP-01

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

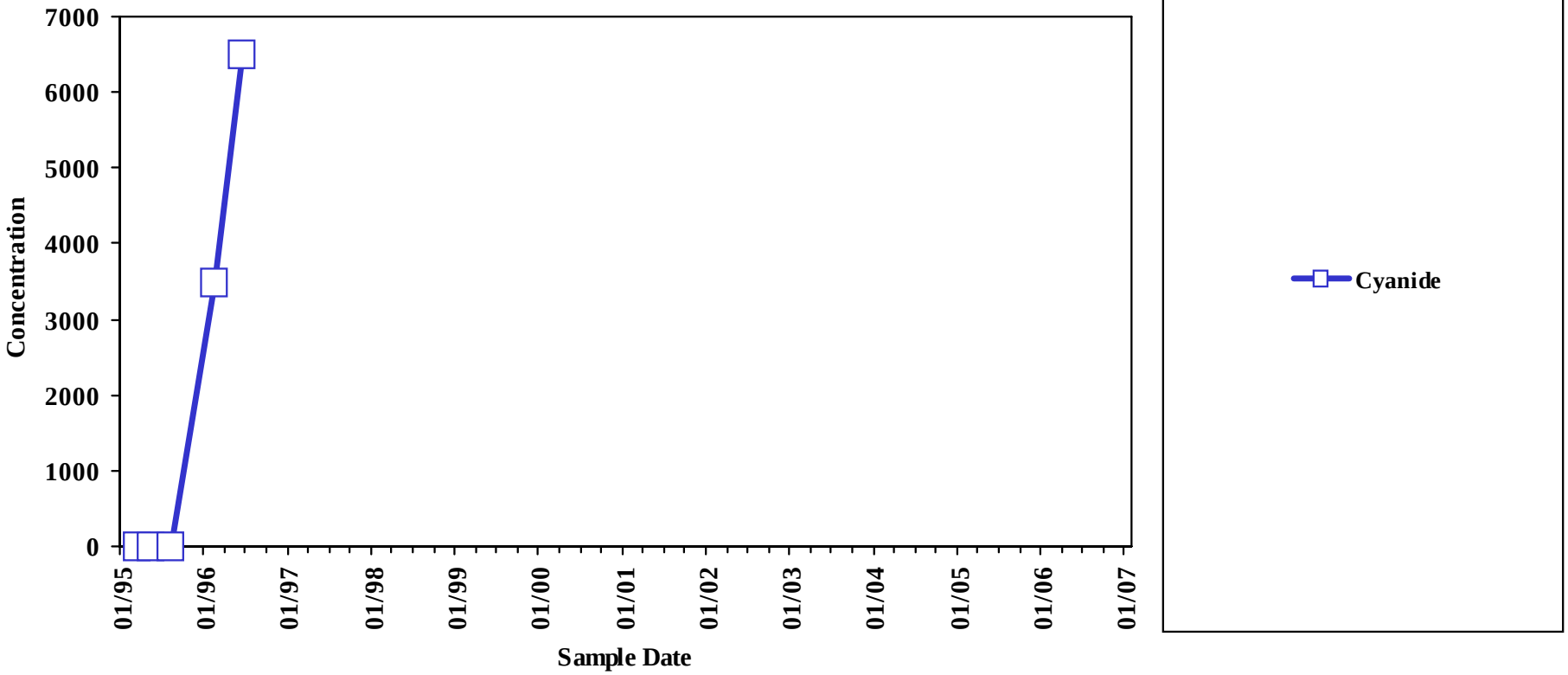
Clean-up Standard	Arsenic	Manganese
	150	120

Sample Location:

SEEP-01

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

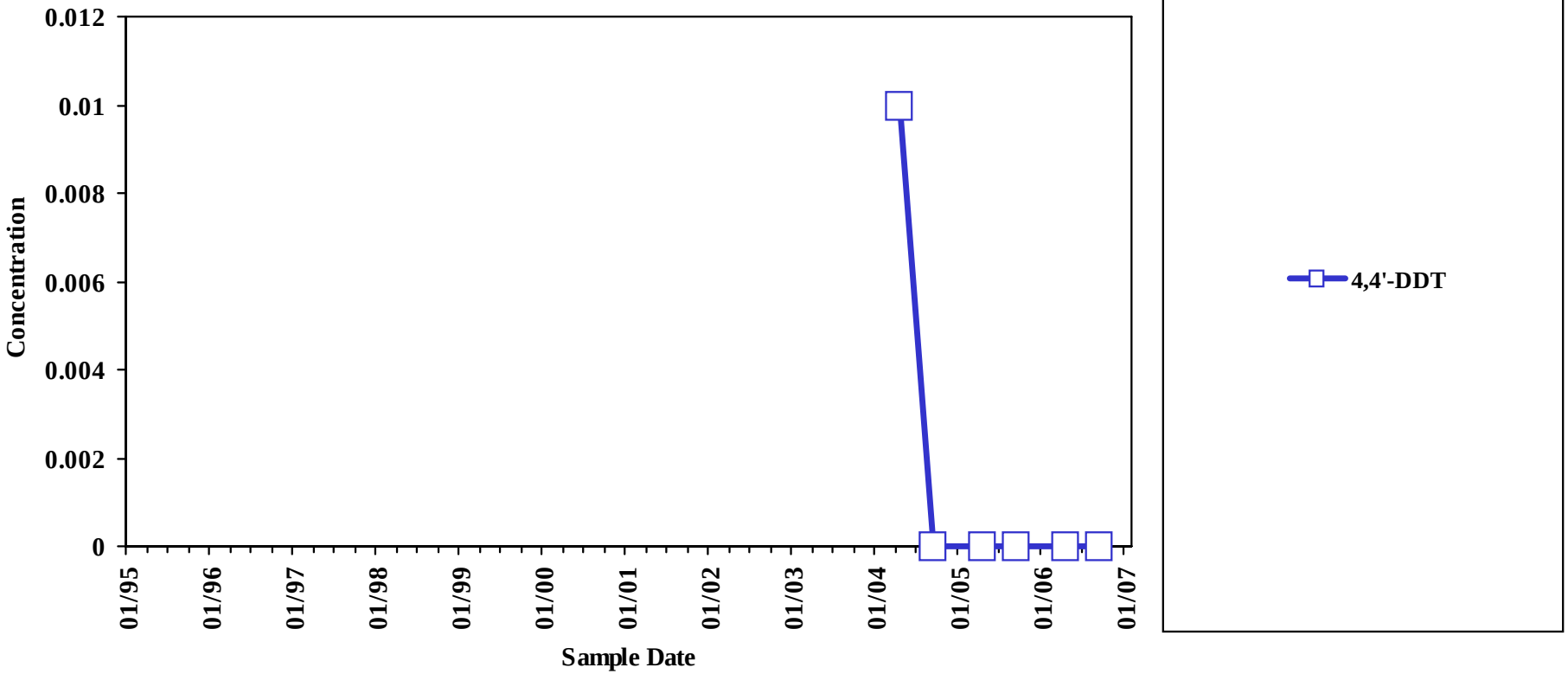
Sample concentration units: µg/L

Sample Location:

SEEP-01

Sites 1 & 3
Leachate

Chemicals of concern: Pesticides



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

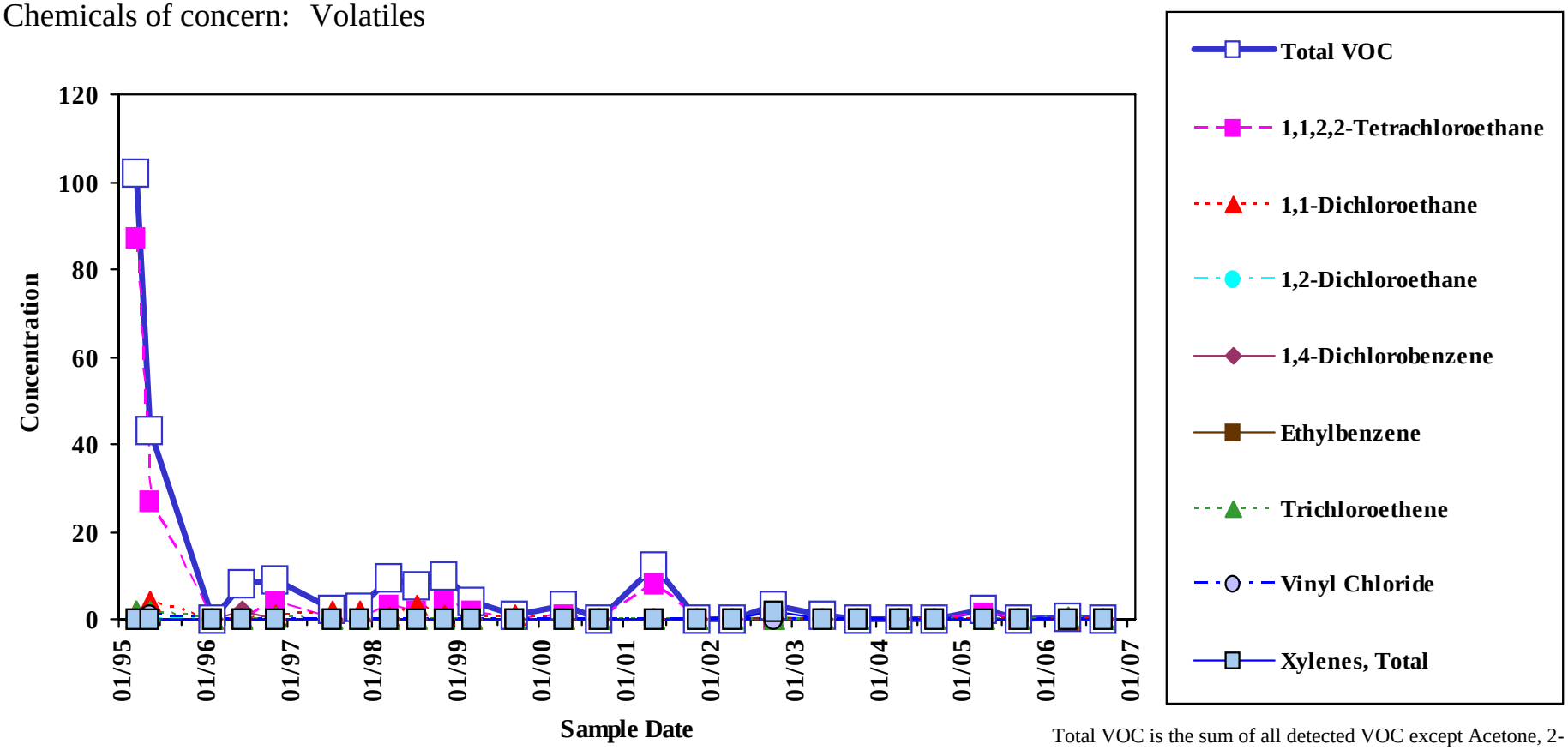
Clean-up Standard	4,4'-DDT
	0.00012

Sample Location:

SEEP-01

Sites 1 & 3
Leachate

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

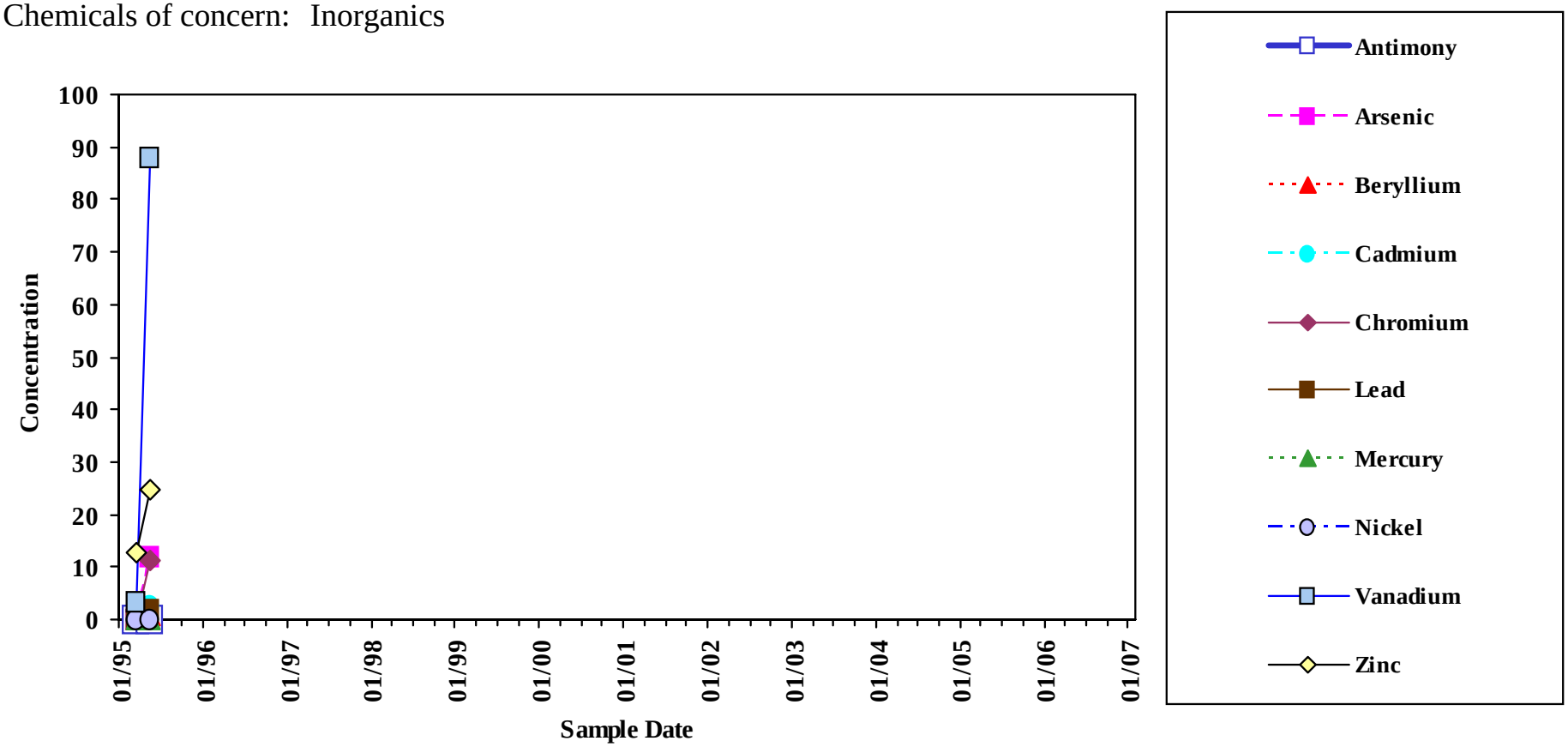
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,1-Dichloroethane	1,2-Dichloroethane	1,4-Dichlorobenzene	Ethylbenzene	Trichloroethene	Vinyl Chloride	Xylenes, Total
	610	47	910	15	7.3	47	0.069	1.8

Sample Location:

SEEP-02

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/L

Clean-up Standard	Antimony	Arsenic	Beryllium	Cadmium	Chromium	Lead	Mercury	Nickel
	30	150	0.66	0.08	11	0.41	0.91	13.4

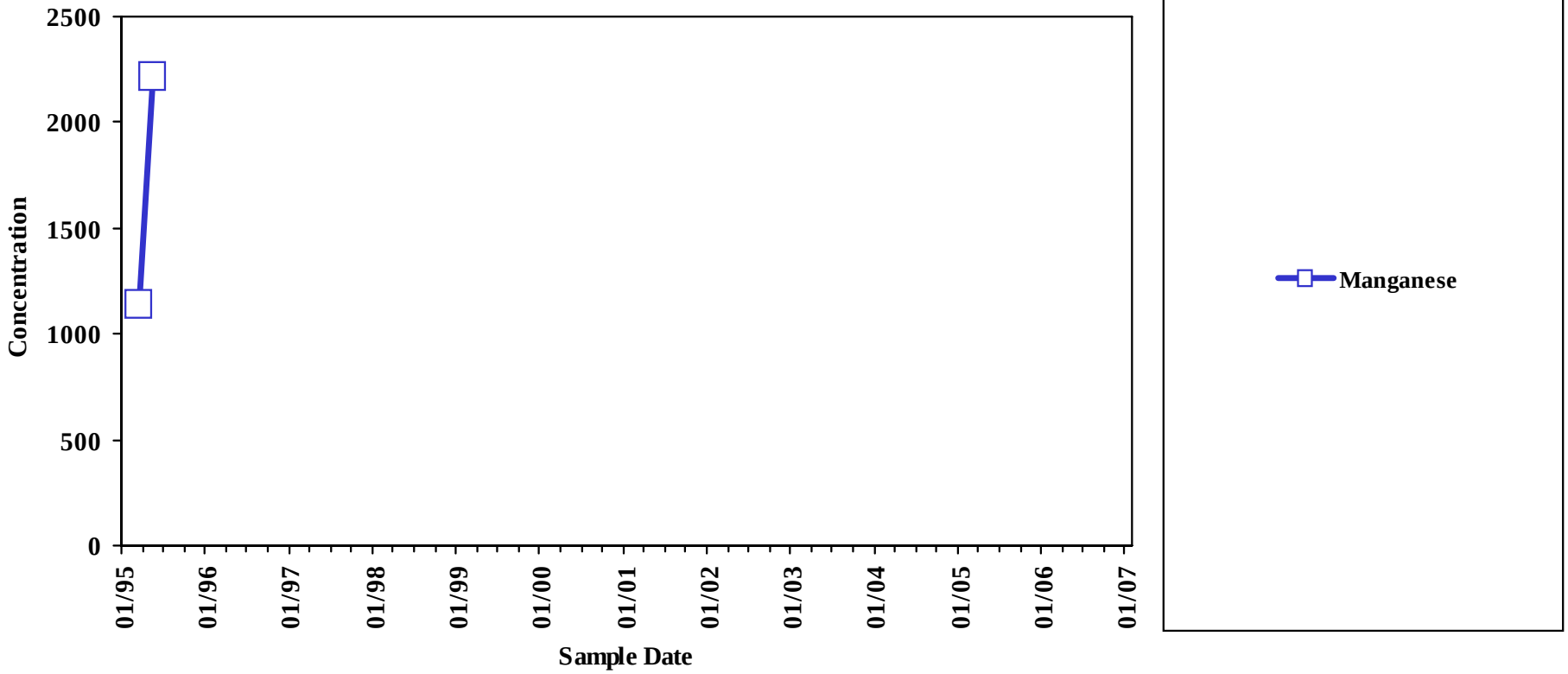
Vanadium	Zinc
20	--

Sample Location:

SEEP-02

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

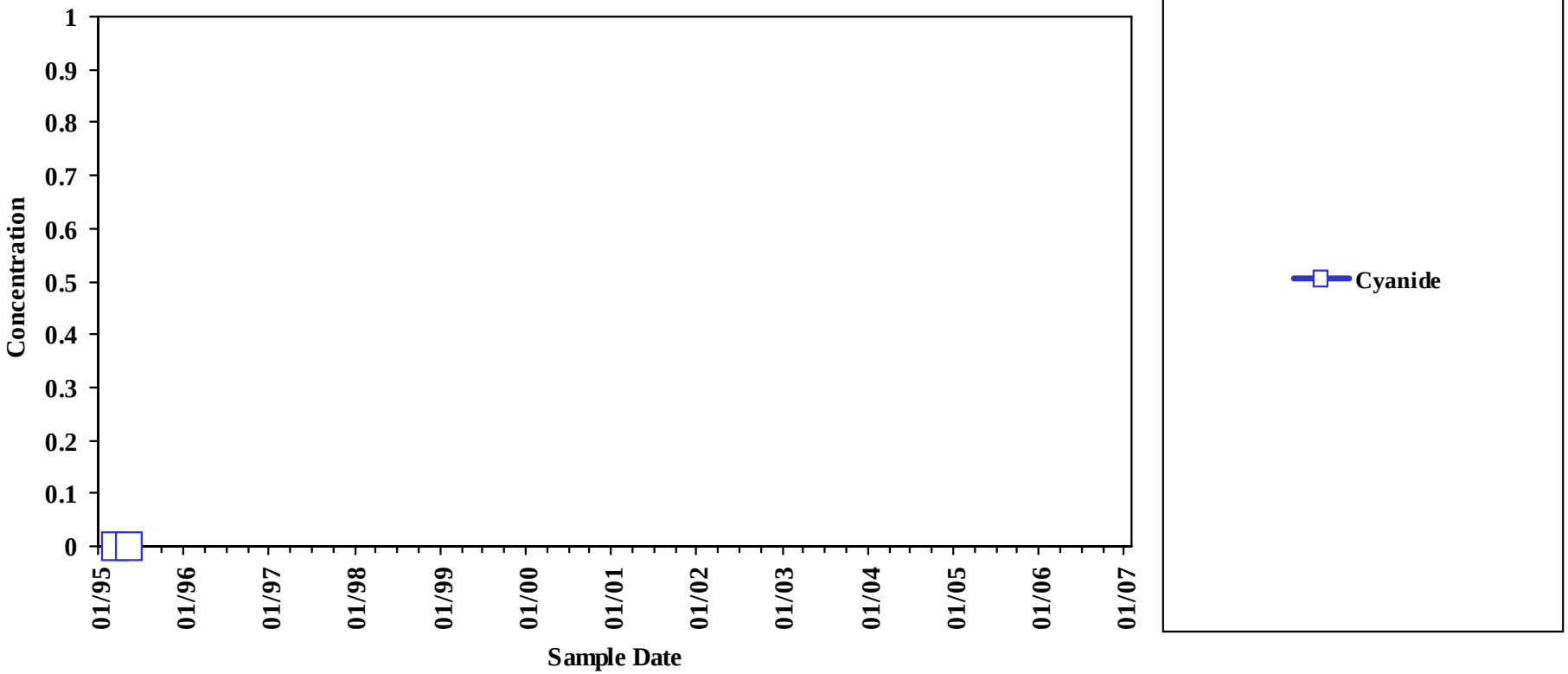
Clean-up Standard	Arsenic	Manganese
	150	120

Sample Location:

SEEP-02

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

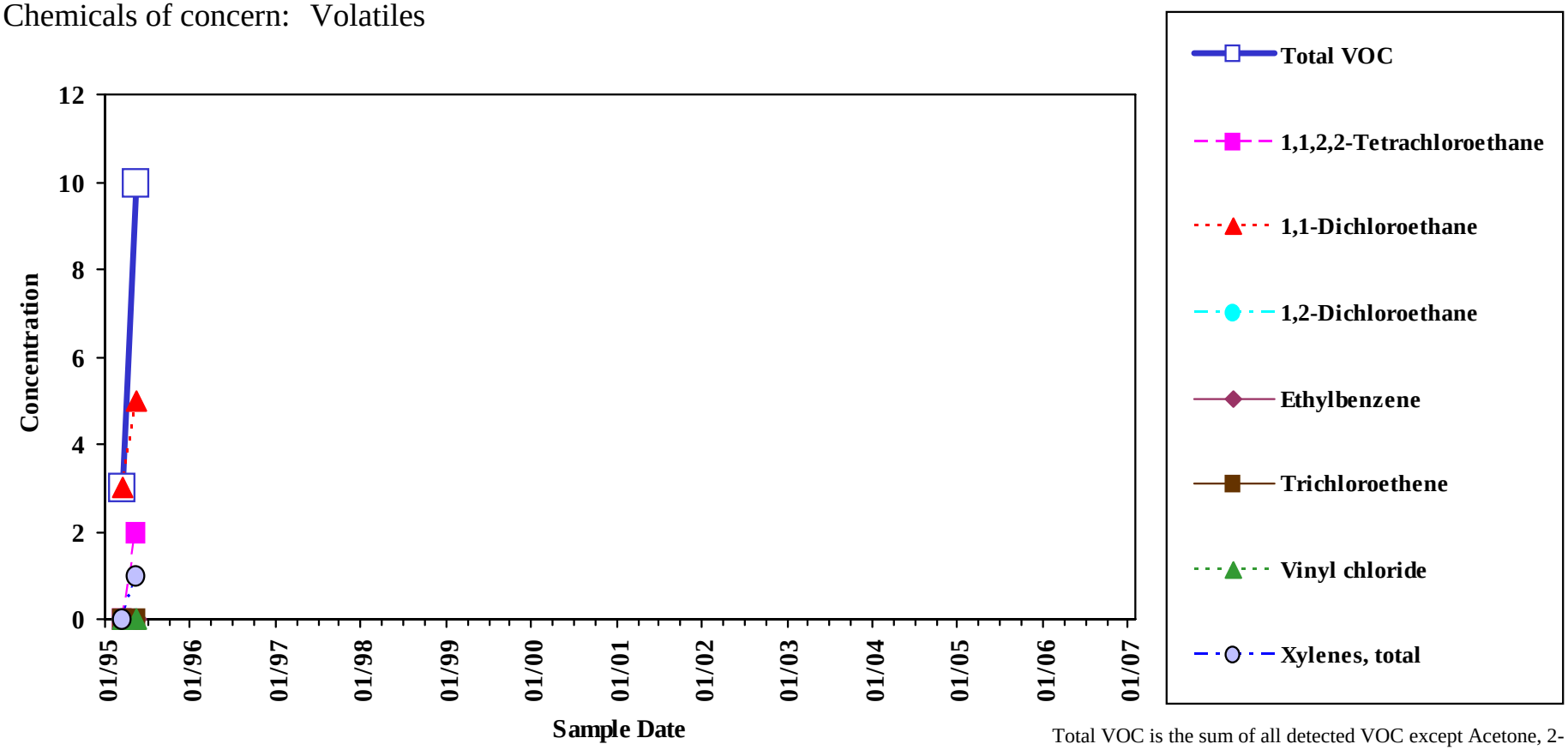
Sample concentration units: µg/L

Sample Location:

SEEP-02

Sites 1 & 3
Leachate

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

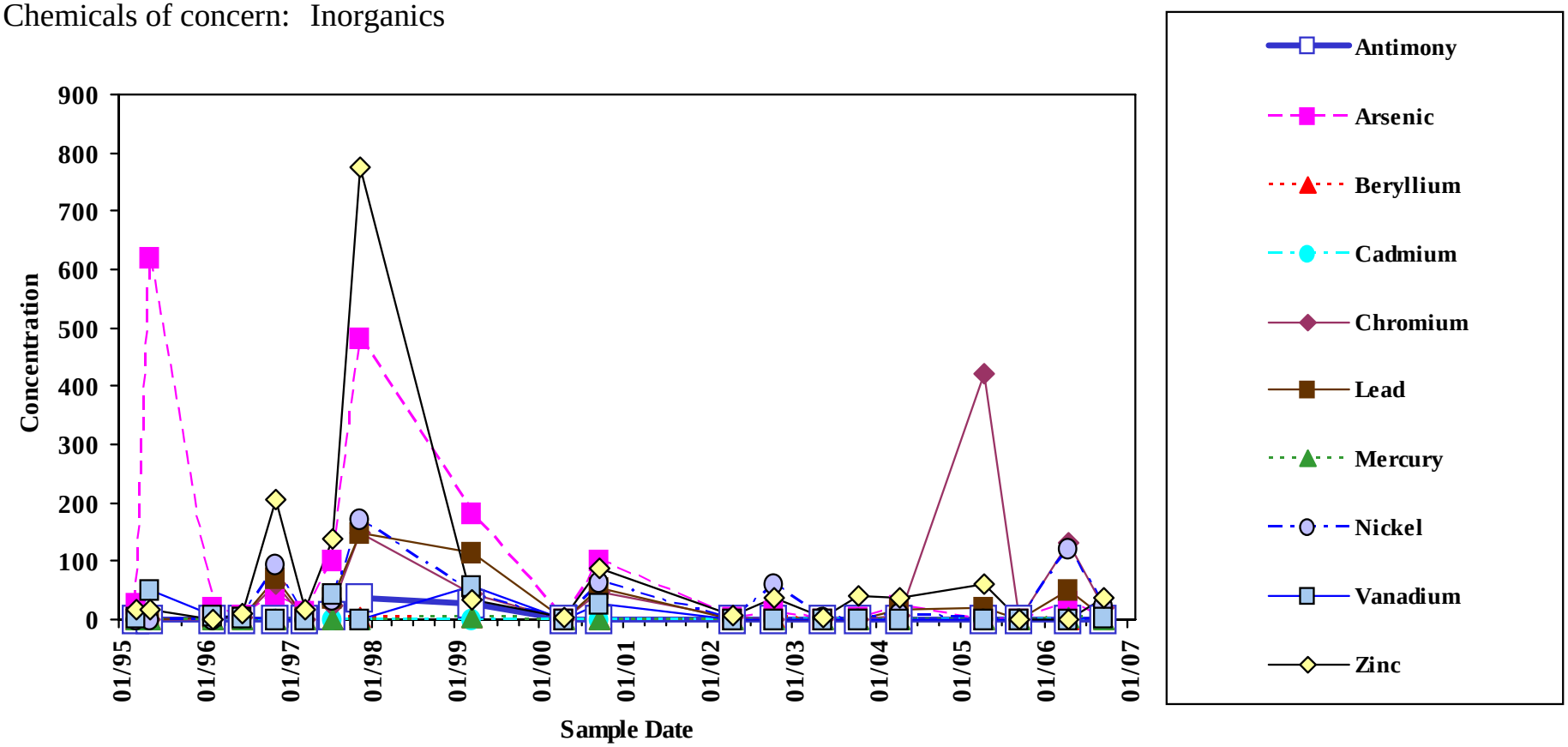
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,1-Dichloroethane	1,2-Dichloroethane	1,4-Dichlorobenzene	Ethylbenzene	Trichloroethene	Vinyl Chloride	Xylenes, Total
	610	47	910	15	7.3	47	0.069	1.8

Sample Location:

SEEP-03

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/L

Clean-up Standard	Antimony	Arsenic	Beryllium	Cadmium	Chromium	Lead	Mercury	Nickel
	30	150	0.66	0.08	11	0.41	0.91	13.4

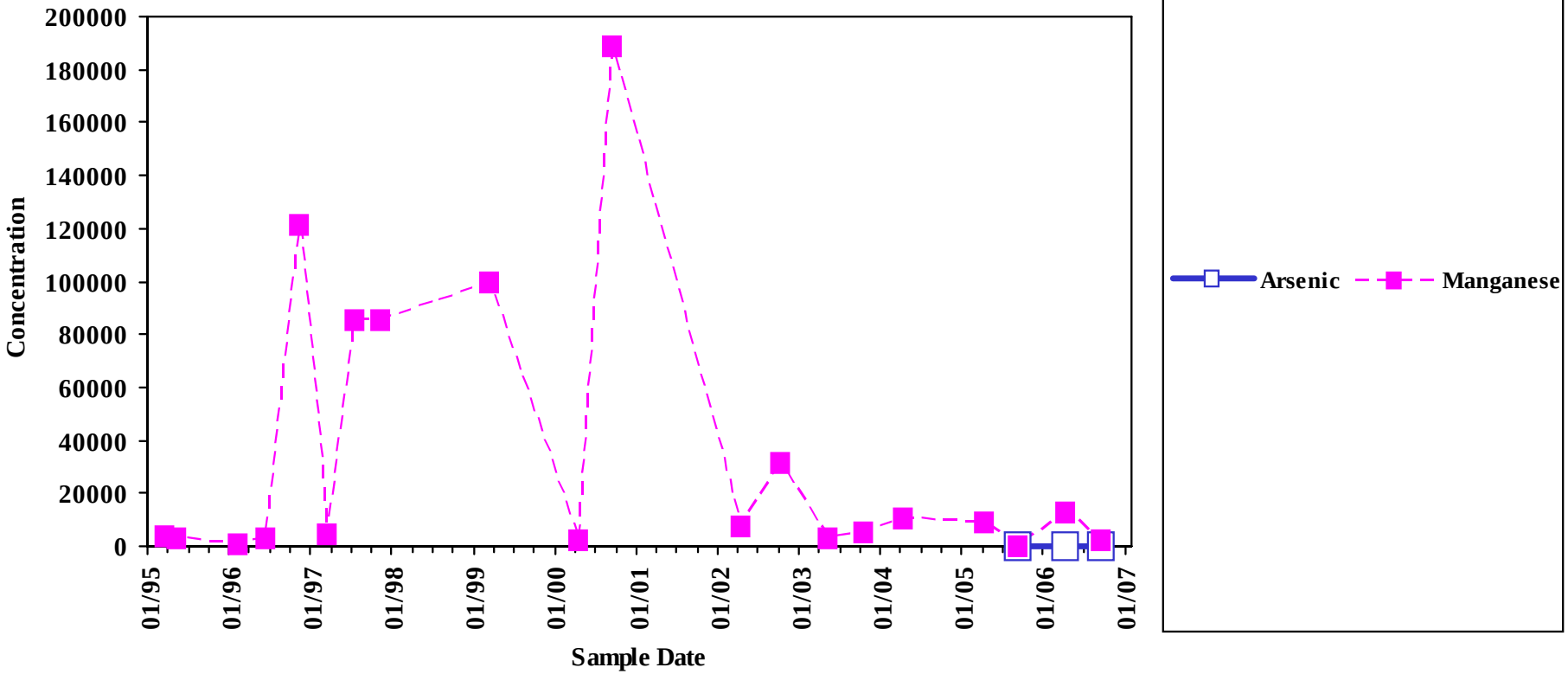
Vanadium	Zinc
20	--

Sample Location:

SEEP-03

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

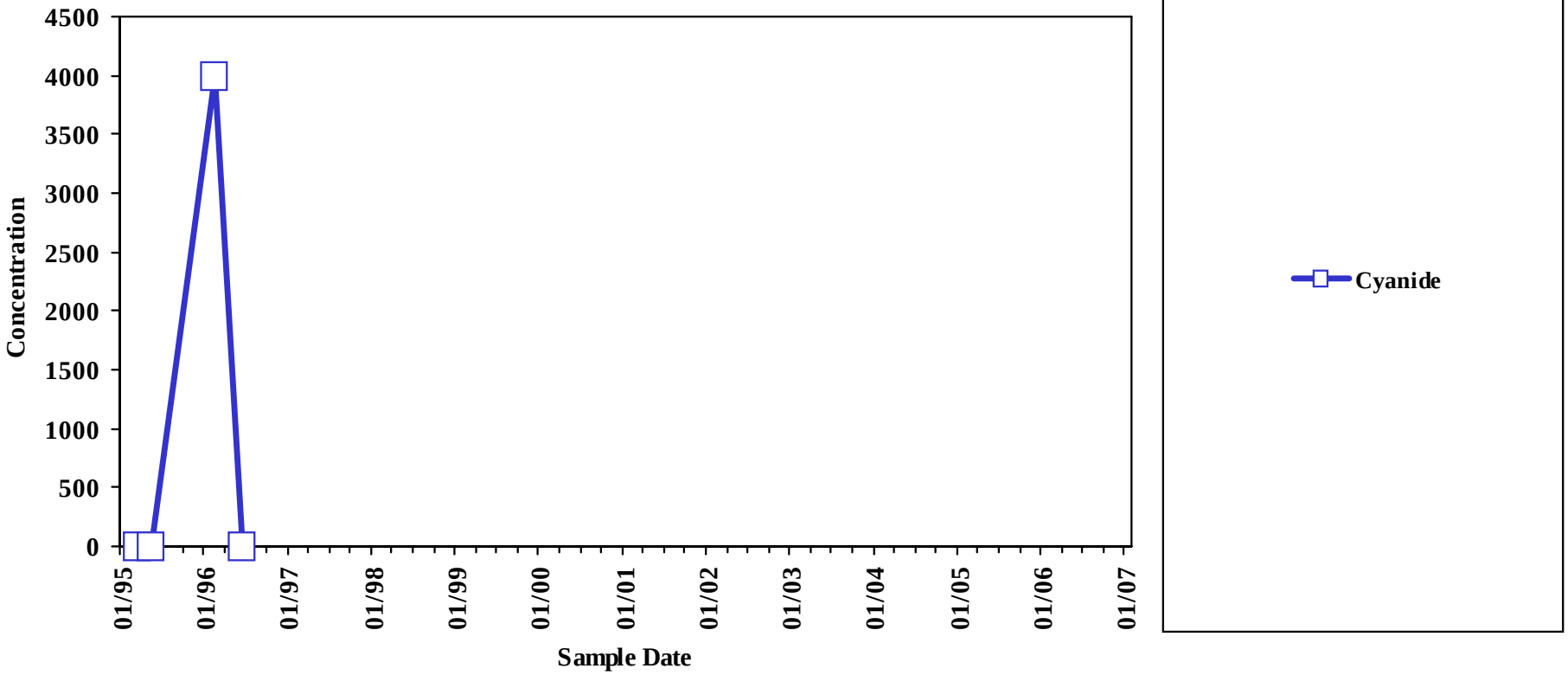
Clean-up Standard	Arsenic	Manganese
	150	120

Sample Location:

SEEP-03

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

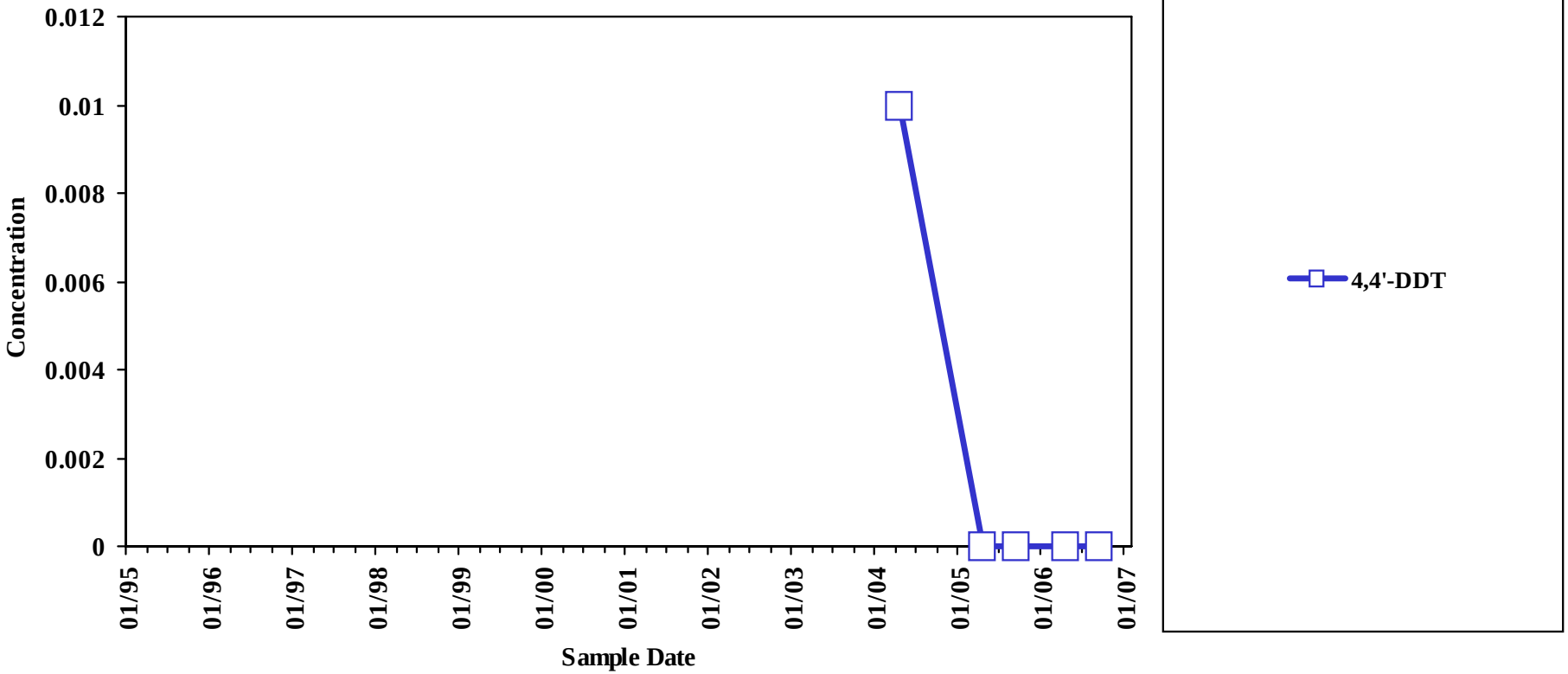
Sample concentration units: µg/L

Sample Location:

SEEP-03

Sites 1 & 3
Leachate

Chemicals of concern: Pesticides



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

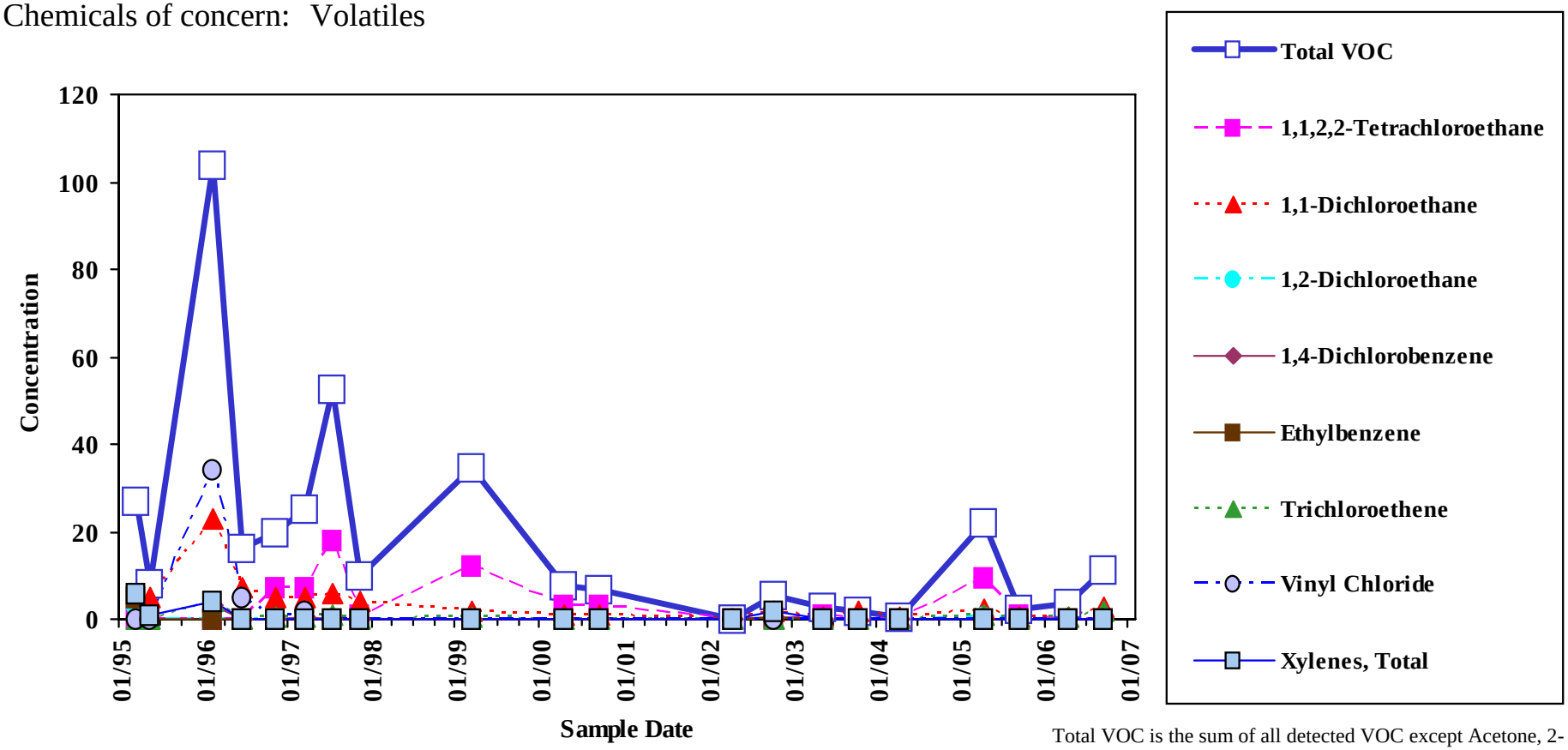
Clean-up Standard	4,4'-DDT
	0.00012

Sample Location:

SEEP-03

Sites 1 & 3
Leachate

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

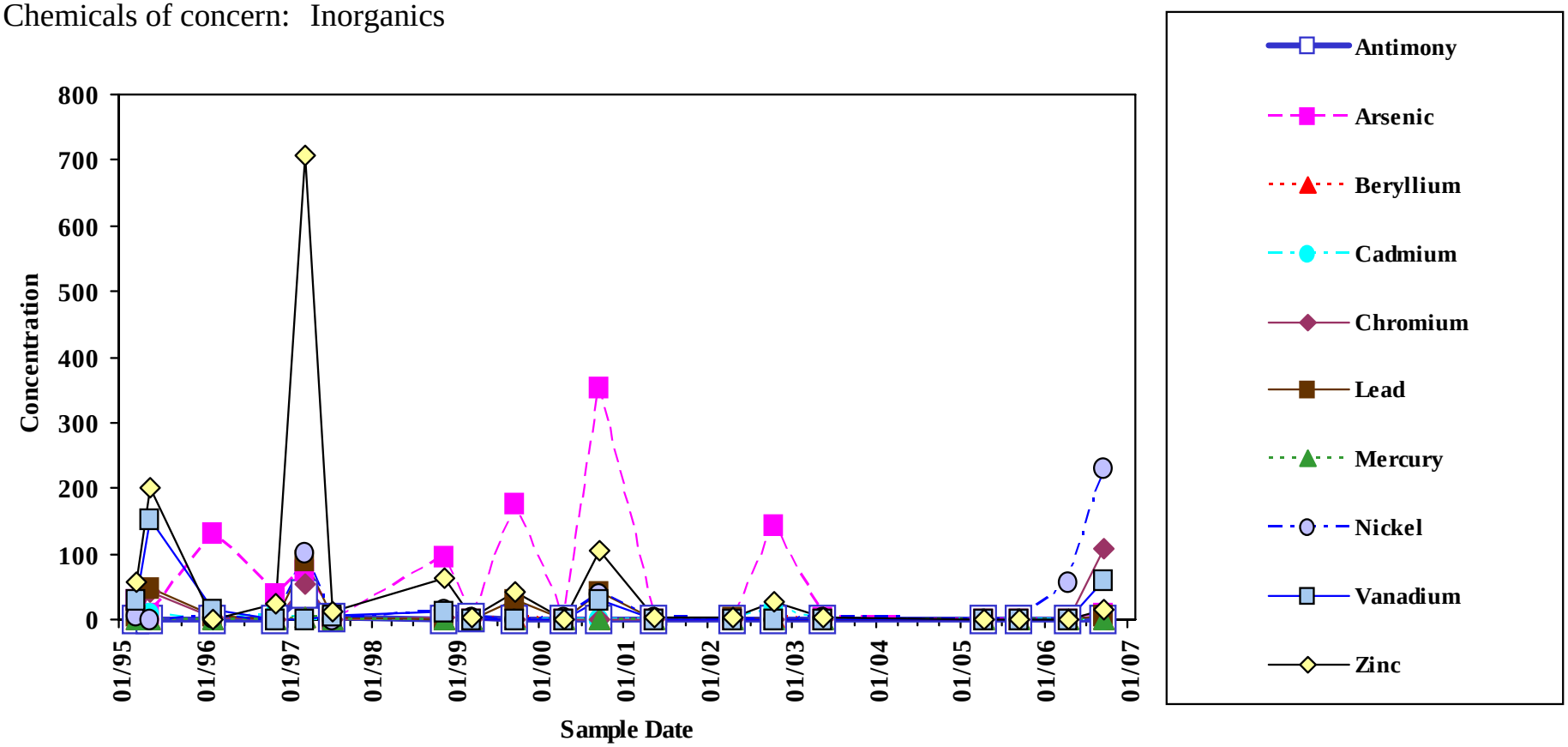
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,1-Dichloroethane	1,2-Dichloroethane	1,4-Dichlorobenzene	Ethylbenzene	Trichloroethene	Vinyl Chloride	Xylenes, Total
	610	47	910	15	7.3	47	0.069	1.8

Sample Location:

SEEP-04

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/L

Clean-up Standard	Antimony	Arsenic	Beryllium	Cadmium	Chromium	Lead	Mercury	Nickel
	30	150	0.66	0.08	11	0.41	0.91	13.4

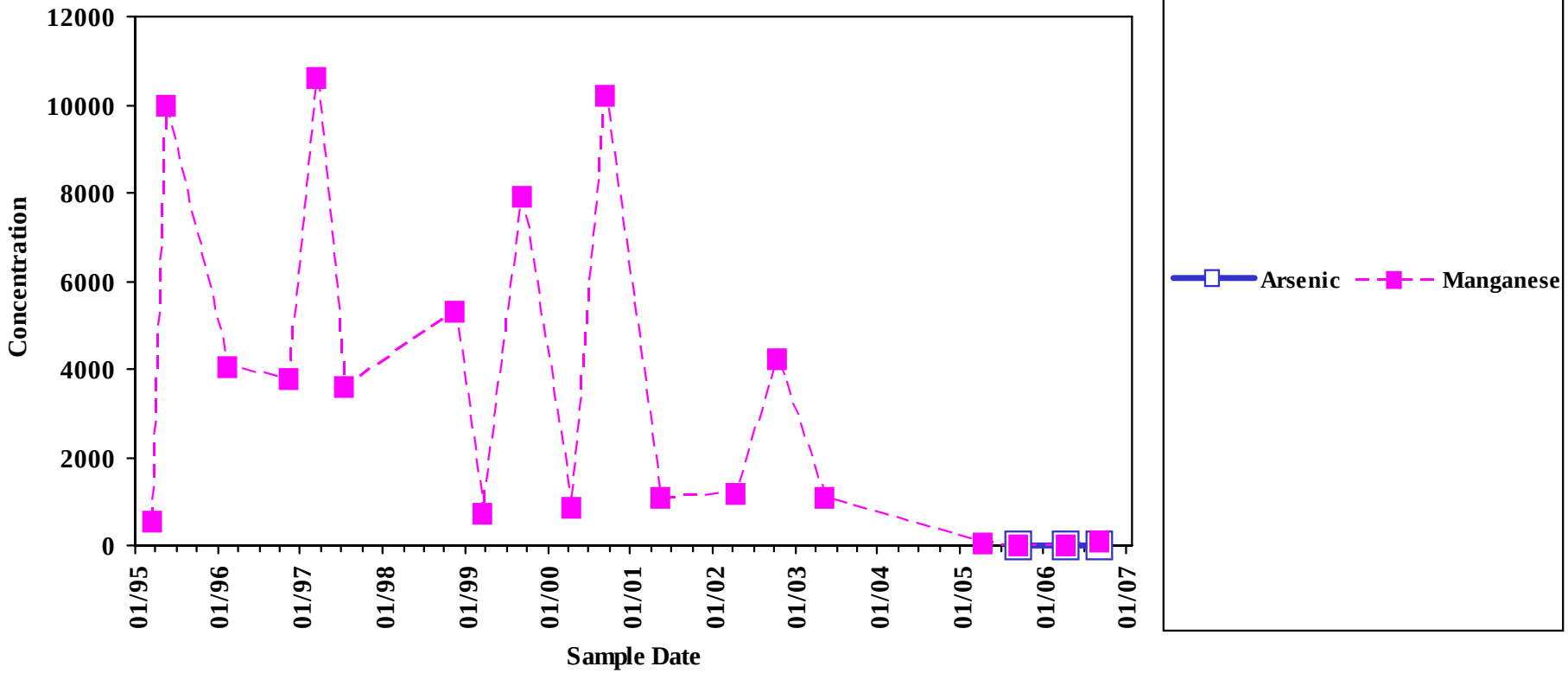
Vanadium	Zinc
20	--

Sample Location:

SEEP-04

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

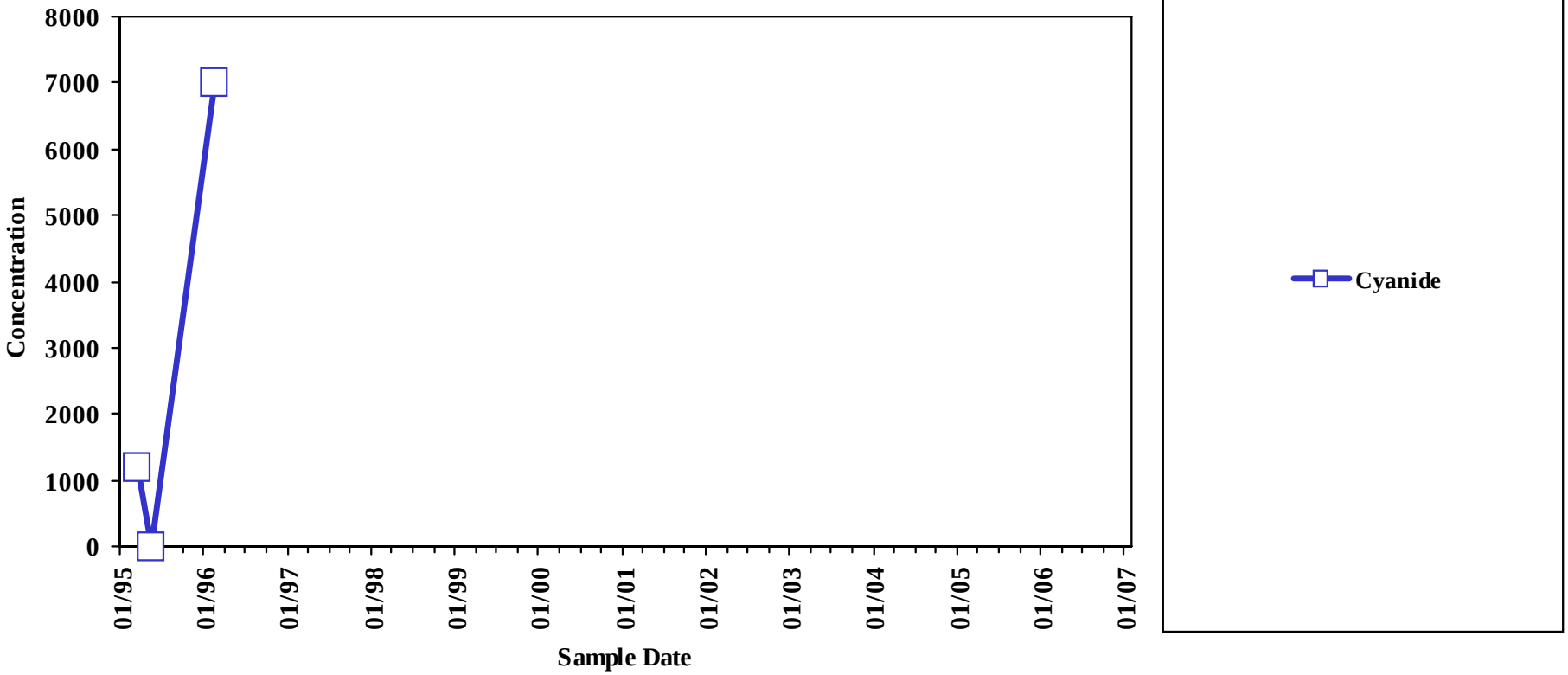
Clean-up Standard	Arsenic	Manganese
	150	120

Sample Location:

SEEP-04

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

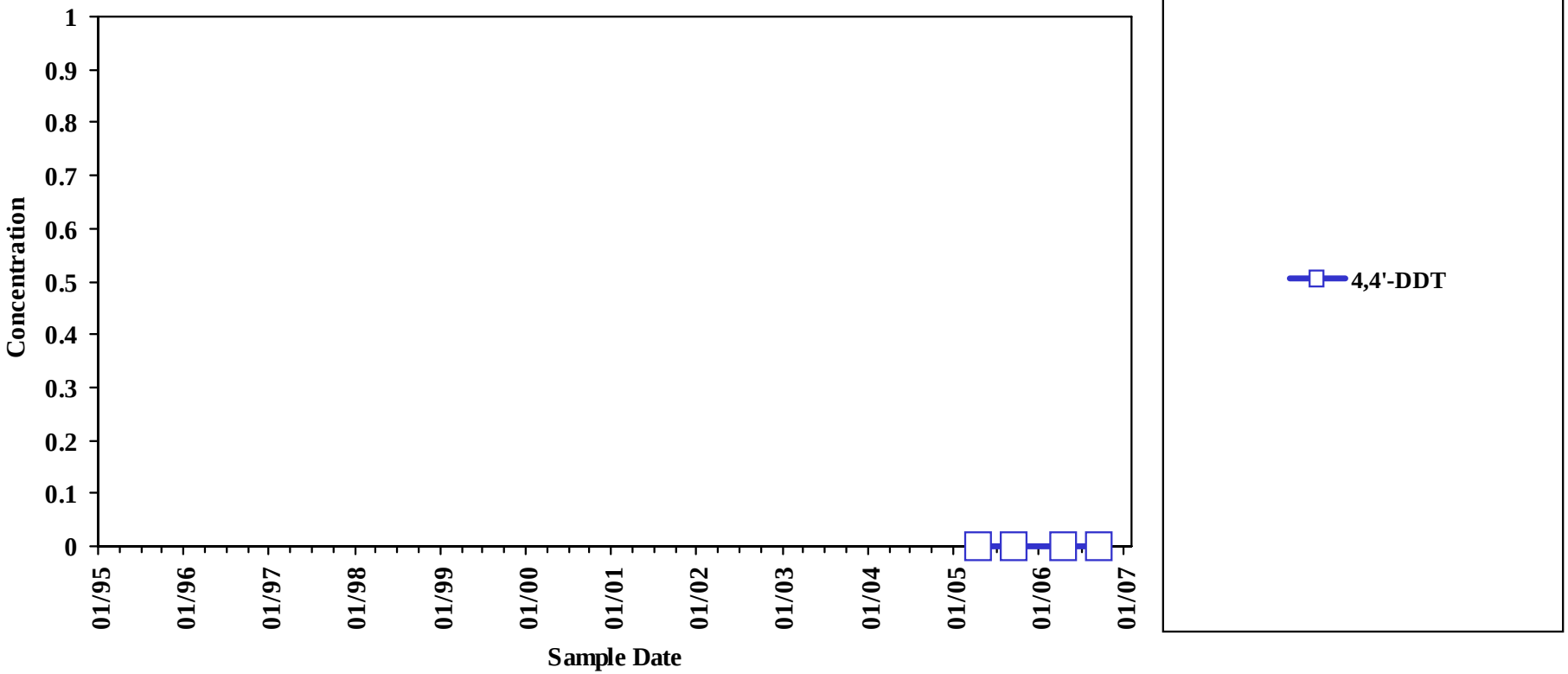
Sample concentration units: µg/L

Sample Location:

SEEP-04

Sites 1 & 3
Leachate

Chemicals of concern: Pesticides



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	4,4'-DDT
	0.00012

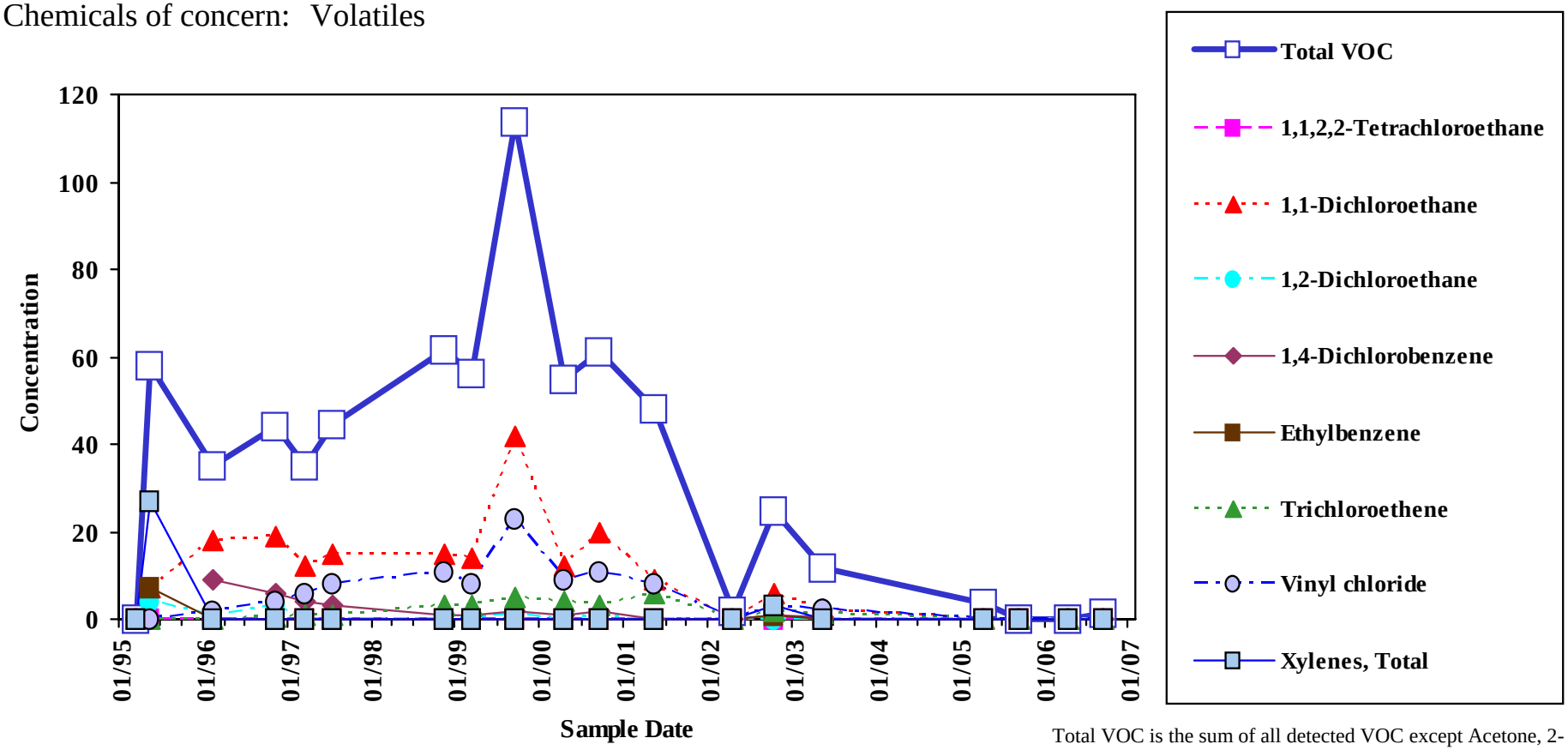
Sample Location:

SEEP-04

Sites 1 & 3

Leachate

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

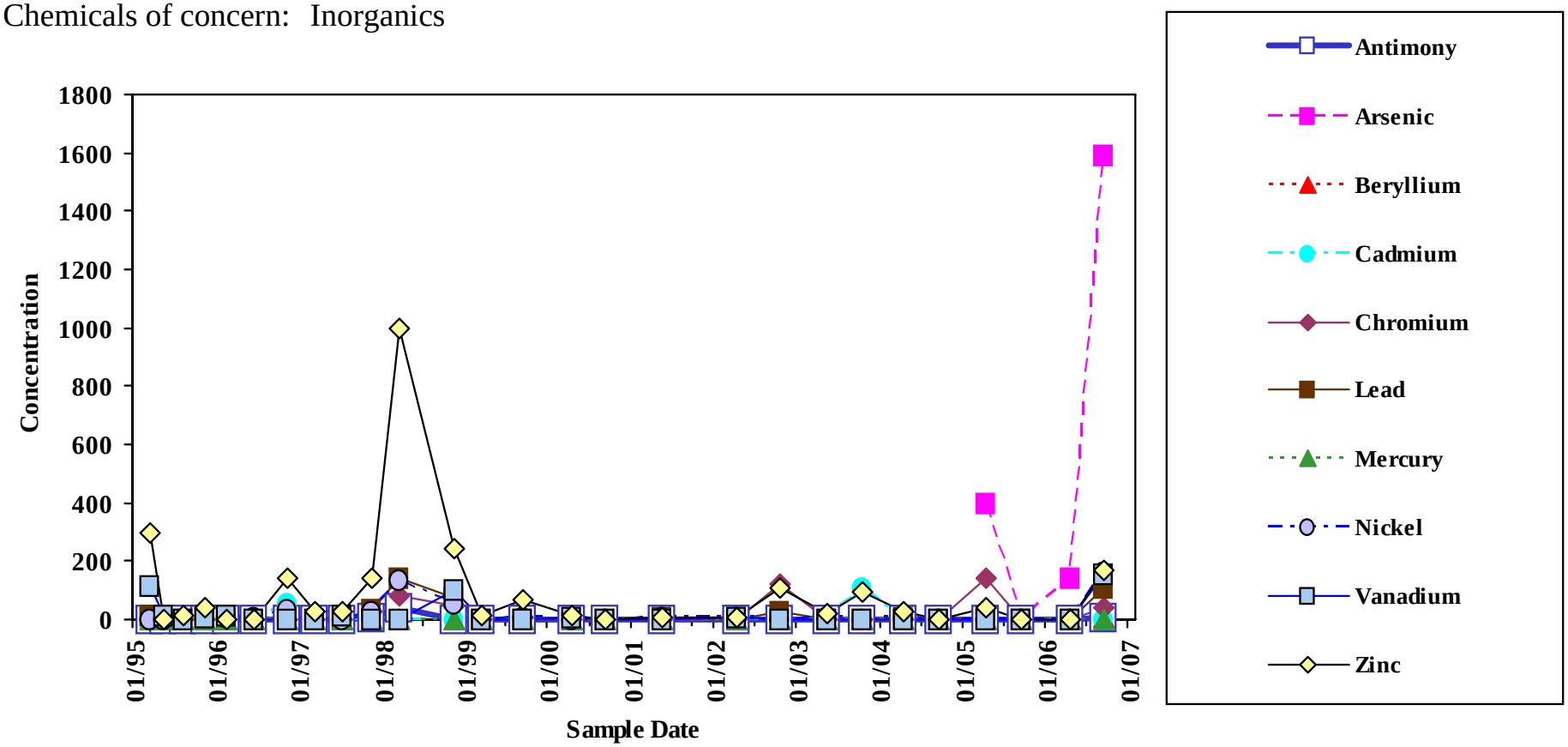
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,1-Dichloroethane	1,2-Dichloroethane	1,4-Dichlorobenzene	Ethylbenzene	Trichloroethene	Vinyl Chloride	Xylenes, Total
	610	47	910	15	7.3	47	0.069	1.8

Sample Location:

SEEP-05

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: mg/L

Clean-up Standard	Antimony	Arsenic	Beryllium	Cadmium	Chromium	Lead	Mercury	Nickel
	30	150	0.66	0.08	11	0.41	0.91	13.4

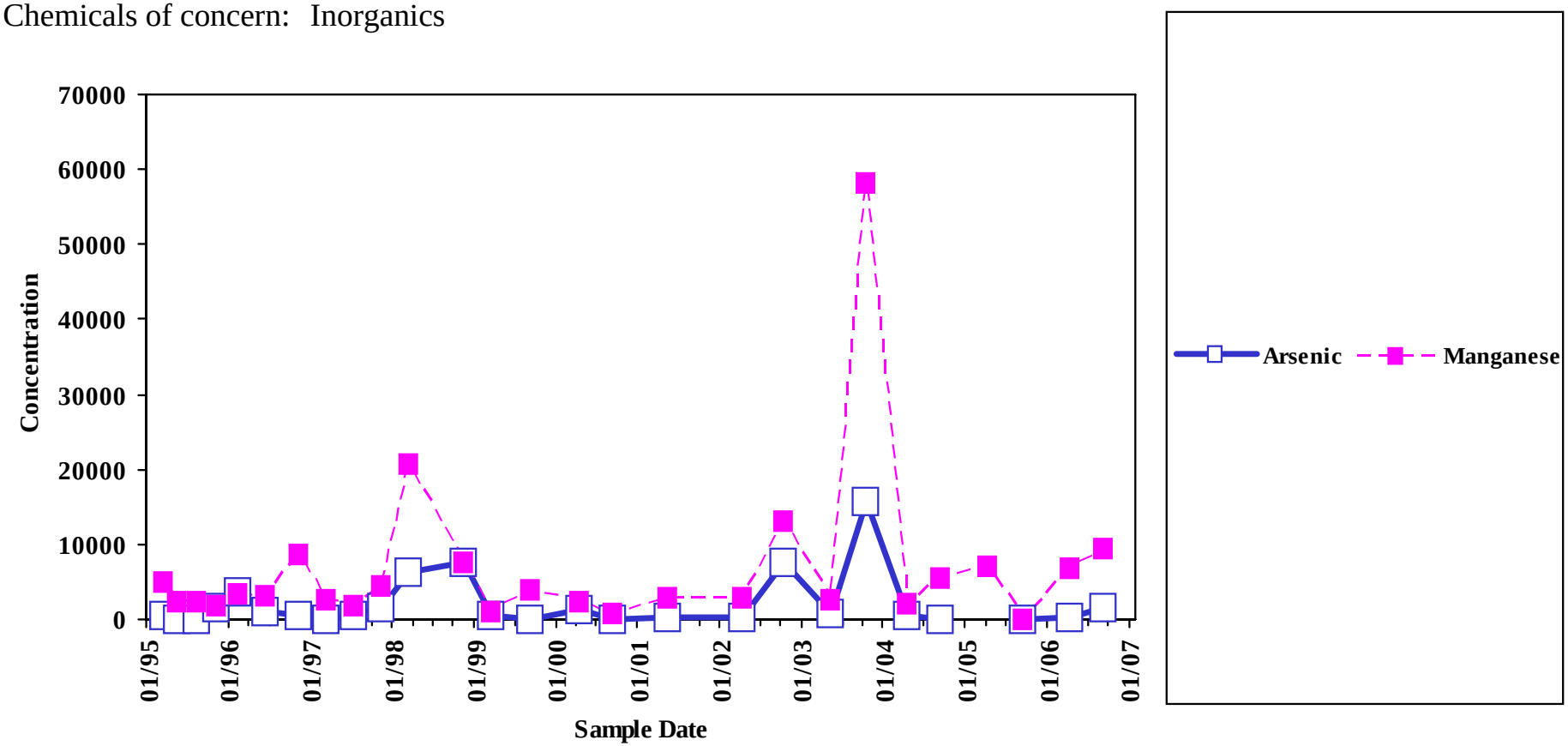
Vanadium	Zinc
20	--

Sample Location:

SEEP-05

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

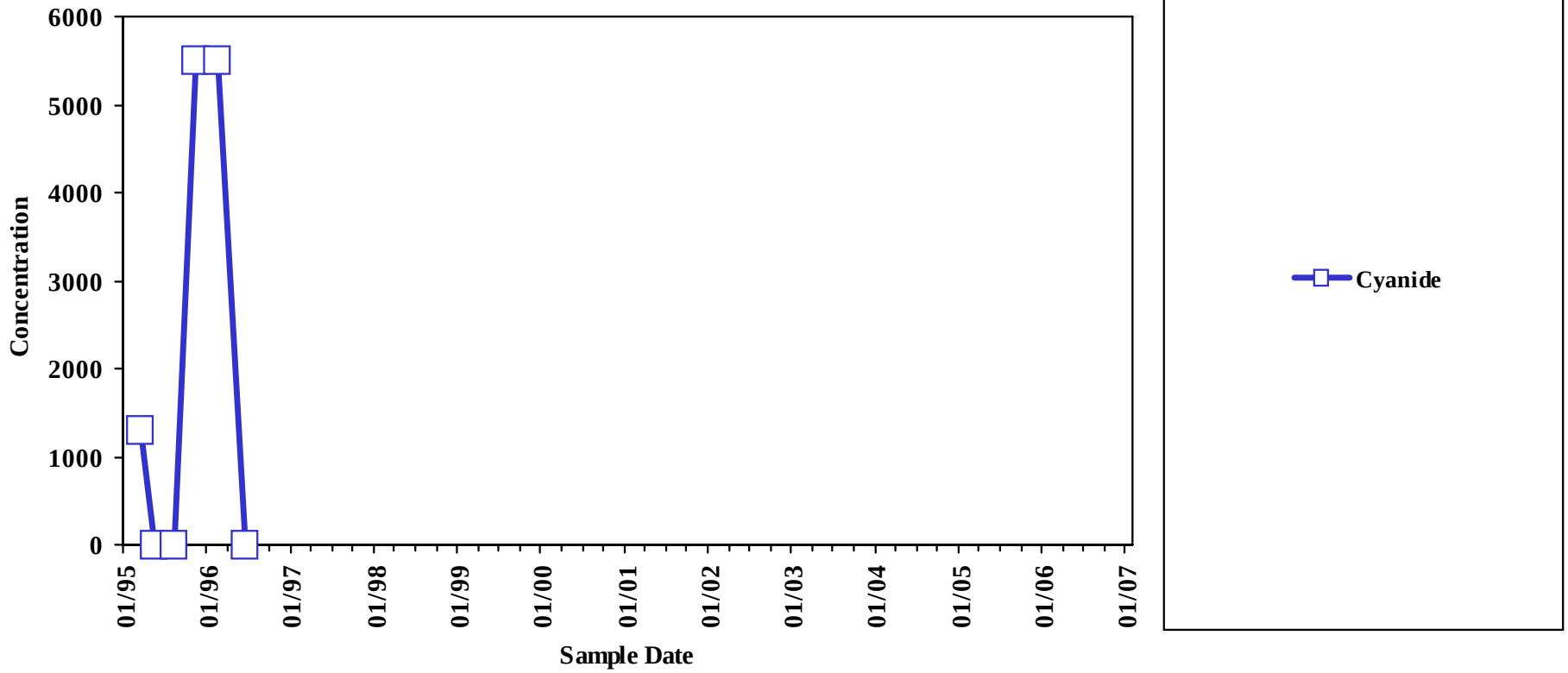
Clean-up Standard	Arsenic	Manganese
	150	120

Sample Location:

SEEP-05

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

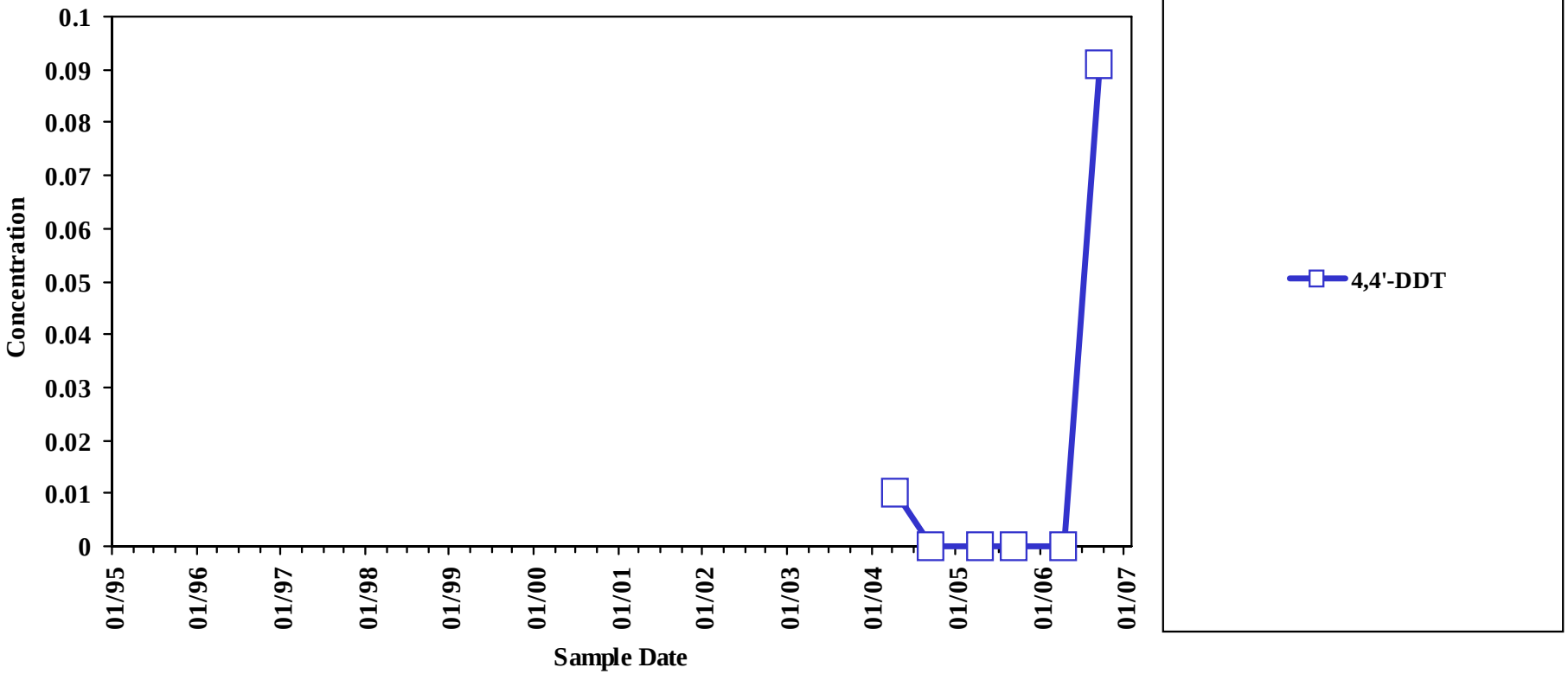
Sample concentration units: µg/L

Sample Location:

SEEP-05

Sites 1 & 3
Leachate

Chemicals of concern: Pesticides



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

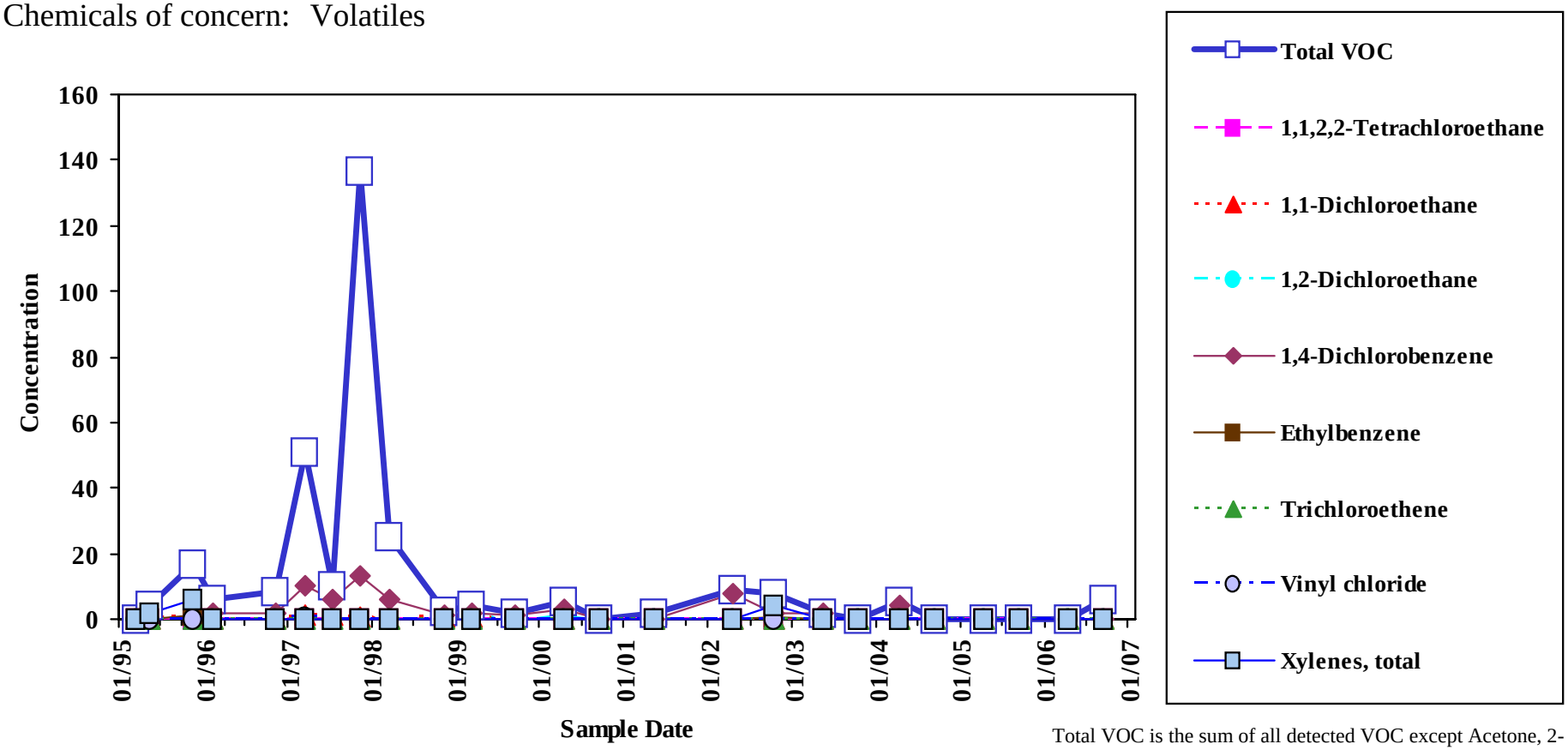
Clean-up Standard	4,4'-DDT
	0.00012

Sample Location:

SEEP-05

Sites 1 & 3
Leachate

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

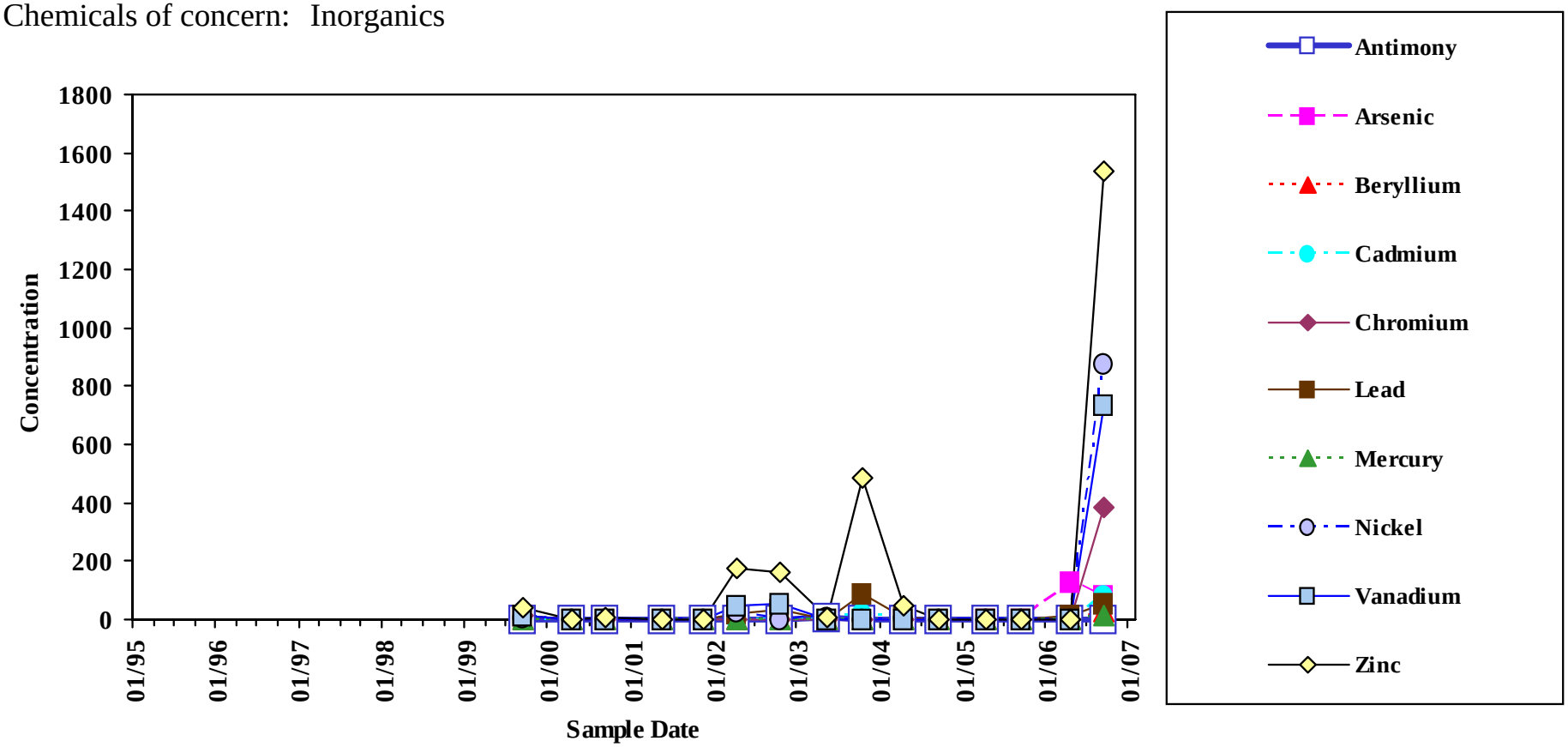
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,1-Dichloroethane	1,2-Dichloroethane	1,4-Dichlorobenzene	Ethylbenzene	Trichloroethene	Vinyl Chloride	Xylenes, Total
	610	47	910	15	7.3	47	0.069	1.8

Sample Location:

SEEP-09

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Antimony	Arsenic	Beryllium	Cadmium	Chromium	Lead	Mercury	Nickel
	30	150	0.66	0.08	11	0.41	0.91	13.4

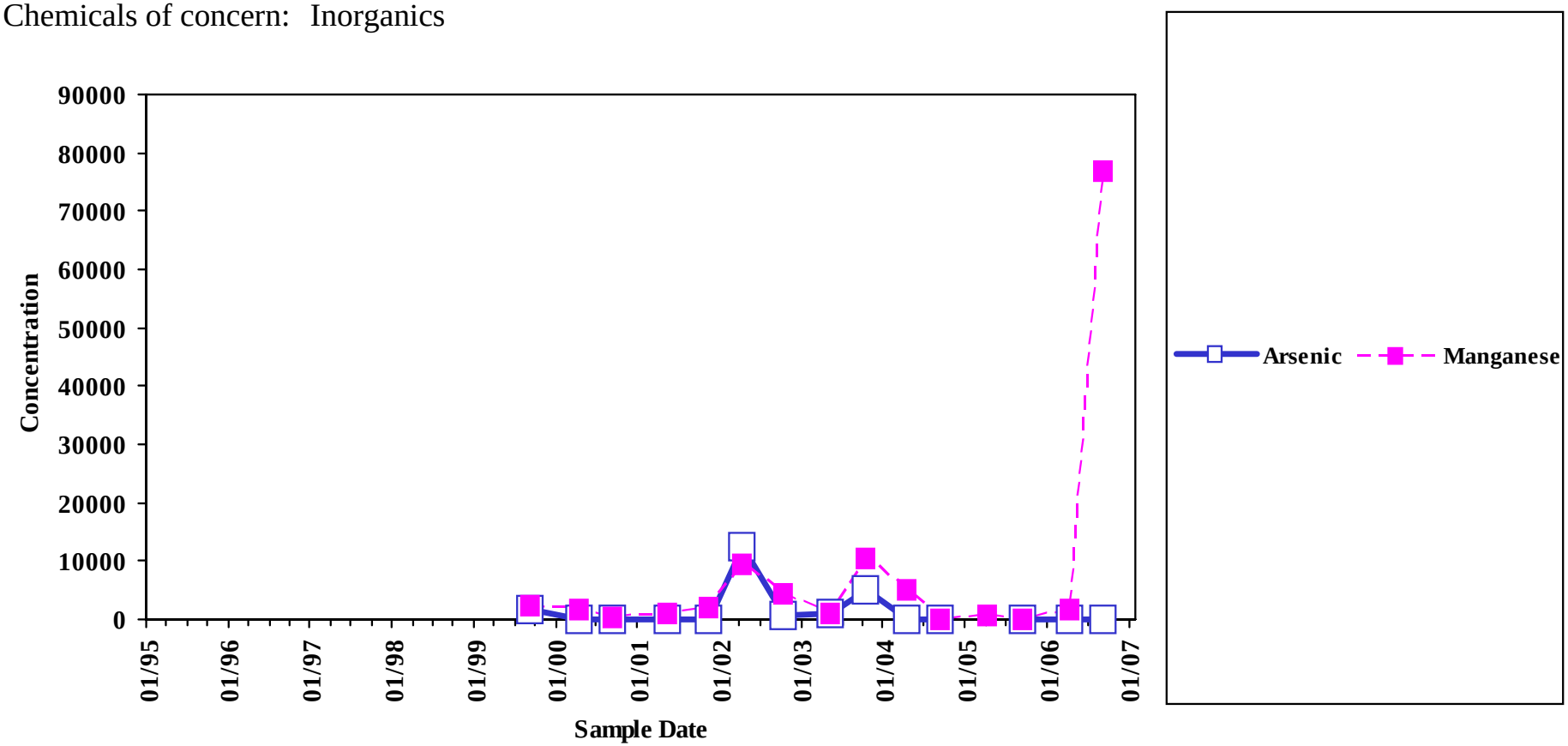
Vanadium	Zinc
20	--

Sample Location:

SEEP-09

Sites 1 & 3
Leachate

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Arsenic	Manganese
	150	120

Sample Location:

SEEP-09

Sites 1 & 3

Leachate

Chemicals of concern: Inorganics

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

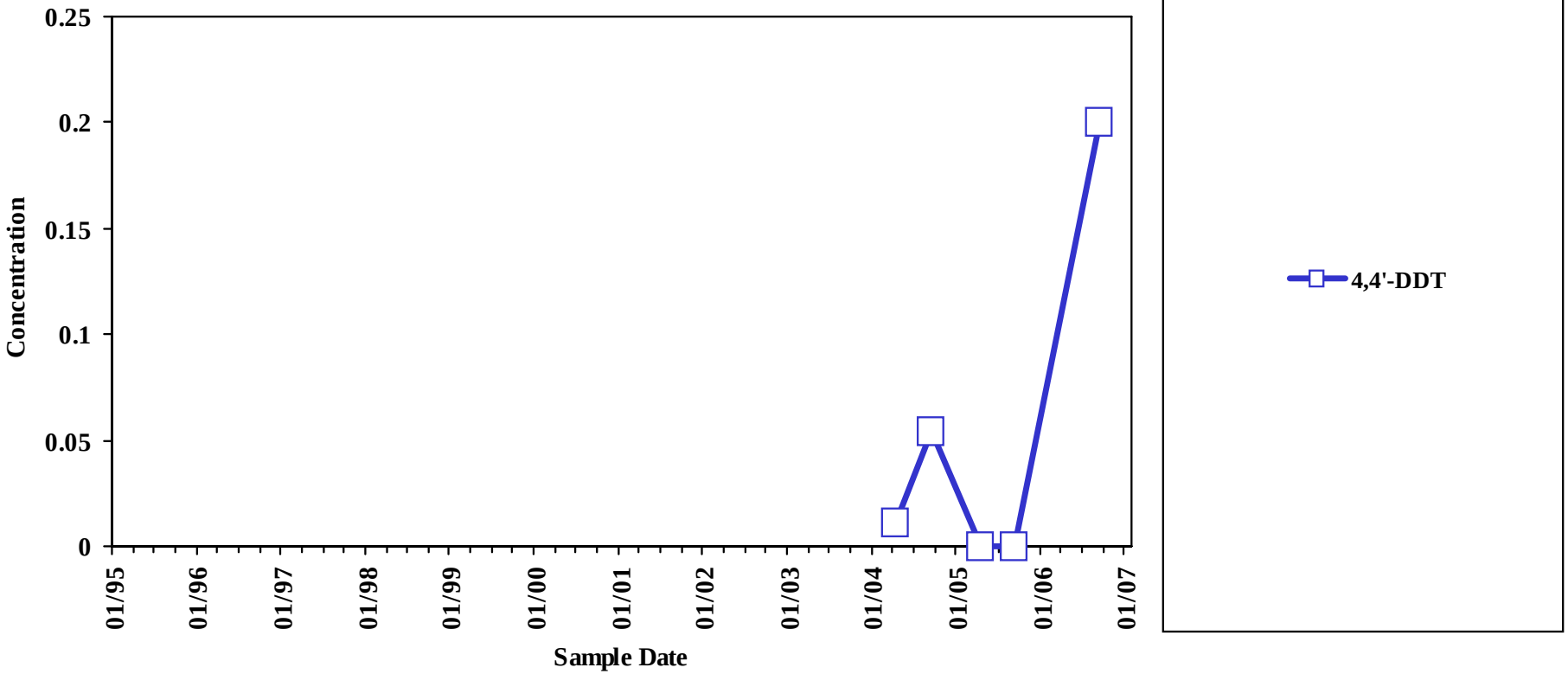
Sample concentration units: µg/L

Sample Location:

SEEP-09

Sites 1 & 3
Leachate

Chemicals of concern: Pesticides



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

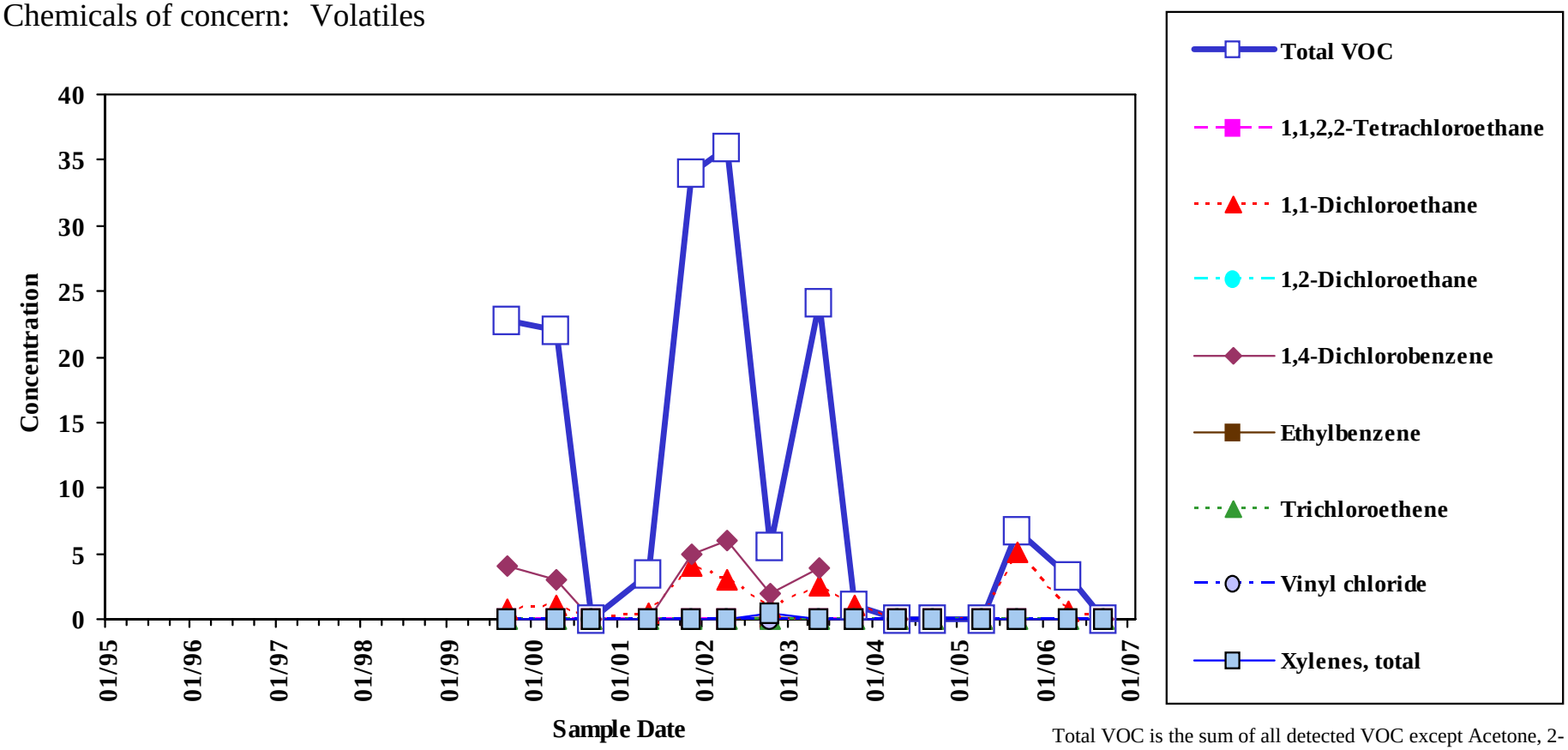
Clean-up Standard	4,4'-DDT
	0.00012

Sample Location:

SEEP-09

Sites 1 & 3
Leachate

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

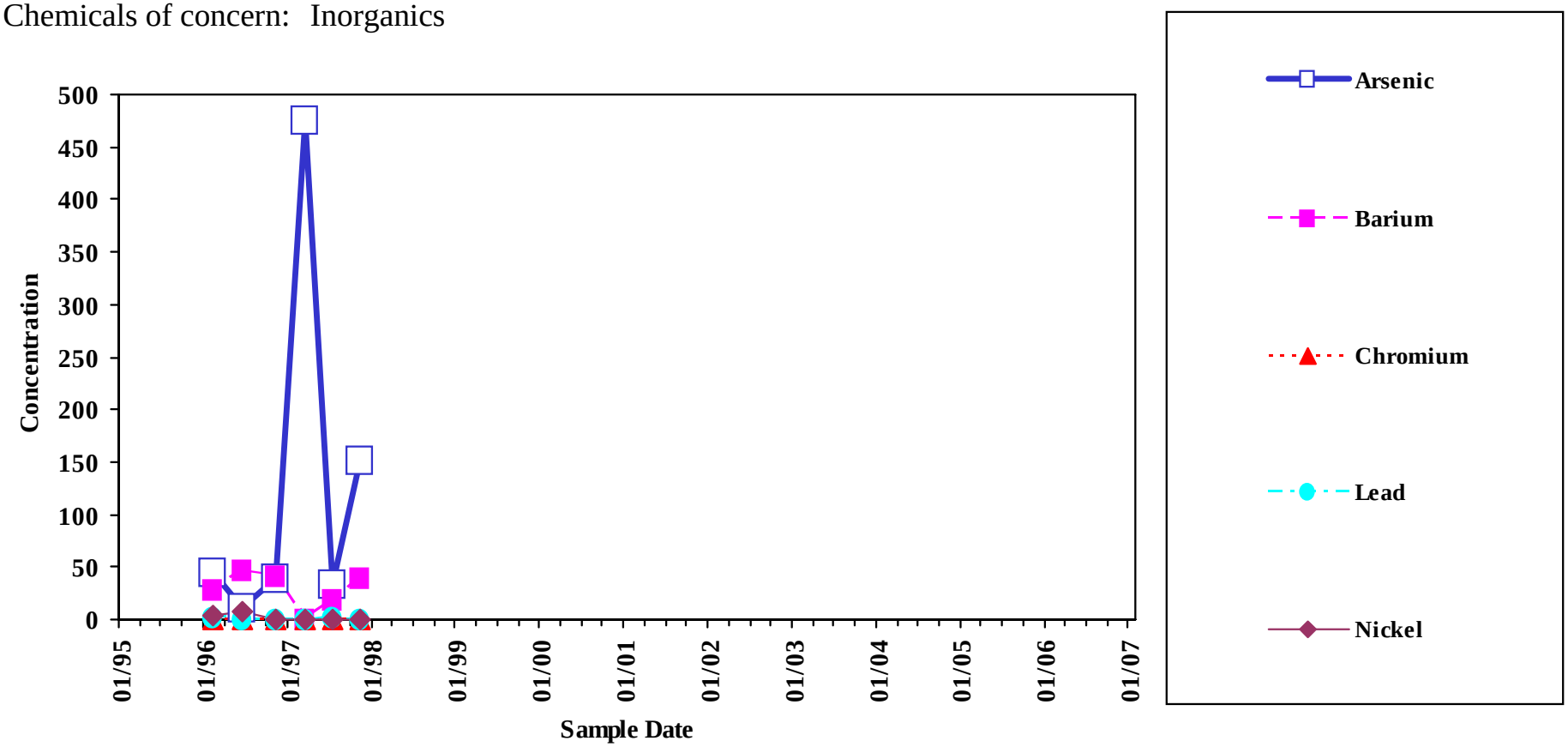
Clean-up Standard	1,1,2,2-Tetrachloroethane	1,1-Dichloroethane	1,2-Dichloroethane	1,4-Dichlorobenzene	Ethylbenzene	Trichloroethene	Vinyl Chloride	Xylenes, Total
	610	47	910	15	7.3	47	0.069	1.8

Sample Location:

Sites 1 & 3 Raw Influent

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

MEG	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	40	10	140

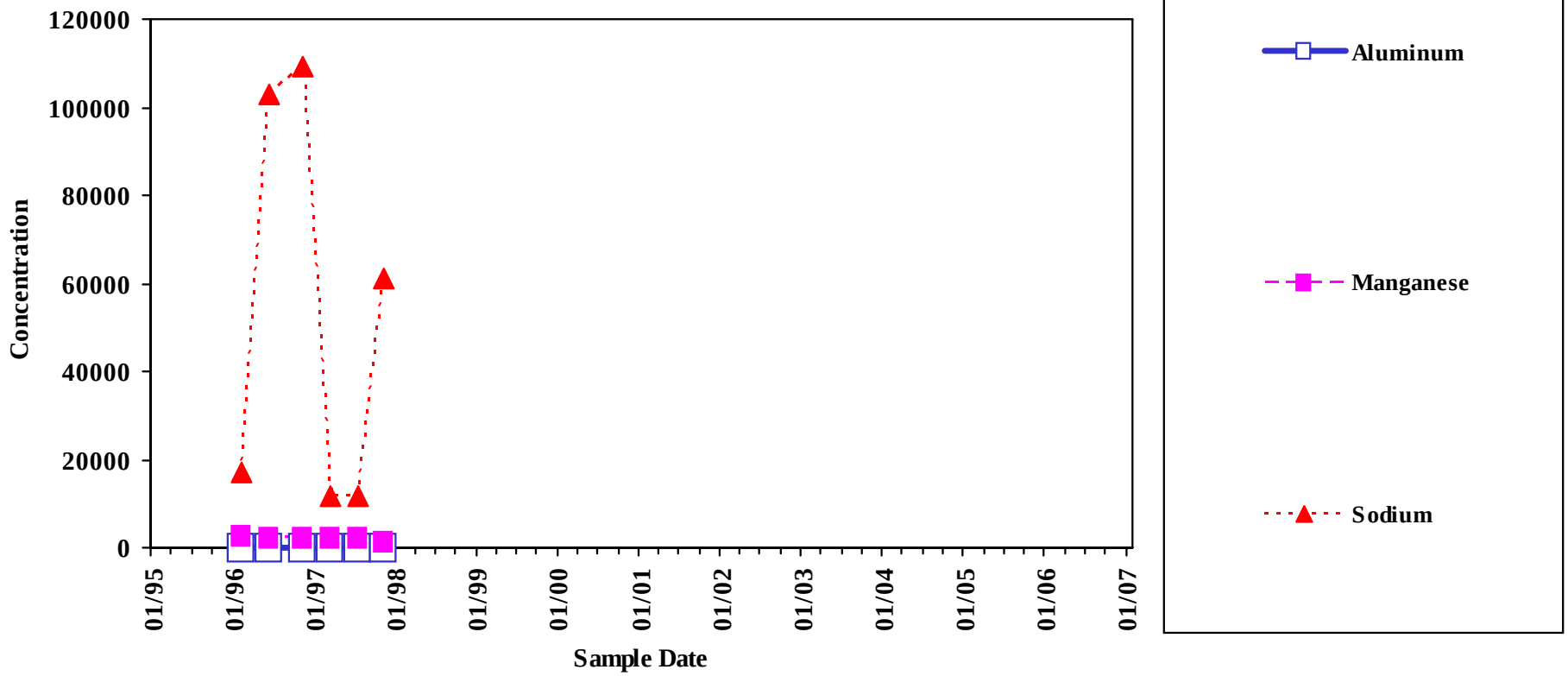
MCL	Arsenic	Barium	Chromium	Lead	Nickel
	10	2000	100	15	--

Sample Location:

Sites 1 & 3 Raw Influent

Sites 1 & 3
Groundwater

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

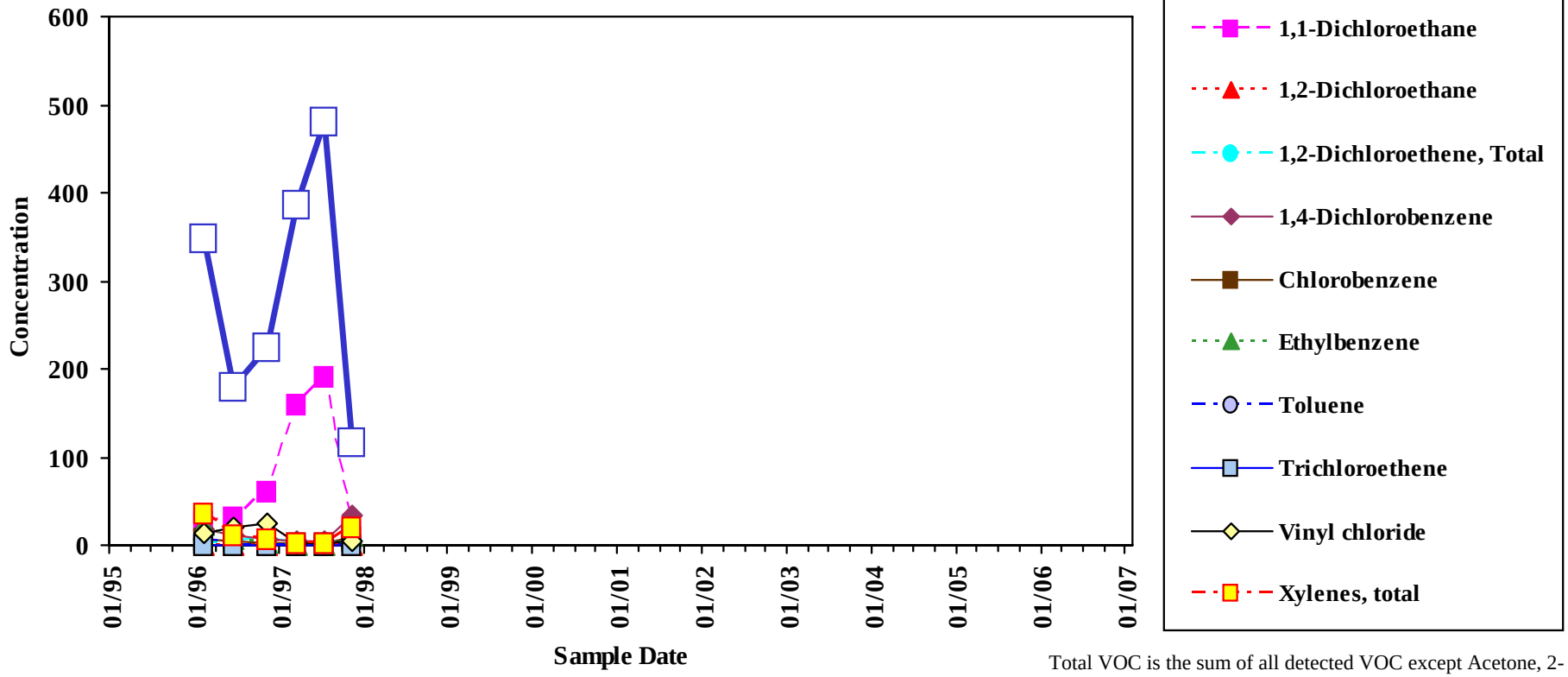
MEG	Aluminum	Manganese	Sodium	MCL	Aluminum	Manganese	Sodium
	1430	500	20000		--	--	--

Sample Location:

Sites 1 & 3 Raw Influent

Sites 1 & 3
Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

MEG	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene	Toluene	Trichloroethene
	70	4	70	--	140	70	1400	32
Vinyl Chloride	Xylenes, Total	**MCL**	1,1-Dichloroethane	1,2-Dichloroethane	1,2-Dichloroethene, Total	1,4-Dichlorobenzene	Chlorobenzene	Ethylbenzene
0.2	1400		--	5	70	--	100	700
Toluene	Trichloroethene	Vinyl Chloride	Xylenes, Total					
1000	5	2	10000					

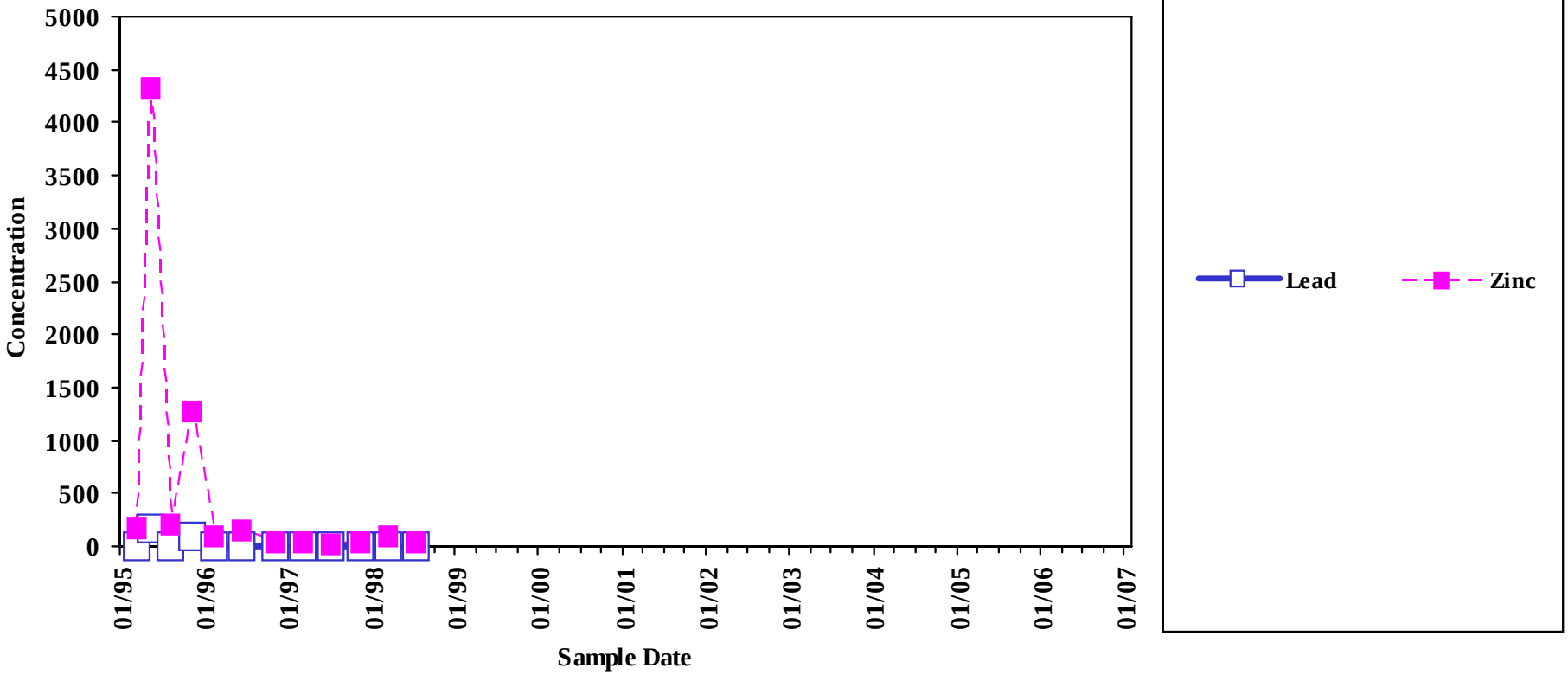
Sample Location:

SW-01

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Lead	Zinc
	0.41	--

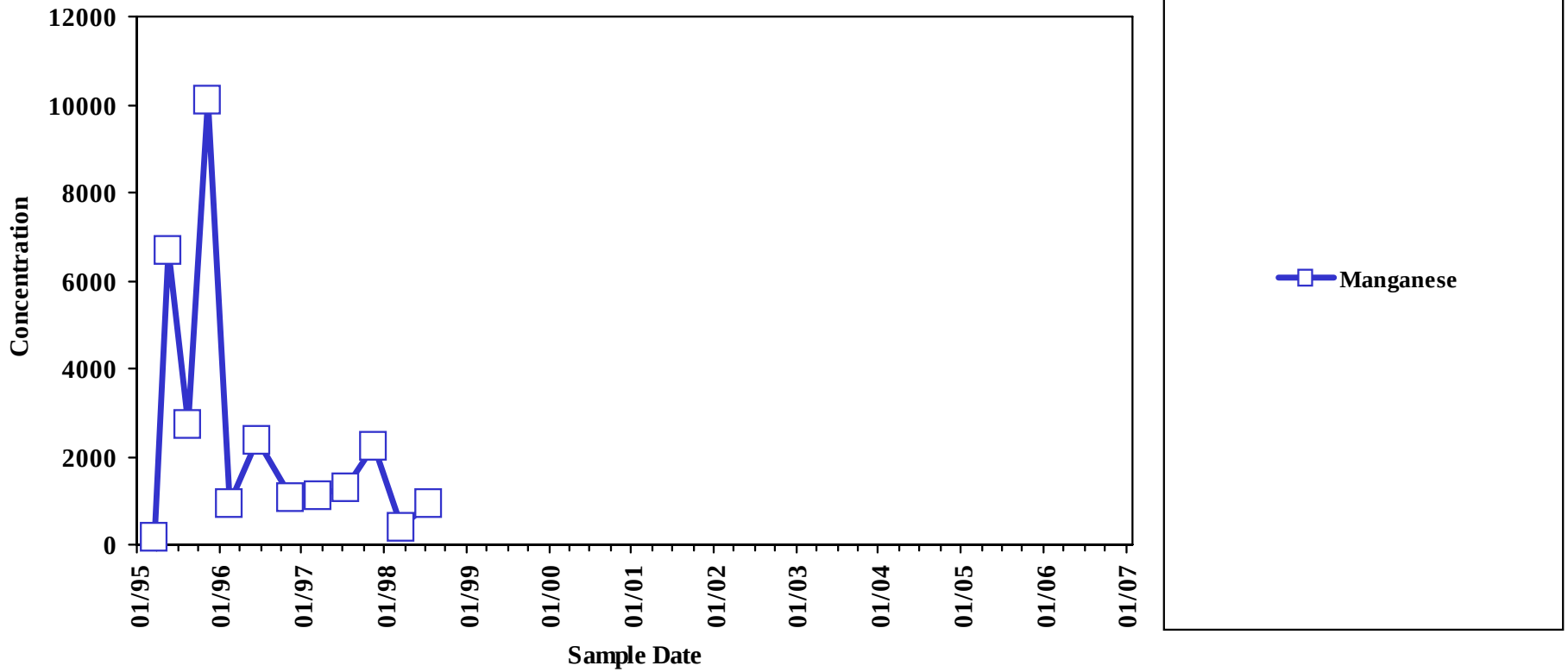
Sample Location:

SW-01

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Manganese
	120

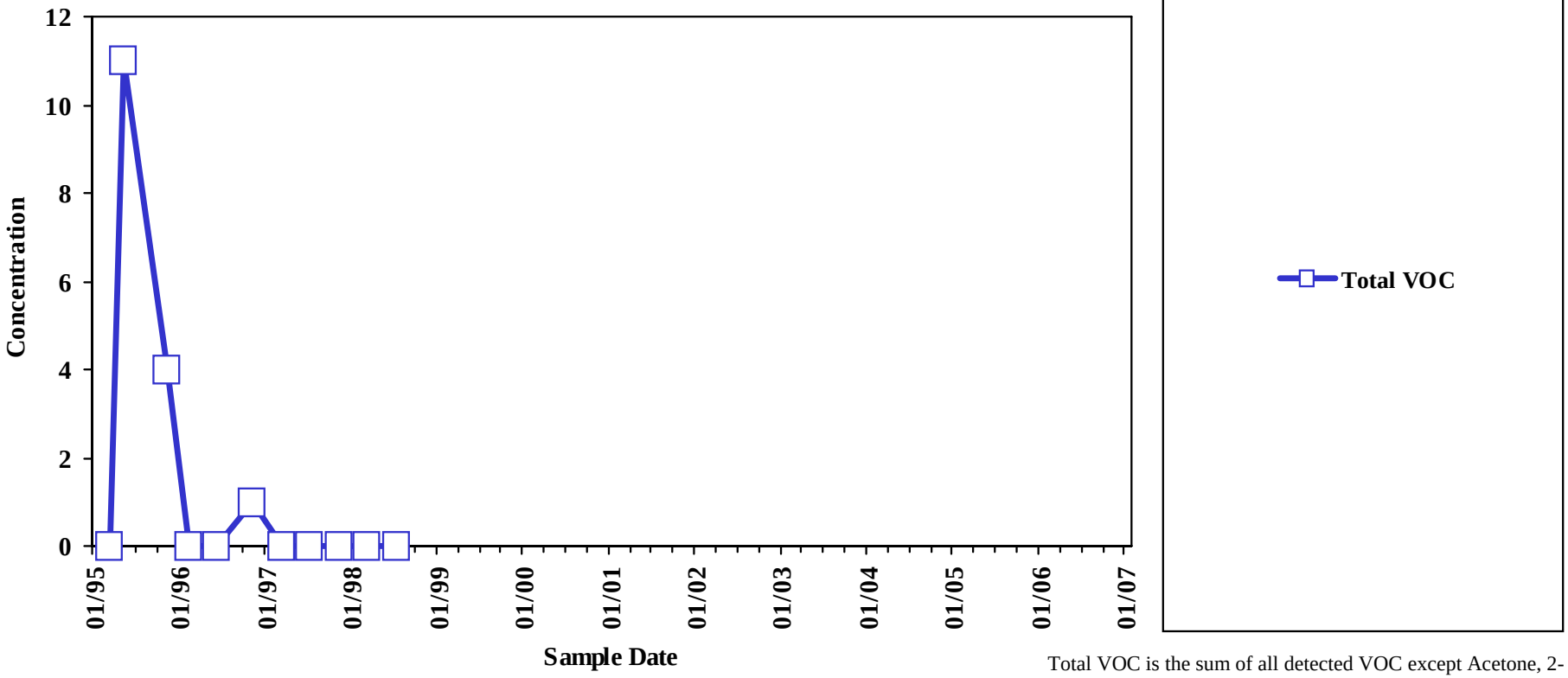
Sample Location:

SW-01

Sites 1 & 3

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

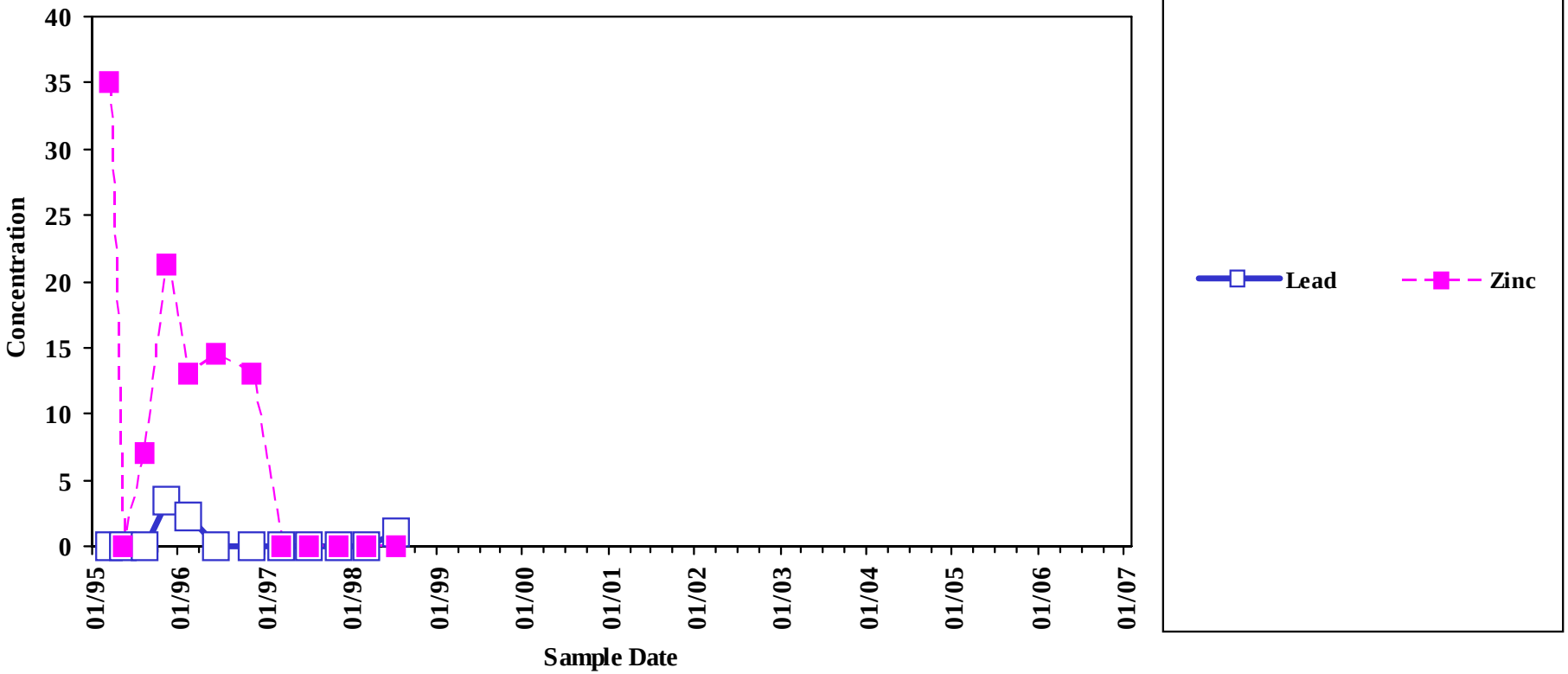
Sample Location:

SW-02

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Lead	Zinc
	0.41	--

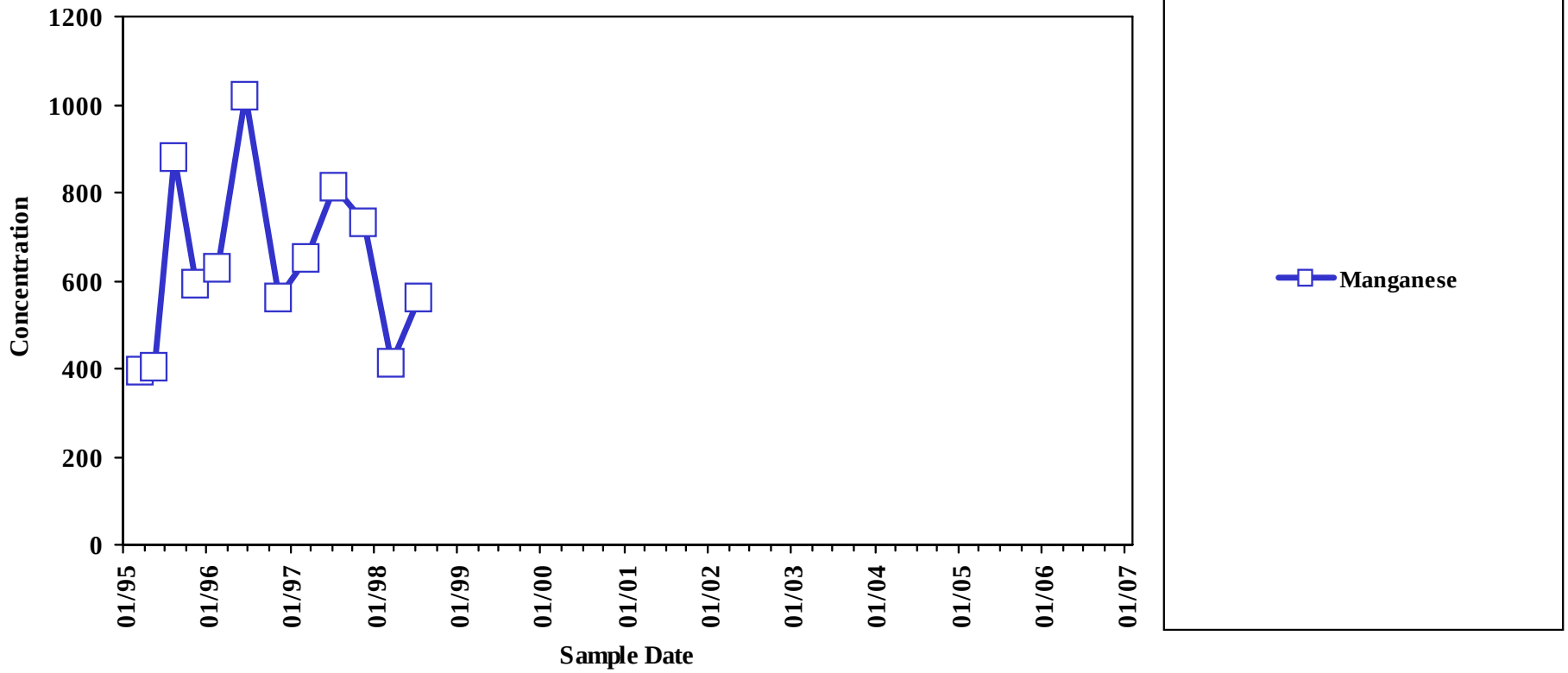
Sample Location:

SW-02

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Manganese
	120

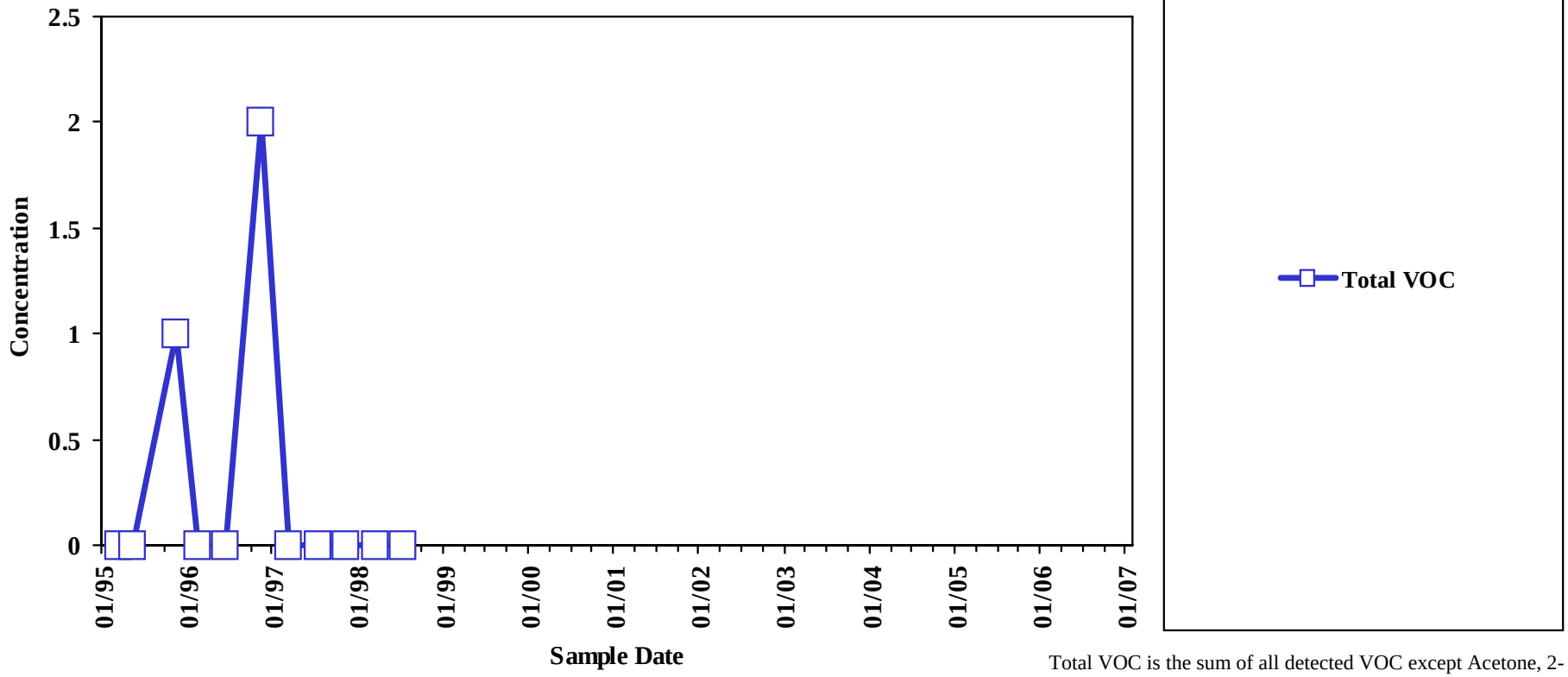
Sample Location:

SW-02

Sites 1 & 3

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

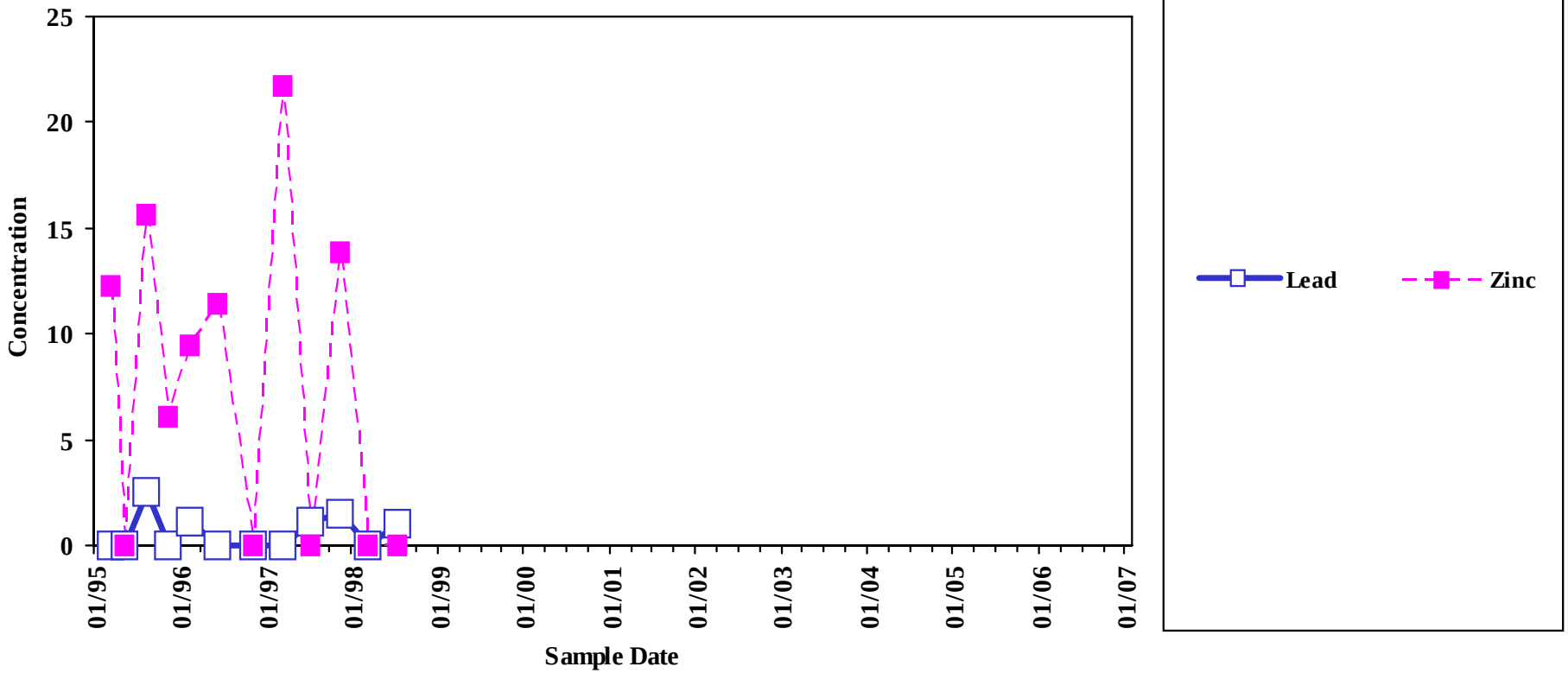
Sample Location:

SW-03

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Lead	Zinc
	0.41	--

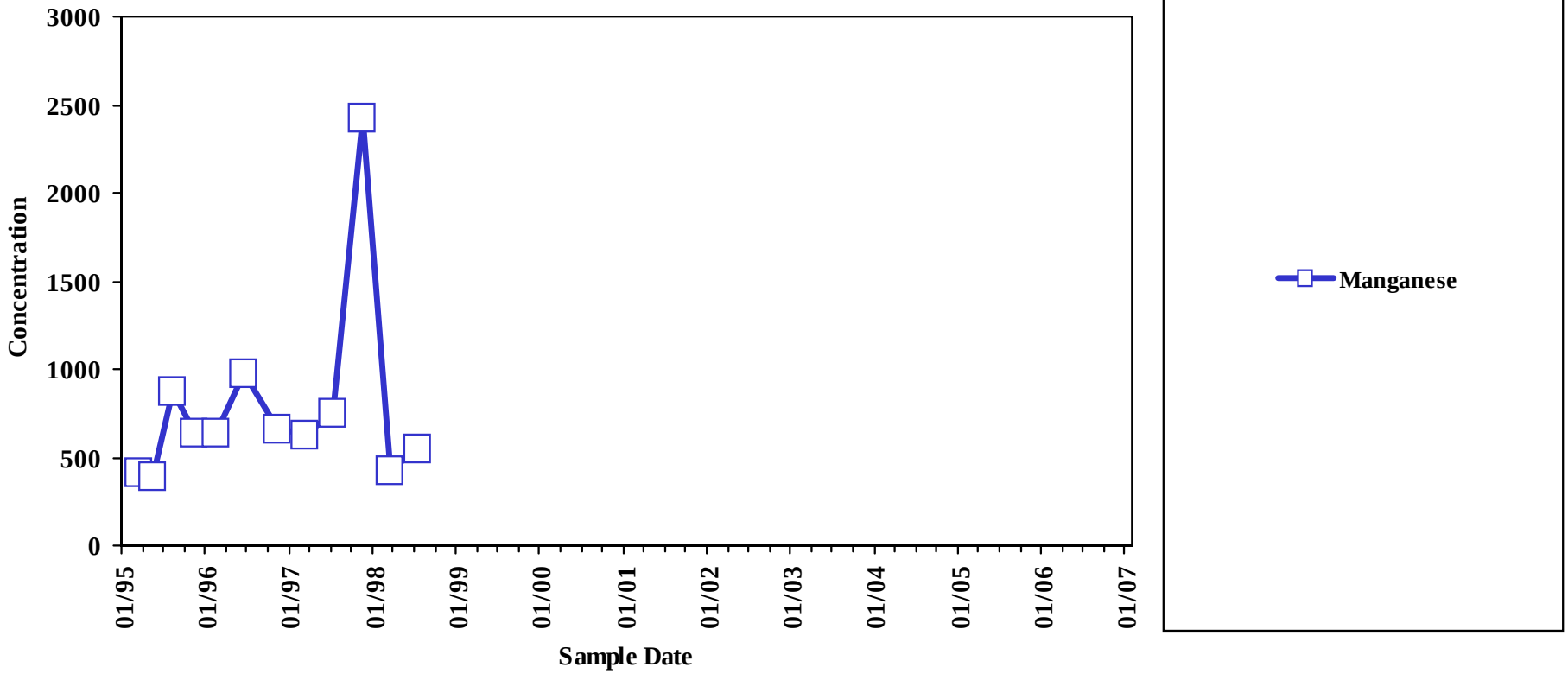
Sample Location:

SW-03

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Manganese
	120

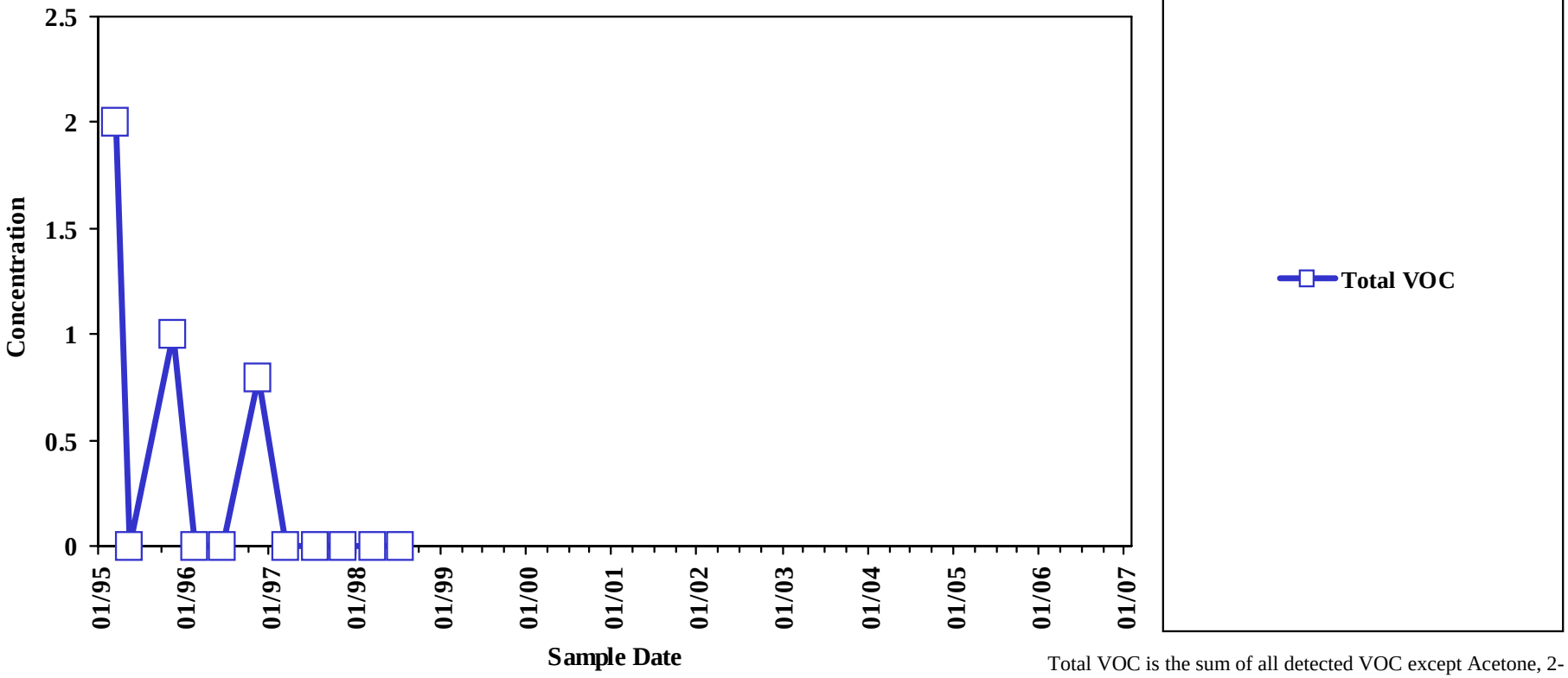
Sample Location:

SW-03

Sites 1 & 3

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

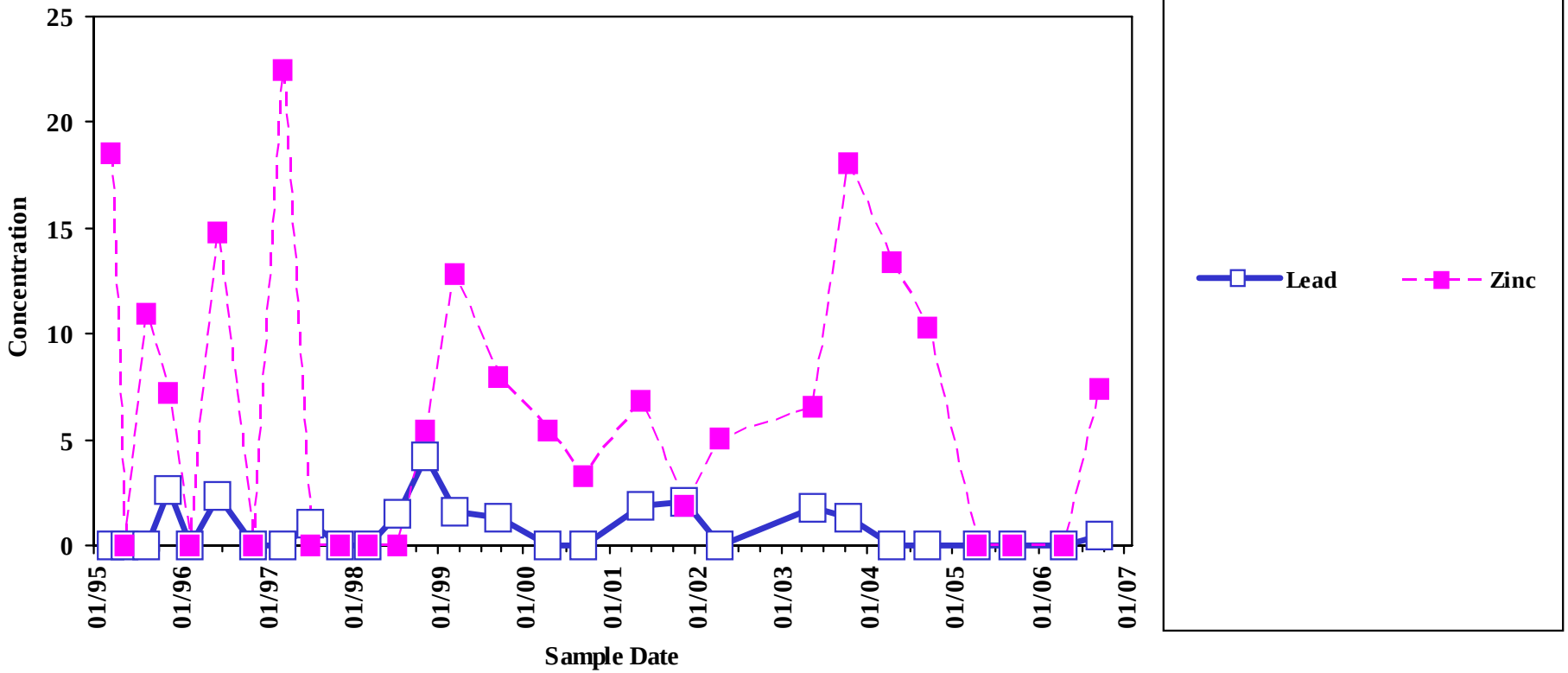
Sample Location:

SW-04

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Lead	Zinc
	0.41	--

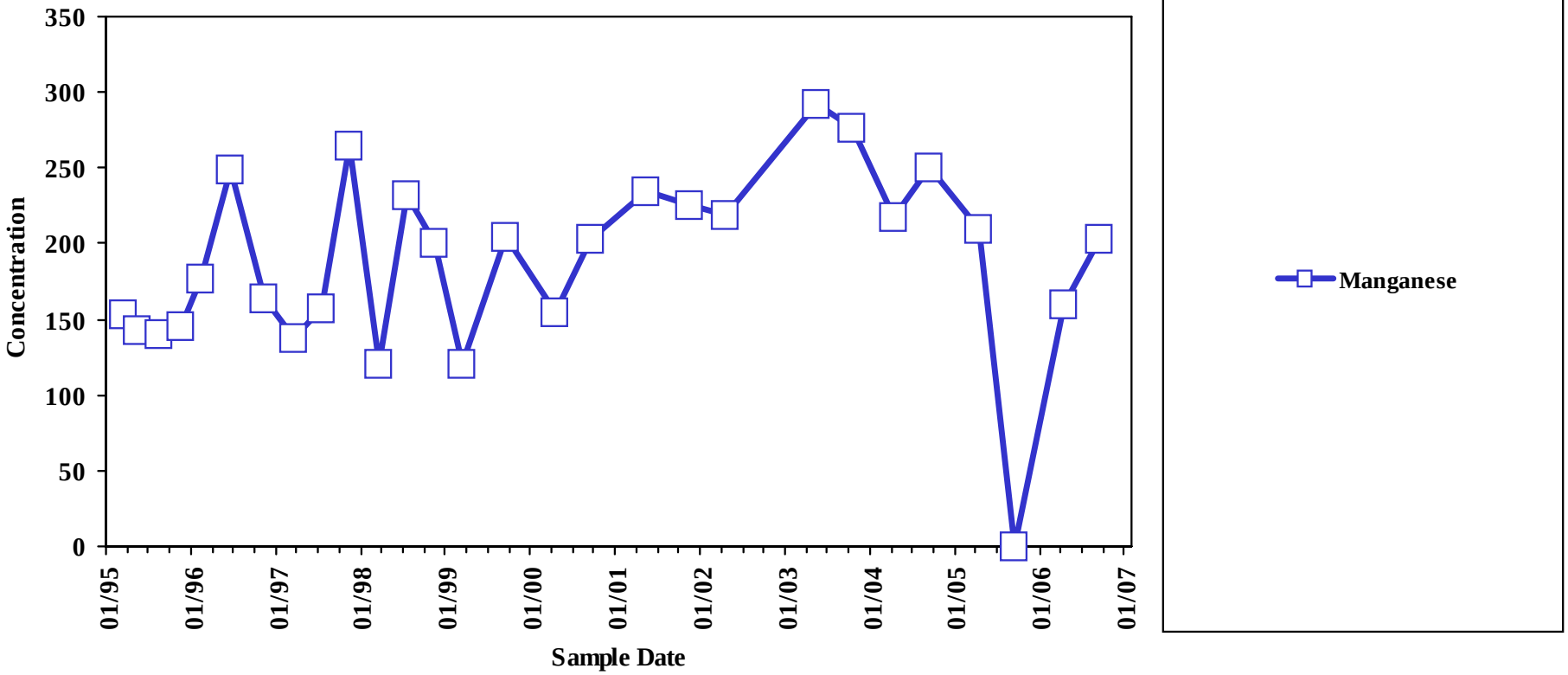
Sample Location:

SW-04

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Manganese
	120

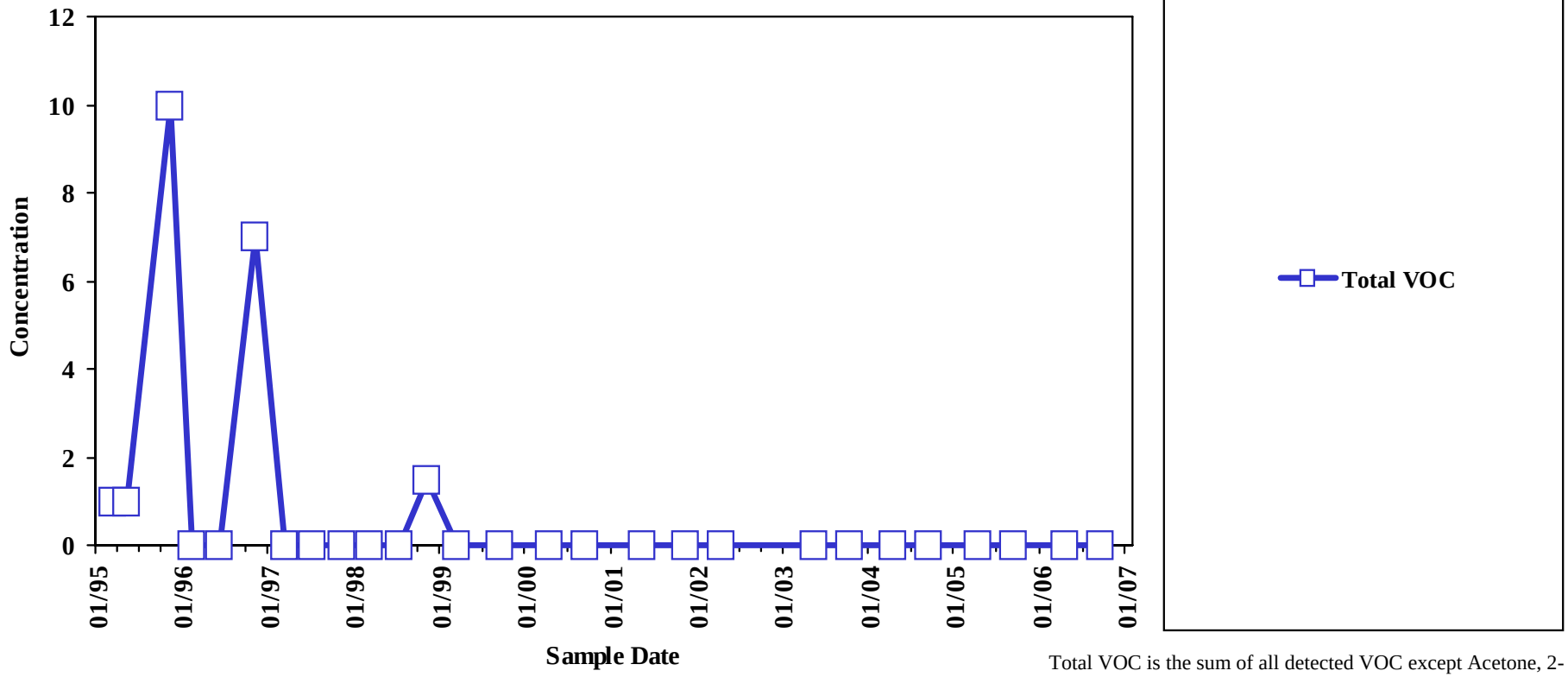
Sample Location:

SW-04

Sites 1 & 3

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

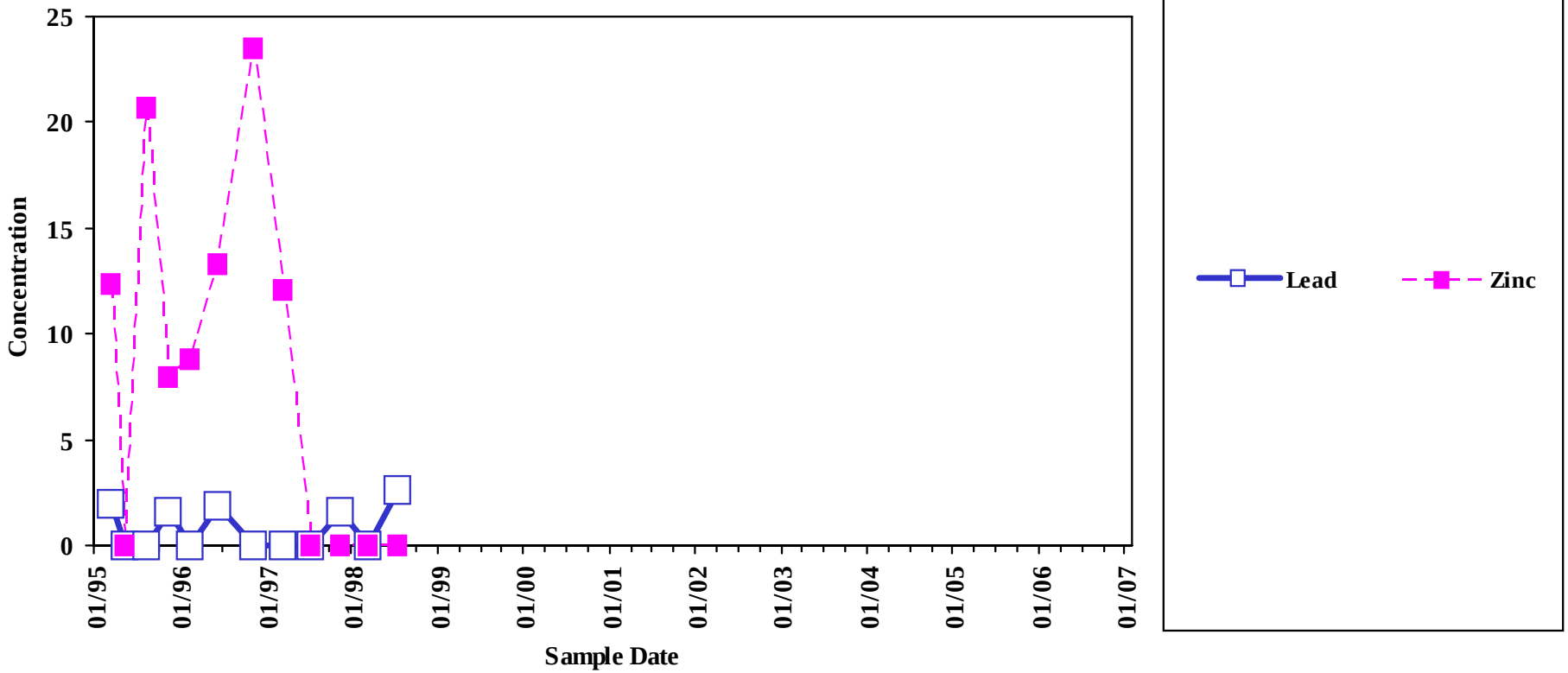
Sample Location:

SW-05

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Lead	Zinc
	0.41	--

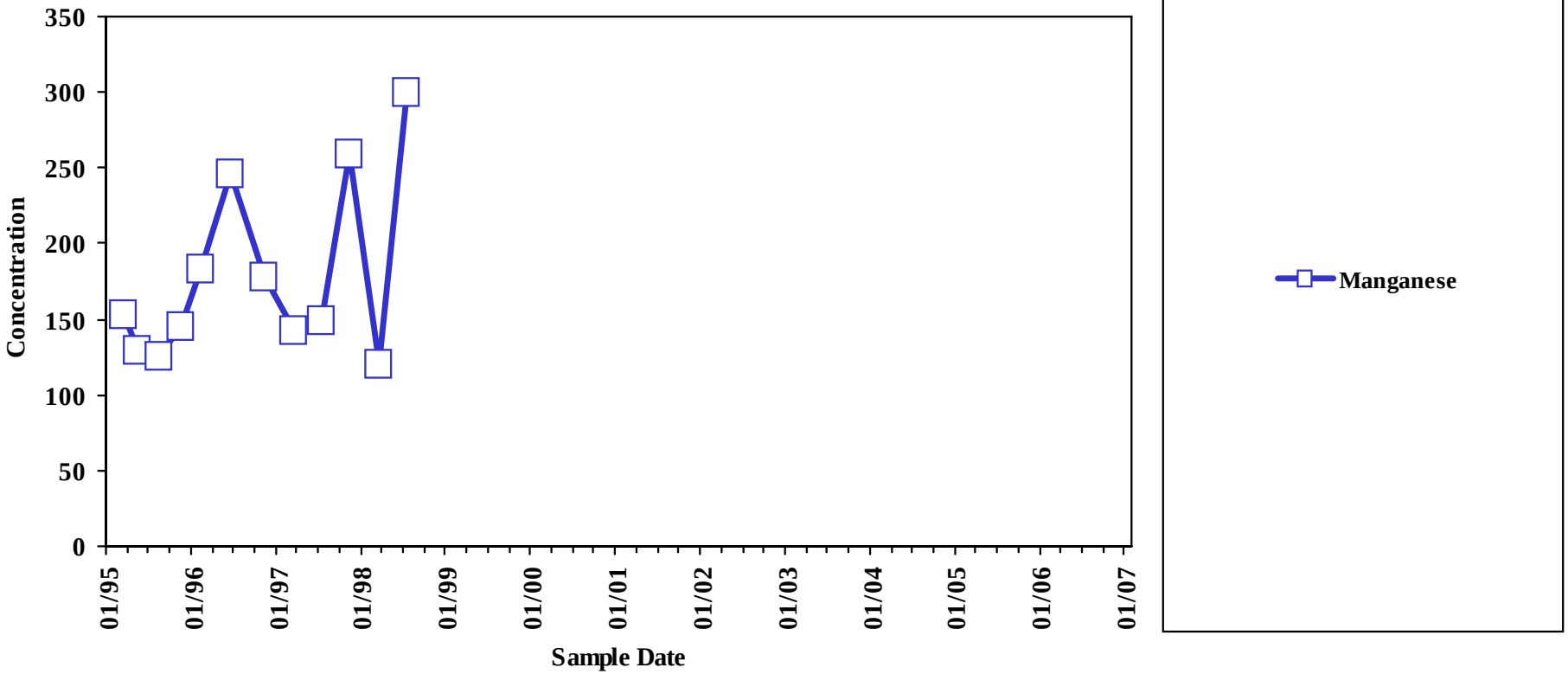
Sample Location:

SW-05

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Manganese
	120

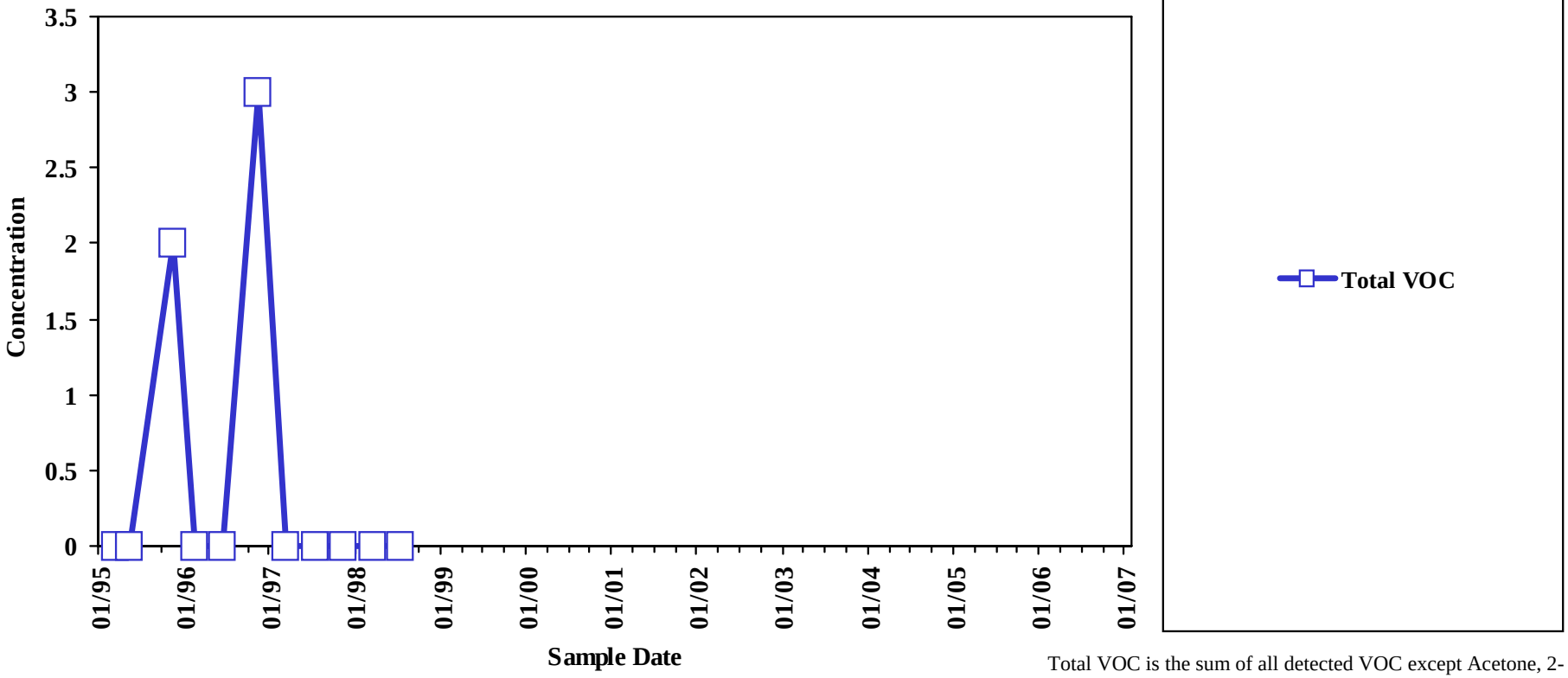
Sample Location:

SW-05

Sites 1 & 3

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

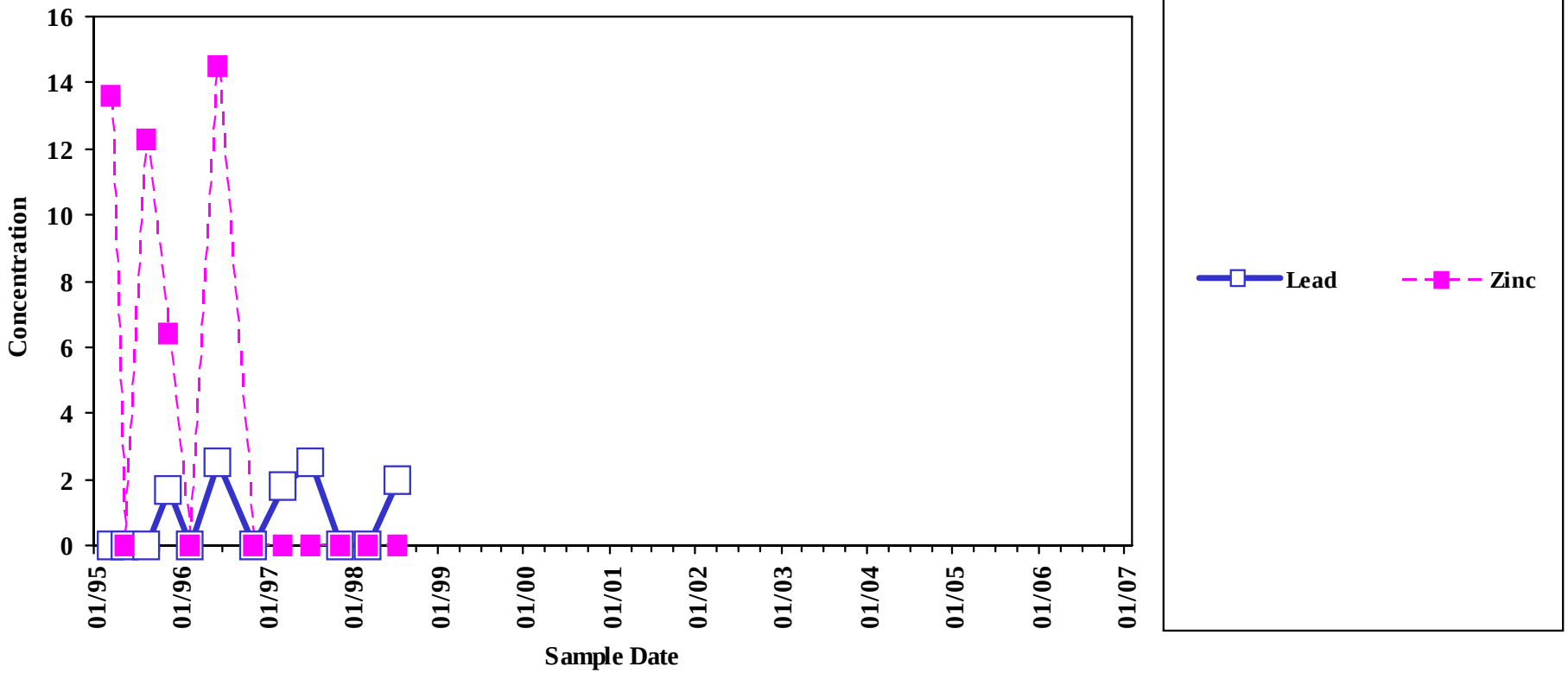
Sample Location:

SW-06

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Lead	Zinc
	0.41	--

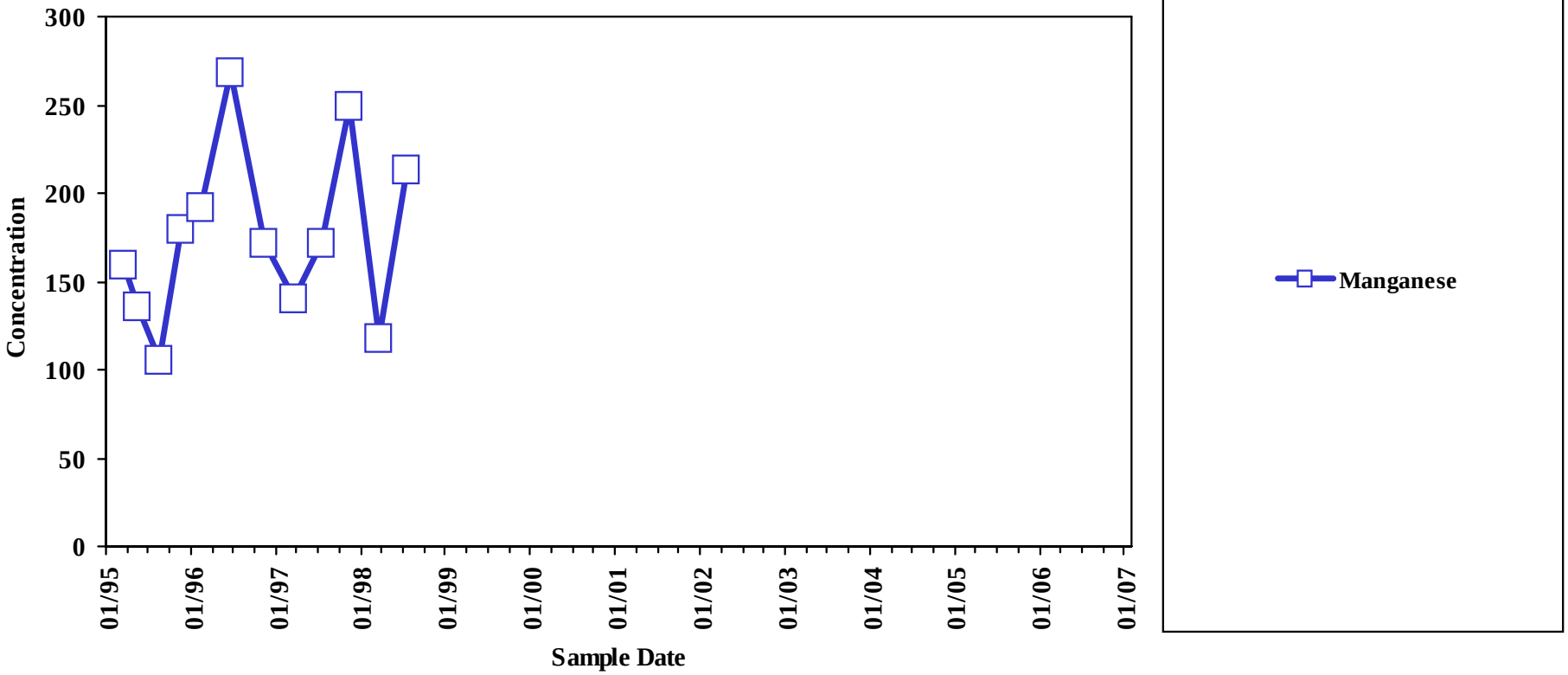
Sample Location:

SW-06

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Manganese
	120

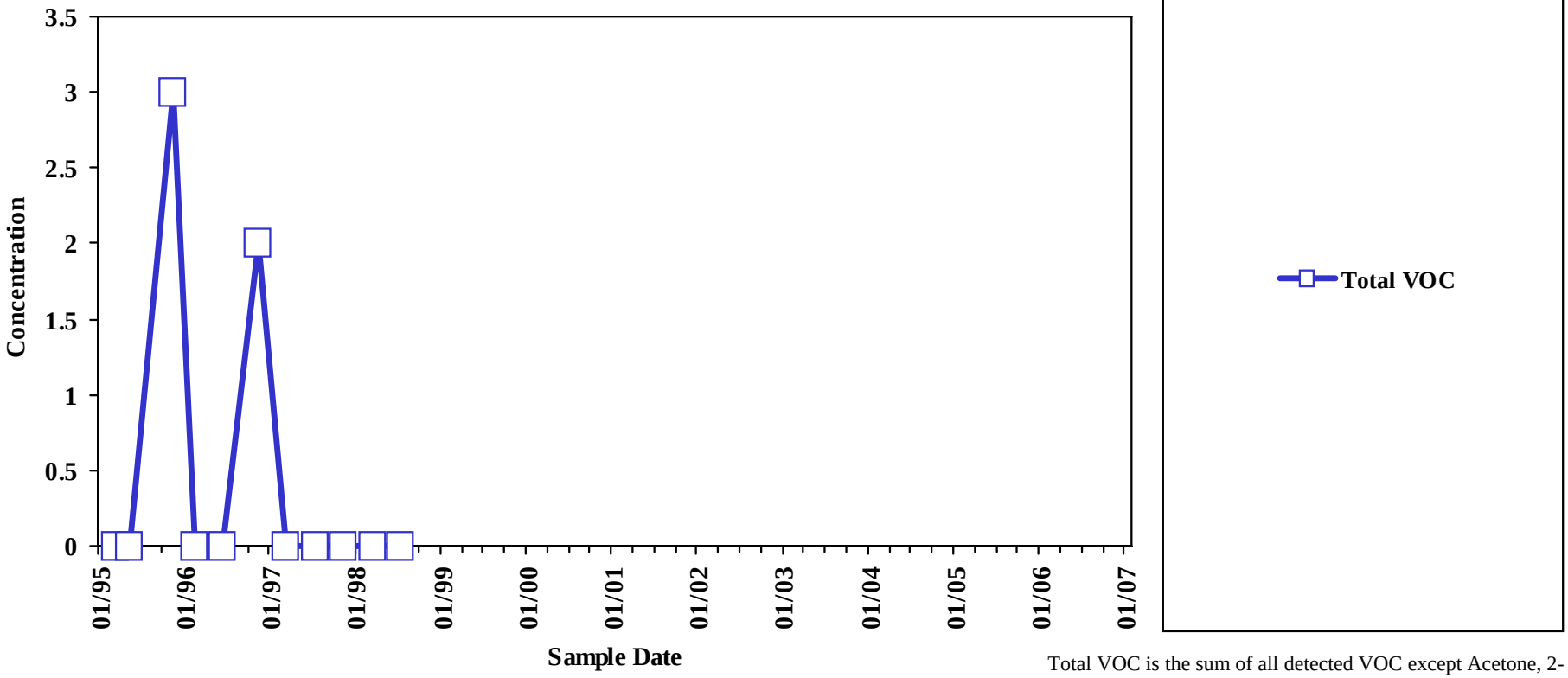
Sample Location:

SW-06

Sites 1 & 3

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

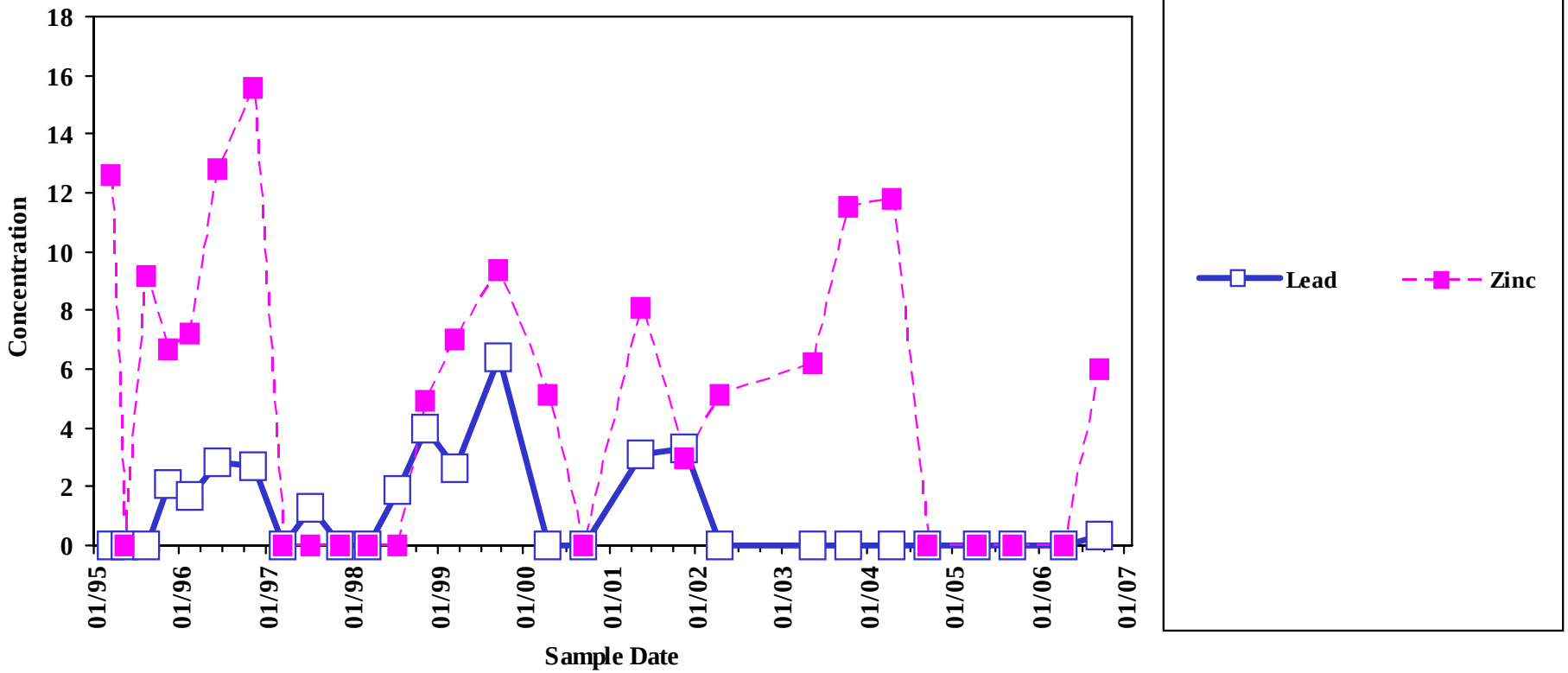
Sample Location:

SW-07

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Lead	Zinc
	0.41	--

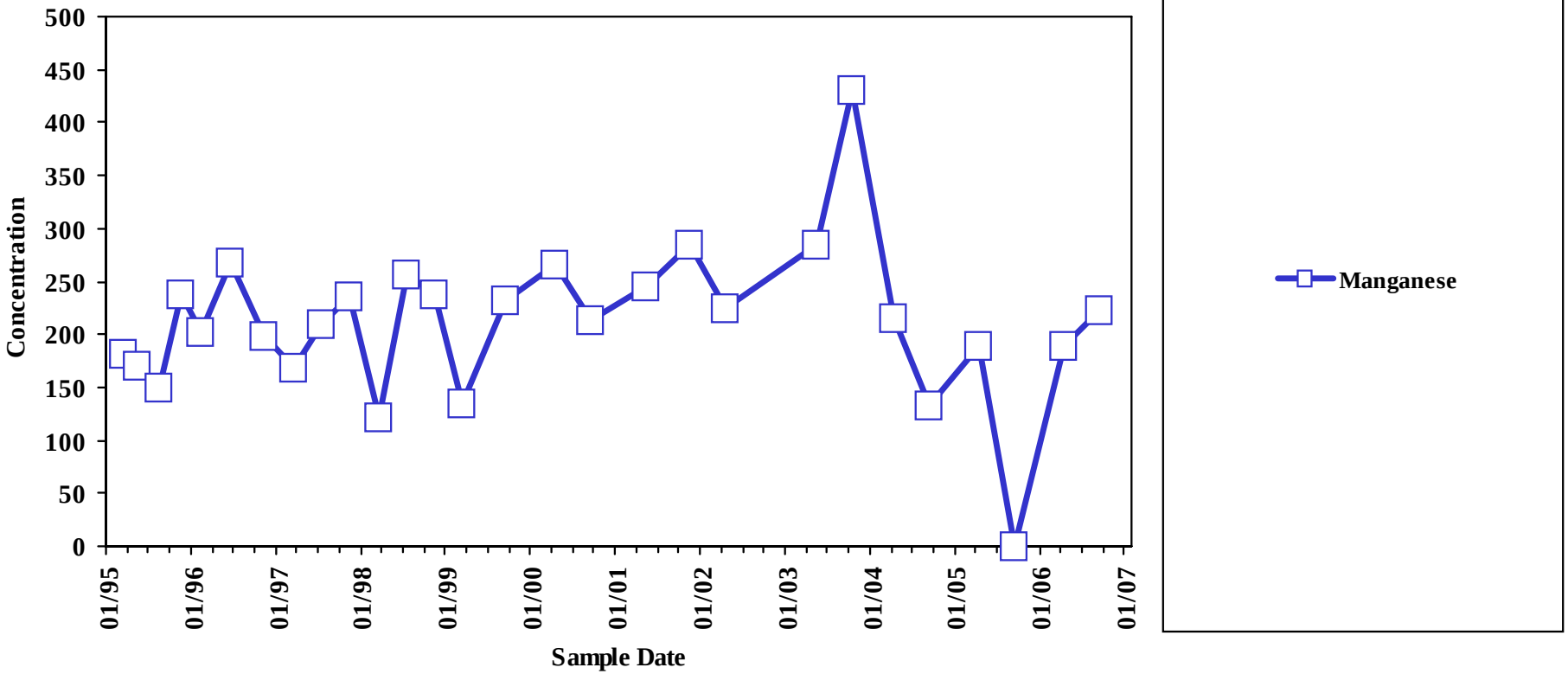
Sample Location:

SW-07

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Manganese
	120

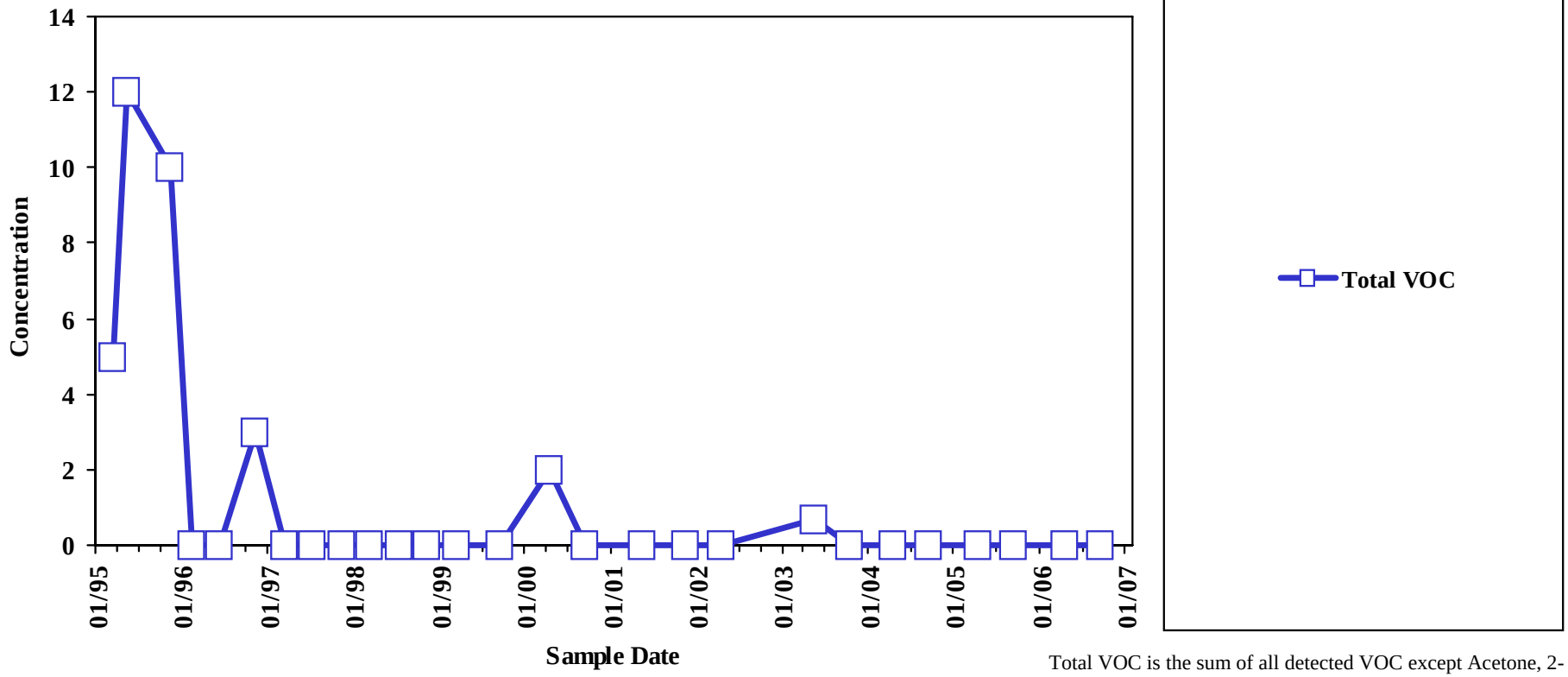
Sample Location:

SW-07

Sites 1 & 3

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

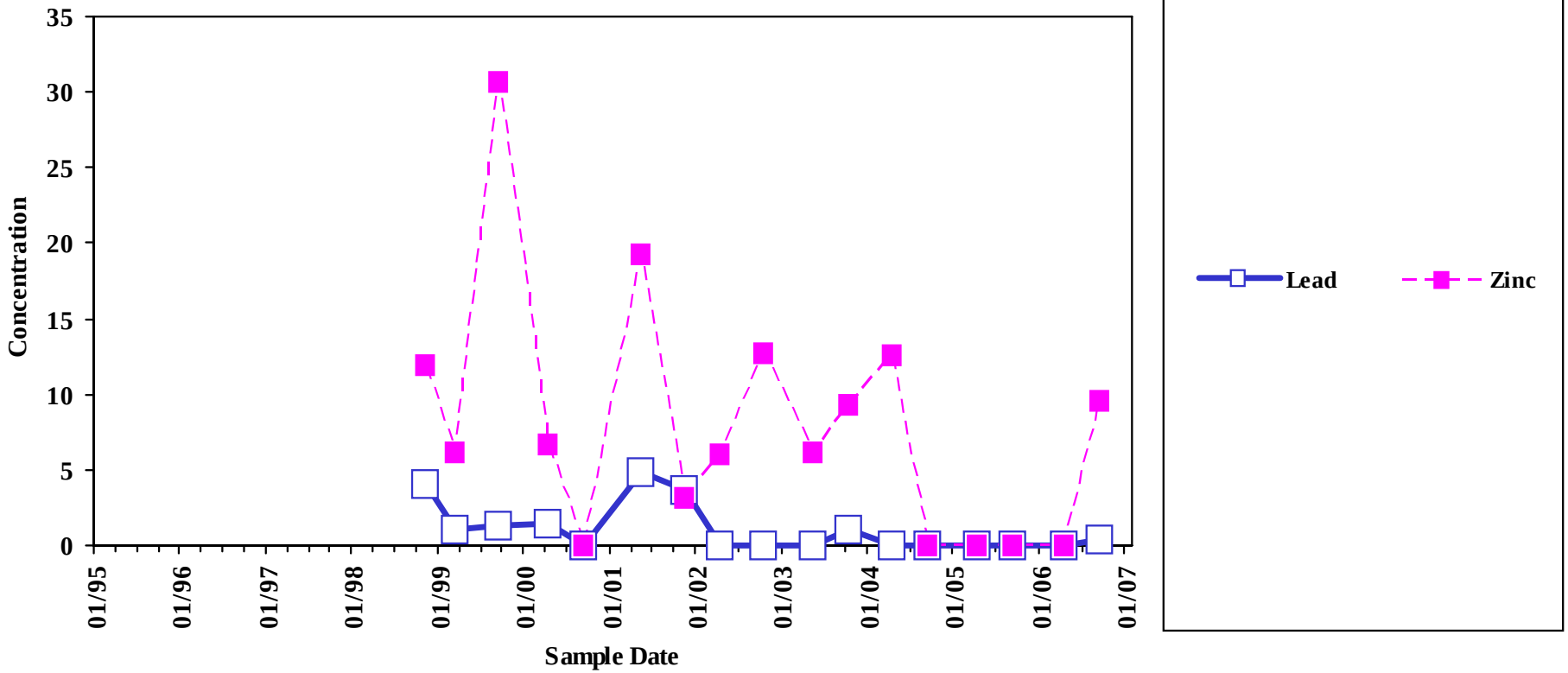
Sample Location:

SW-08

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Lead	Zinc
	0.41	--

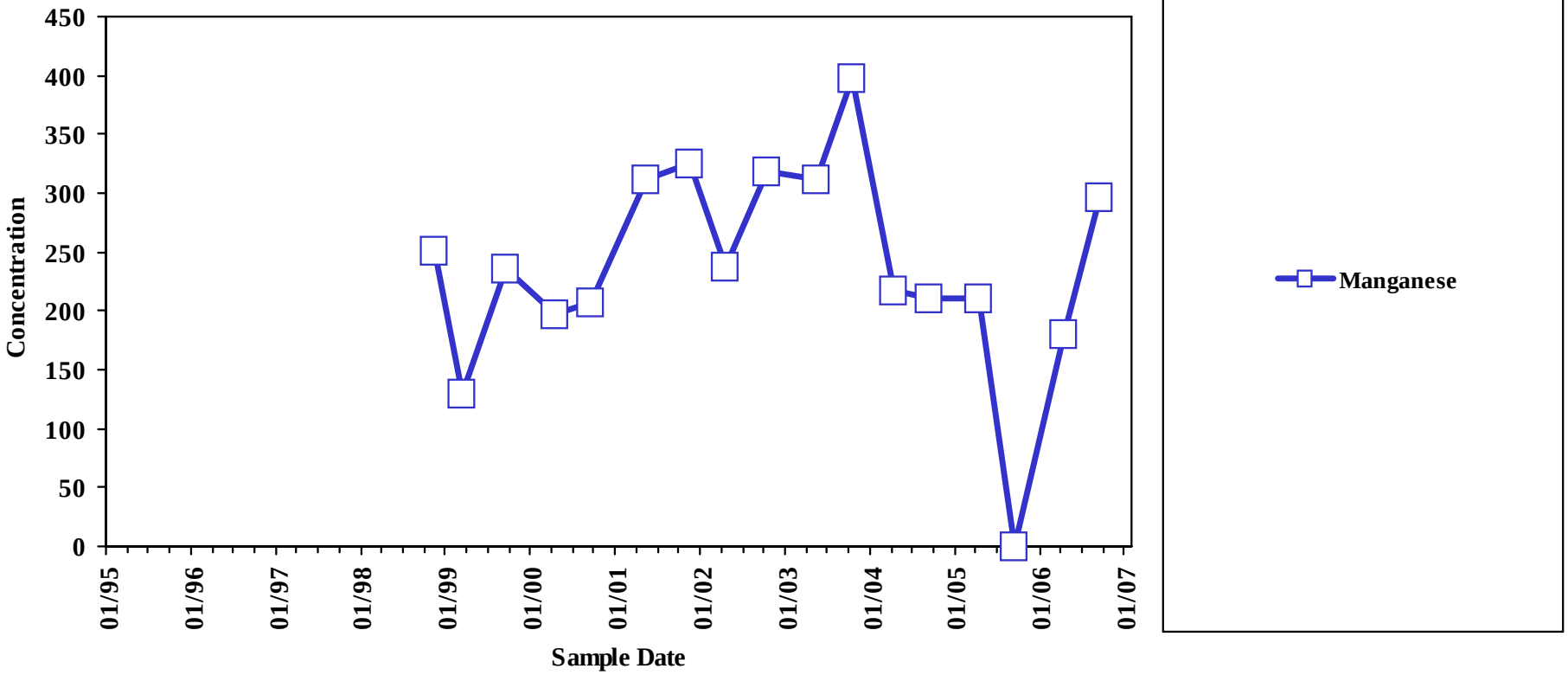
Sample Location:

SW-08

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Manganese
	120

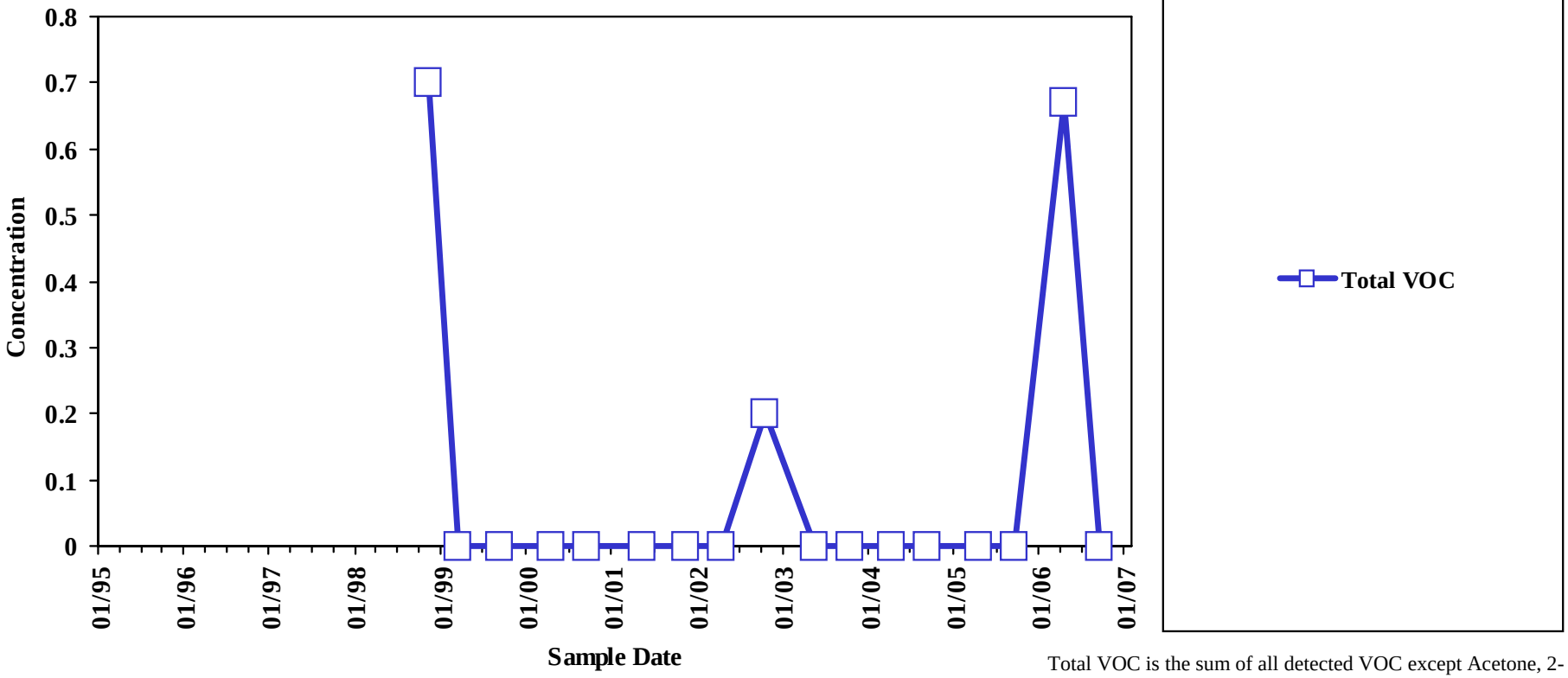
Sample Location:

SW-08

Sites 1 & 3

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

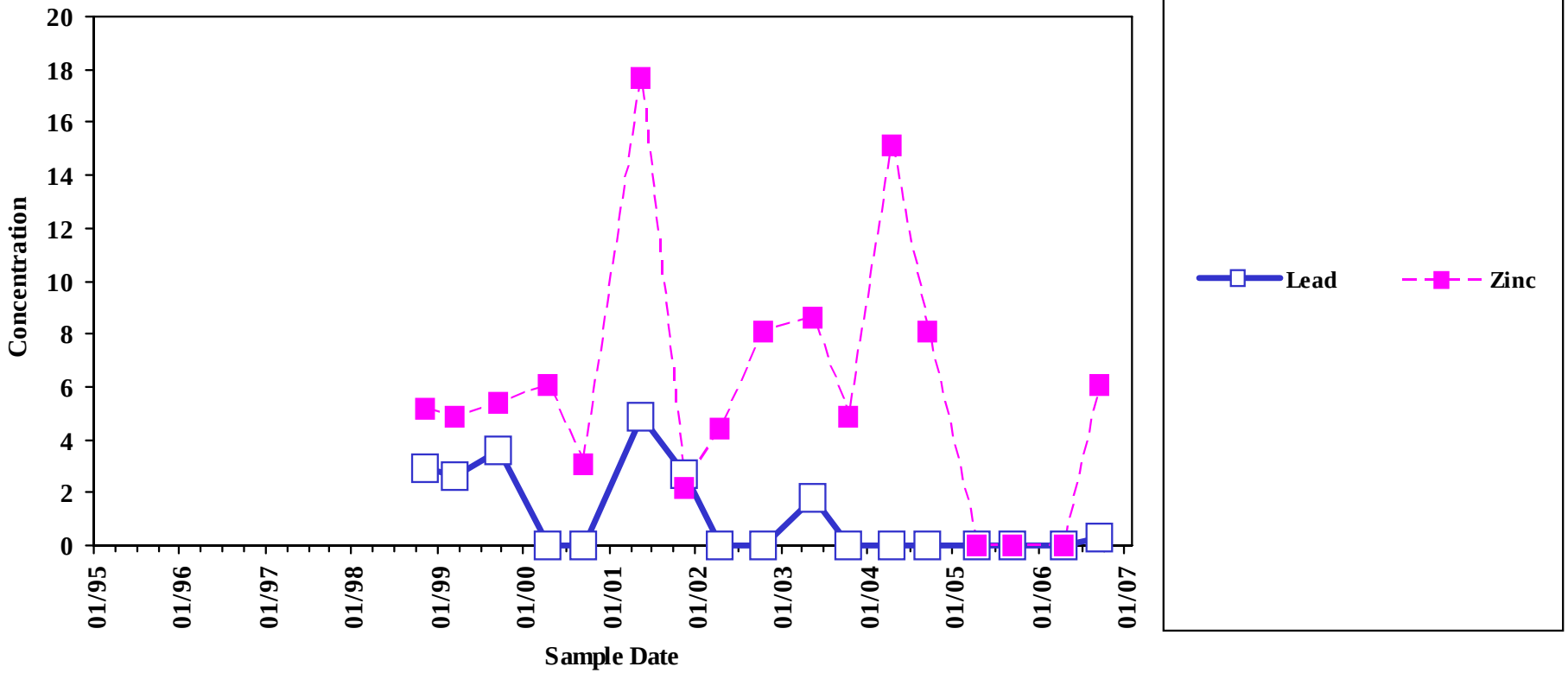
Sample Location:

SW-09

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Lead	Zinc
	0.41	--

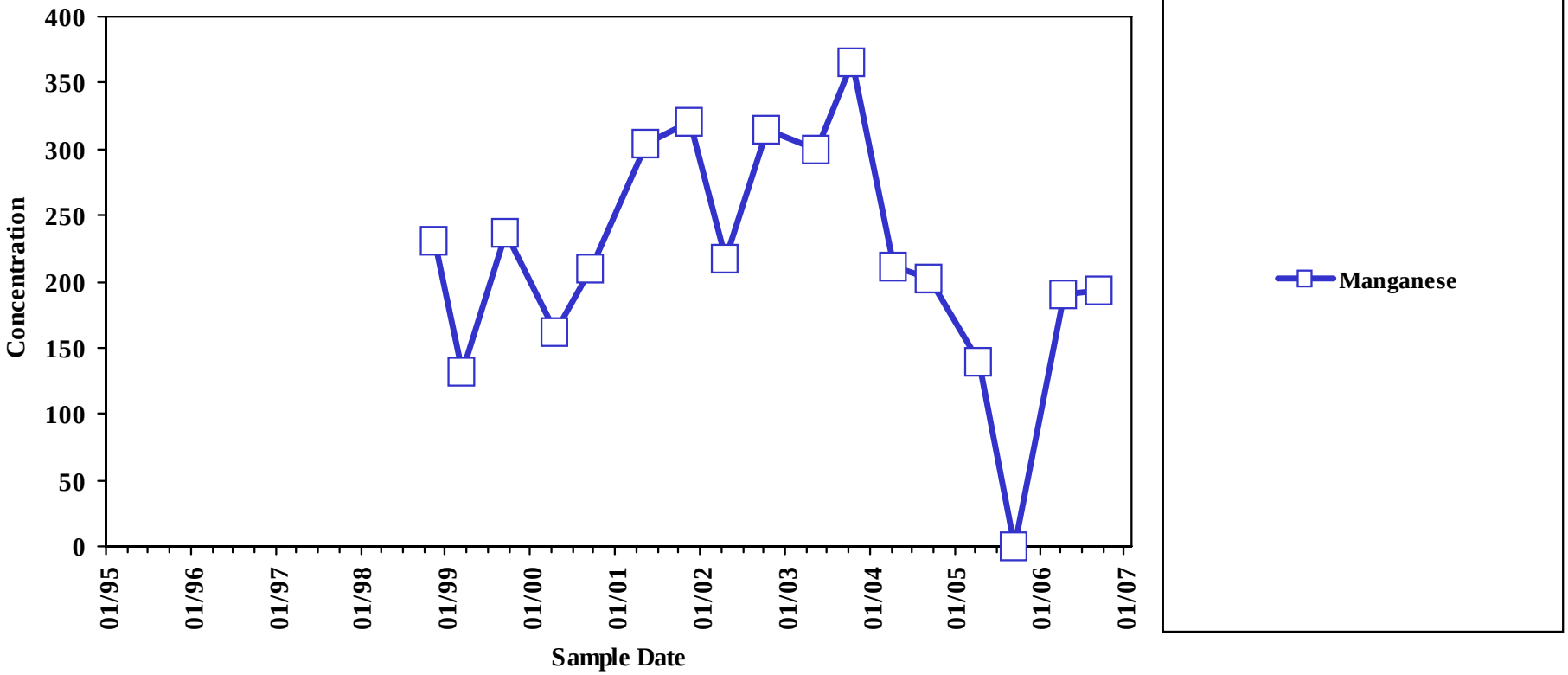
Sample Location:

SW-09

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Manganese
	120

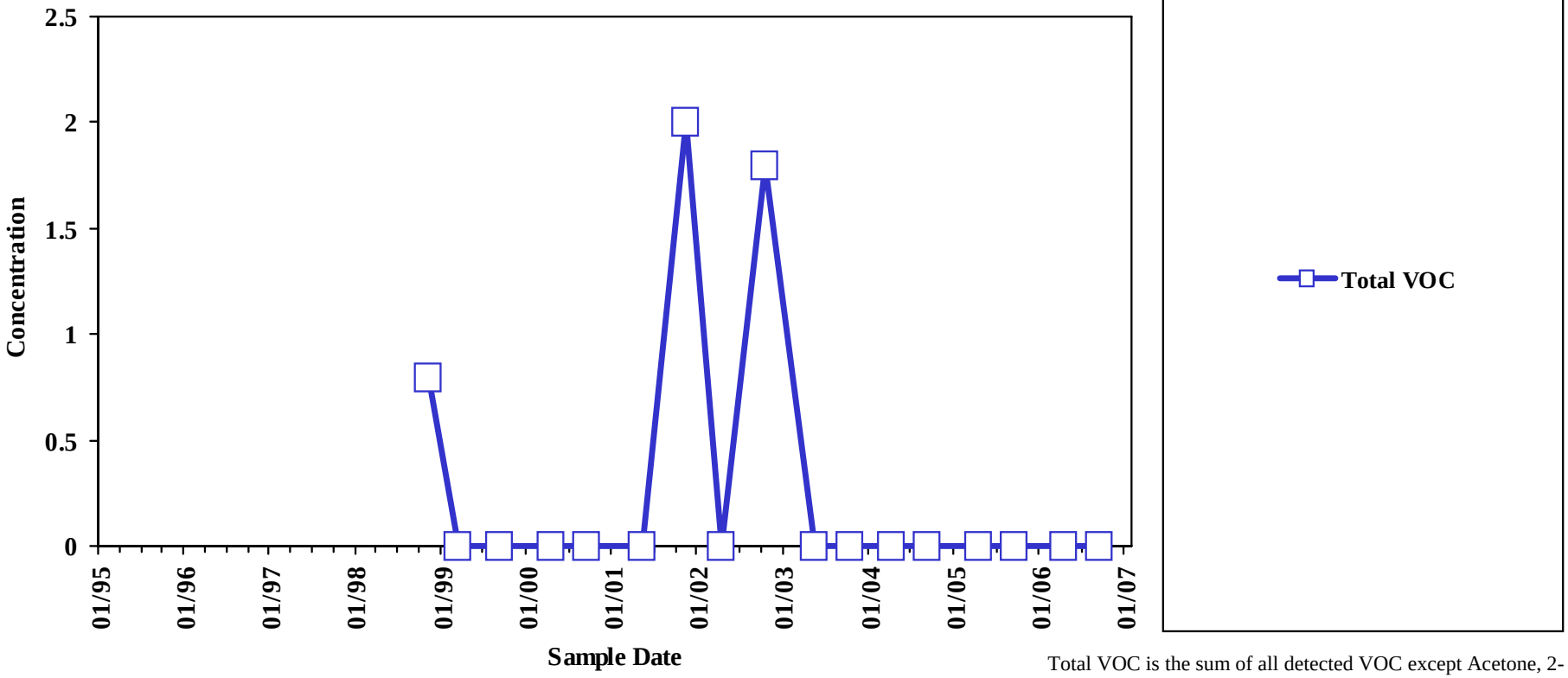
Sample Location:

SW-09

Sites 1 & 3

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

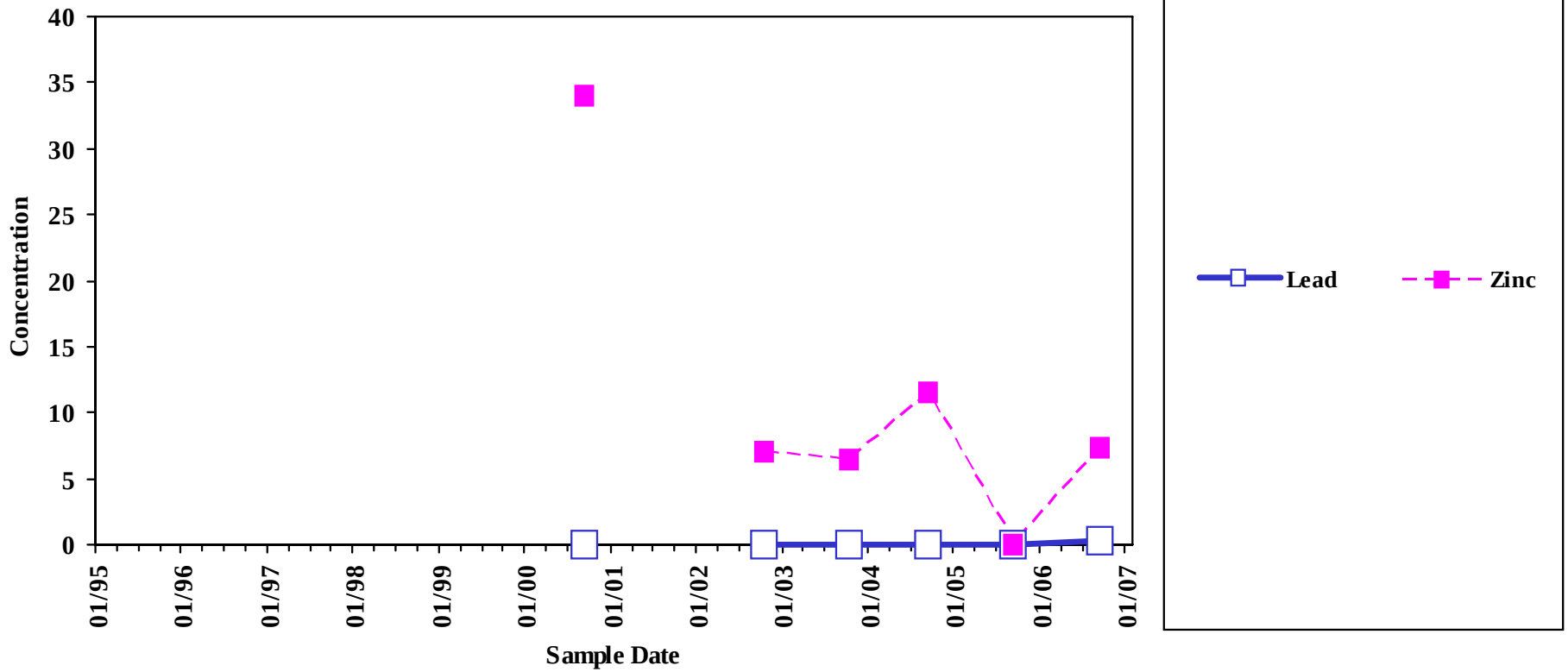
Sample Location:

SW-15

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Lead	Zinc
	0.41	--

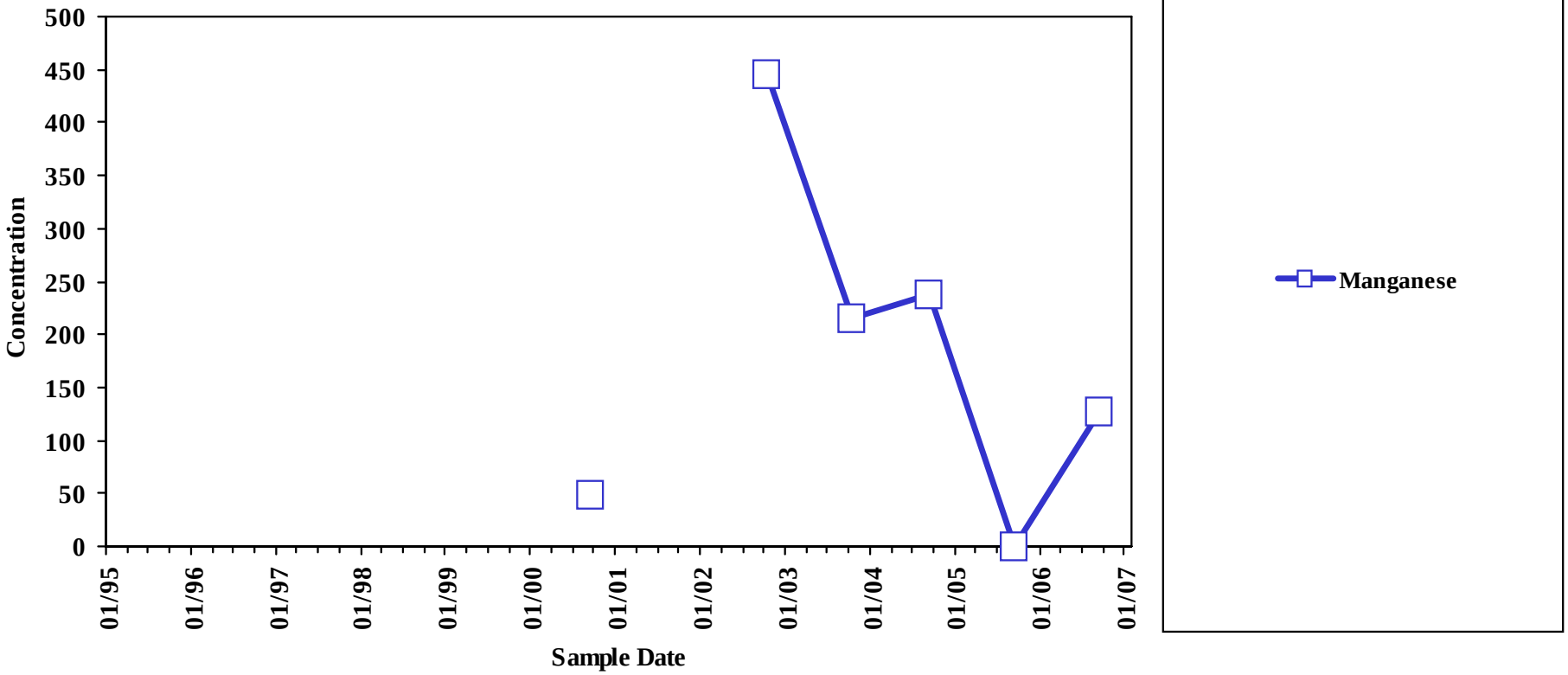
Sample Location:

SW-15

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Manganese
	120

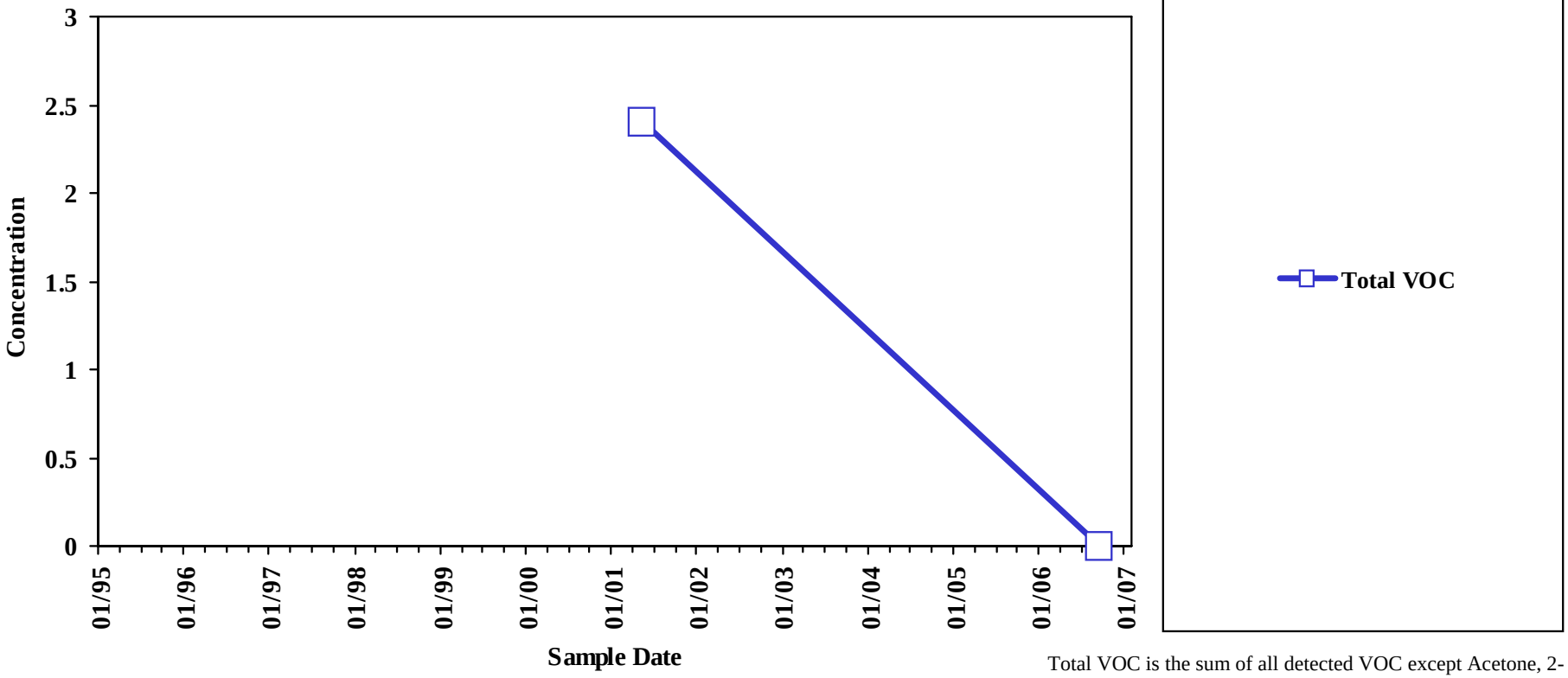
Sample Location:

SW-15

Sites 1 & 3

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

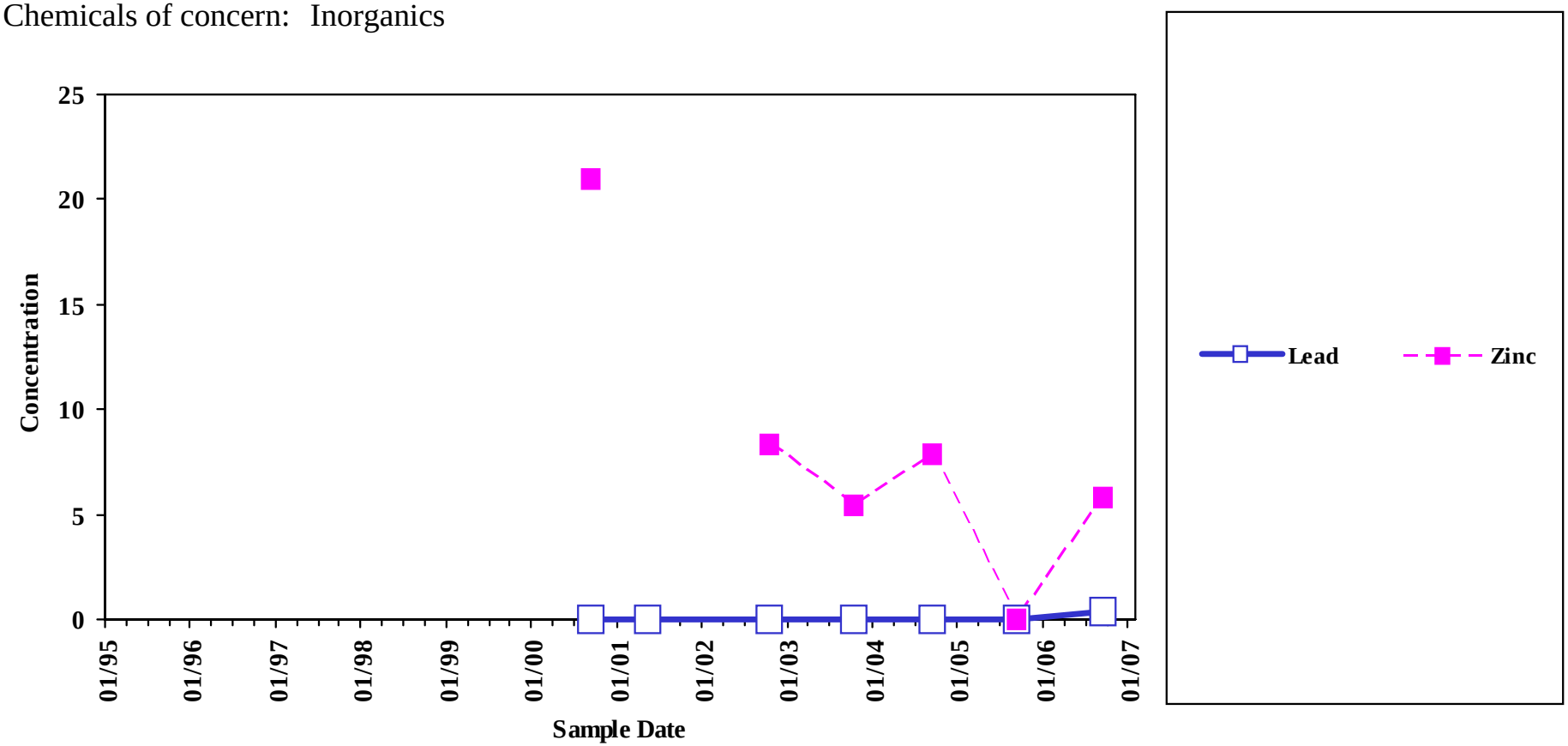
Sample Location:

SW-16

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Lead	Zinc
	0.41	--

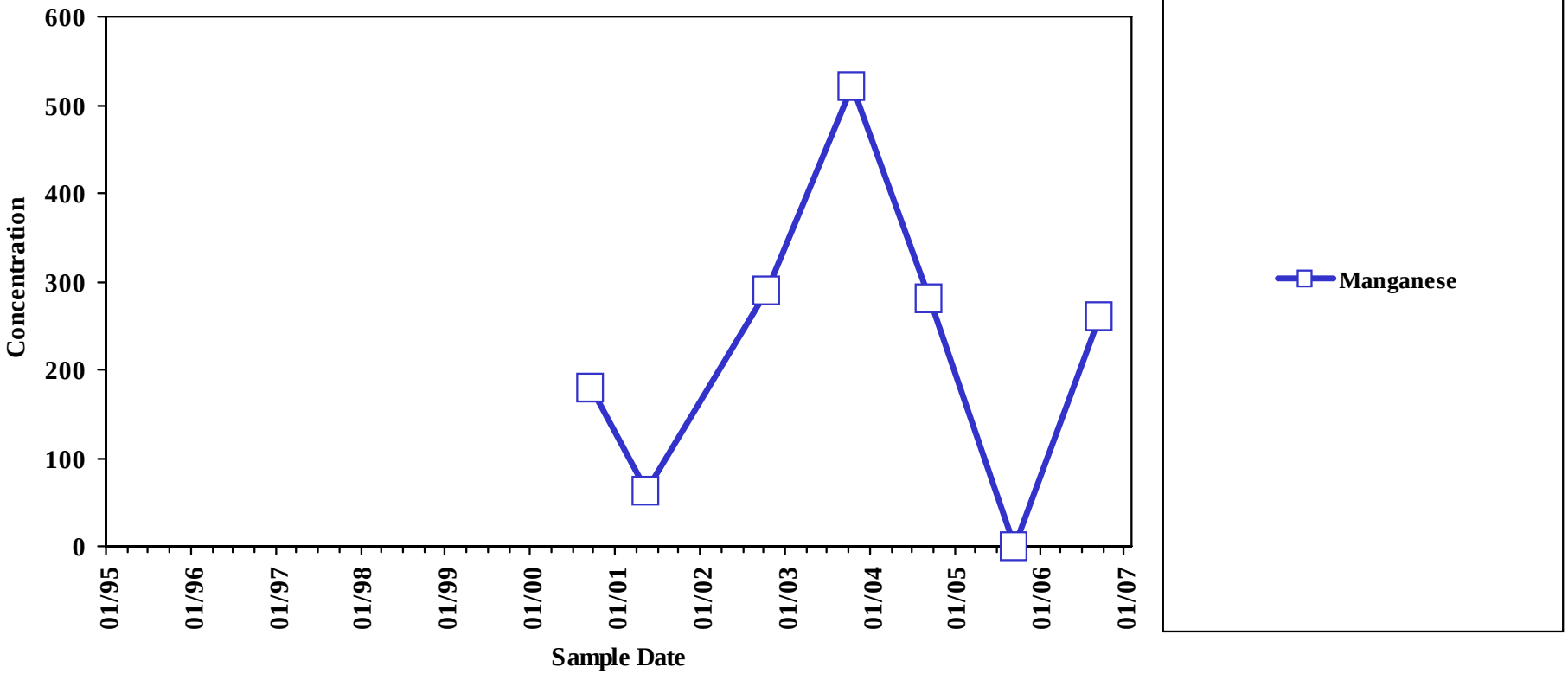
Sample Location:

SW-16

Sites 1 & 3

Surface water

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

Clean-up Standard	Manganese
	120

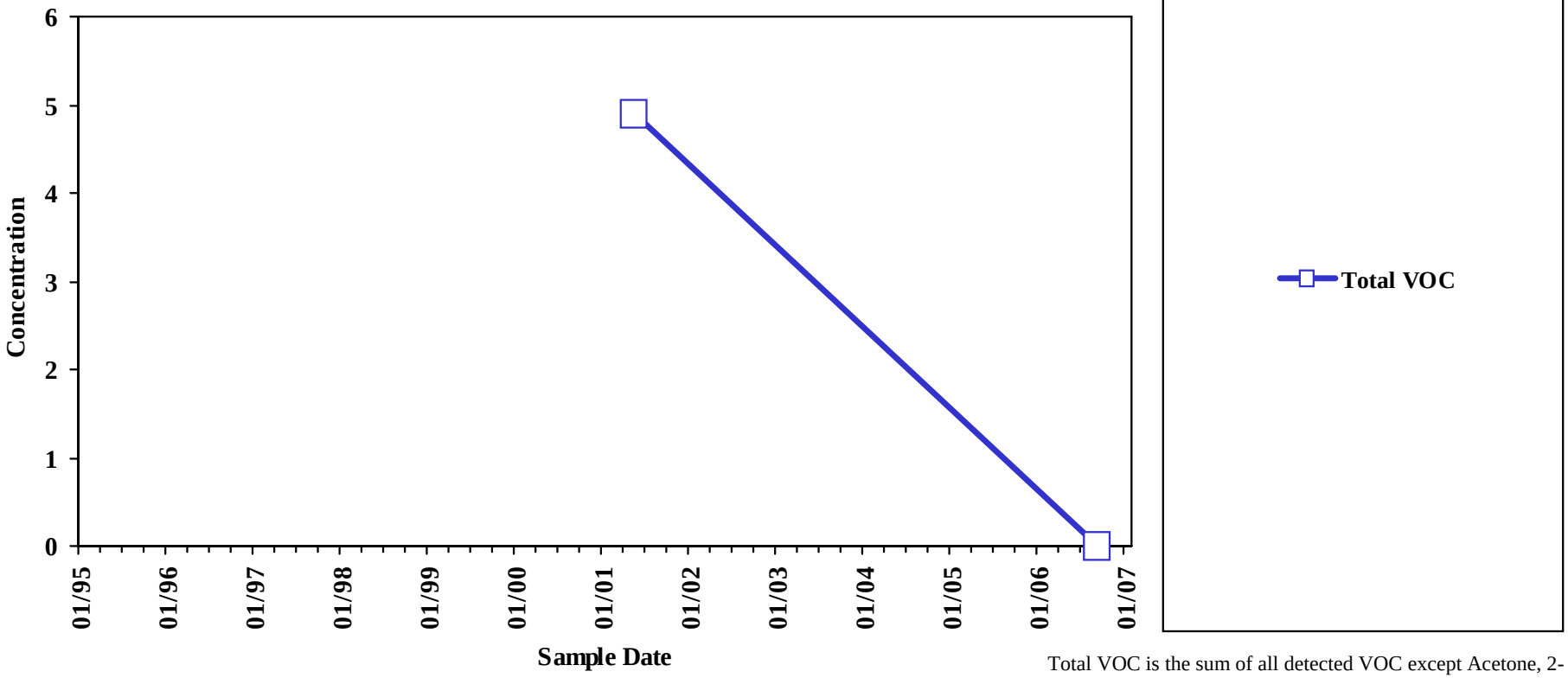
Sample Location:

SW-16

Sites 1 & 3

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Acetone, 2-Butanone, Methylene Chloride, and 1,4-Dioxane.

Sample concentration units: µg/L

Appendix C.2

Long-Term Monitoring Trend Results
Eastern Plume

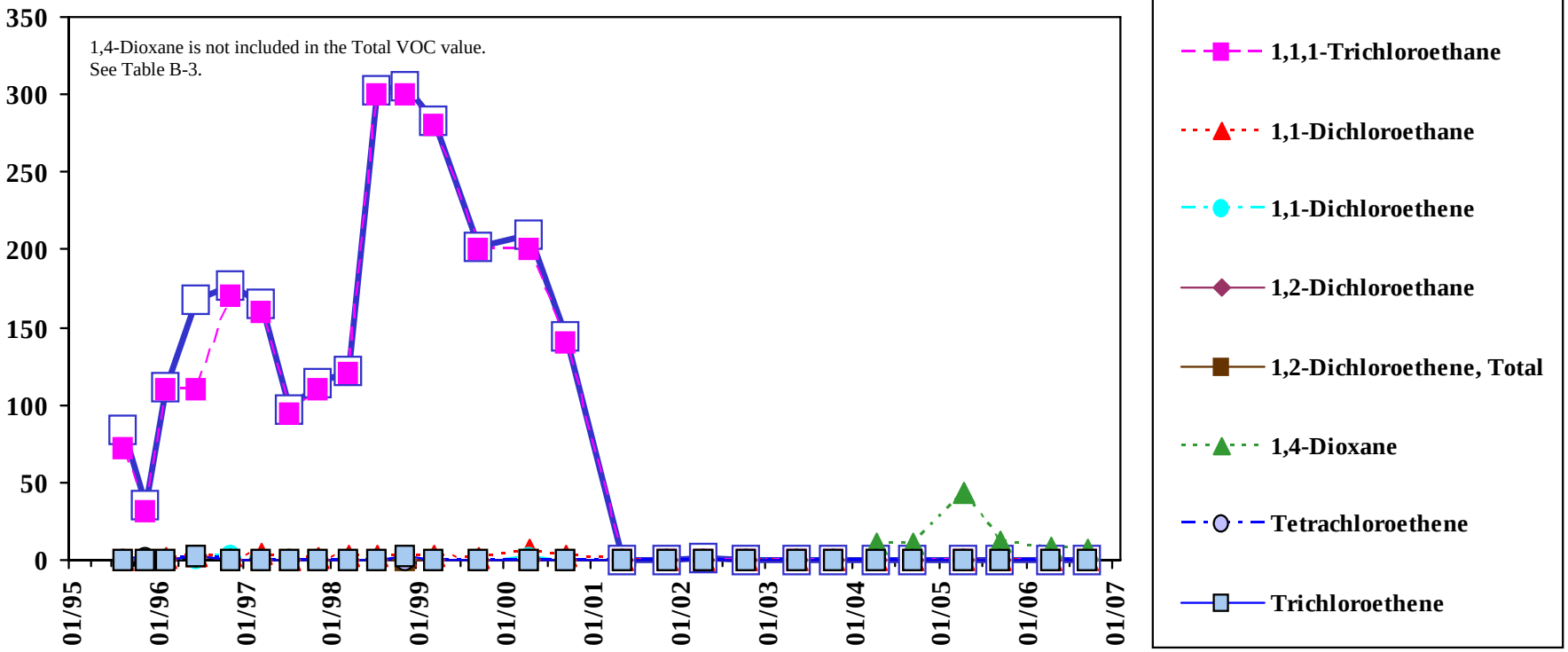
Extraction System Influent/Effluent and Extraction Well Data (EW)
Groundwater Data (MW)

Sample Location:

Eastern Plume Combined Effluent

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

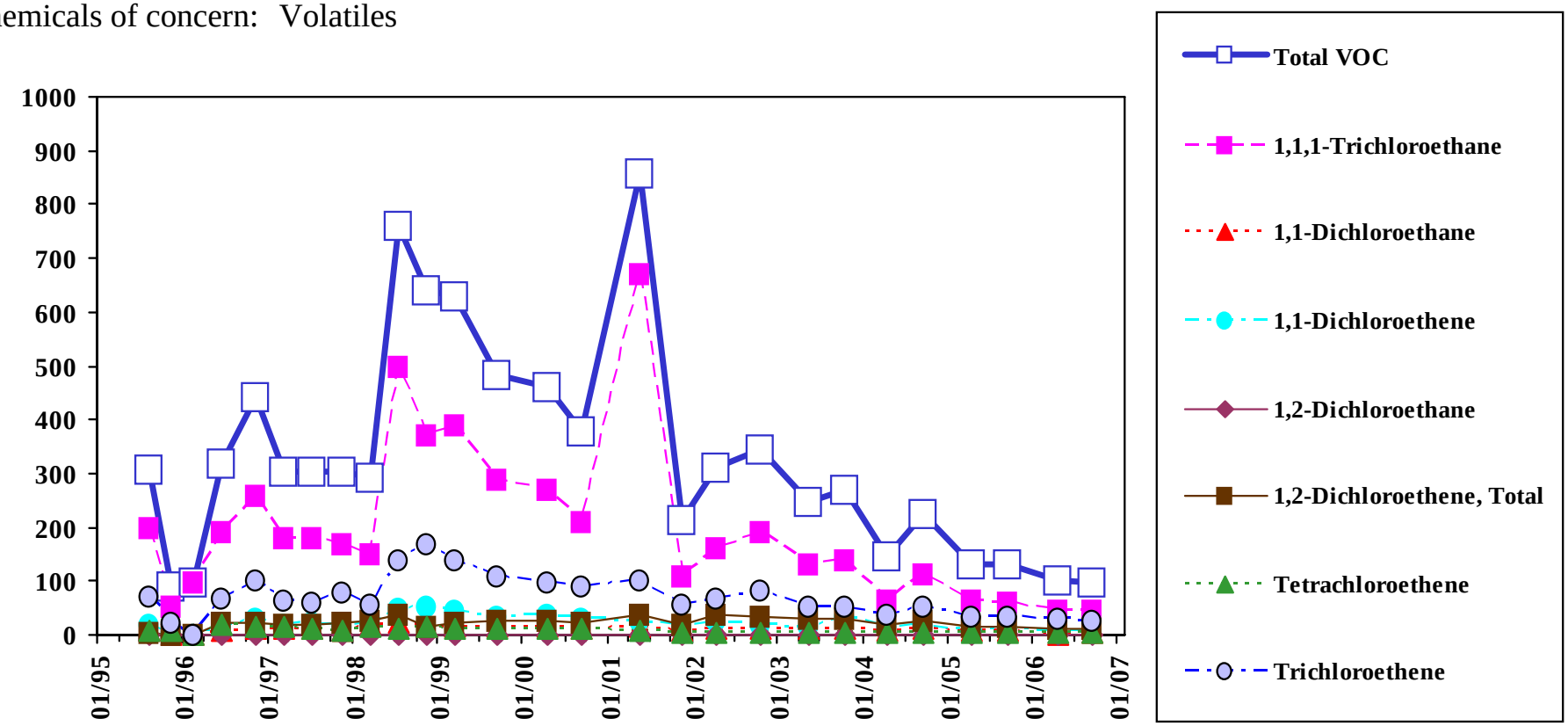
1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

Sample Location:

Eastern Plume Raw Influent

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

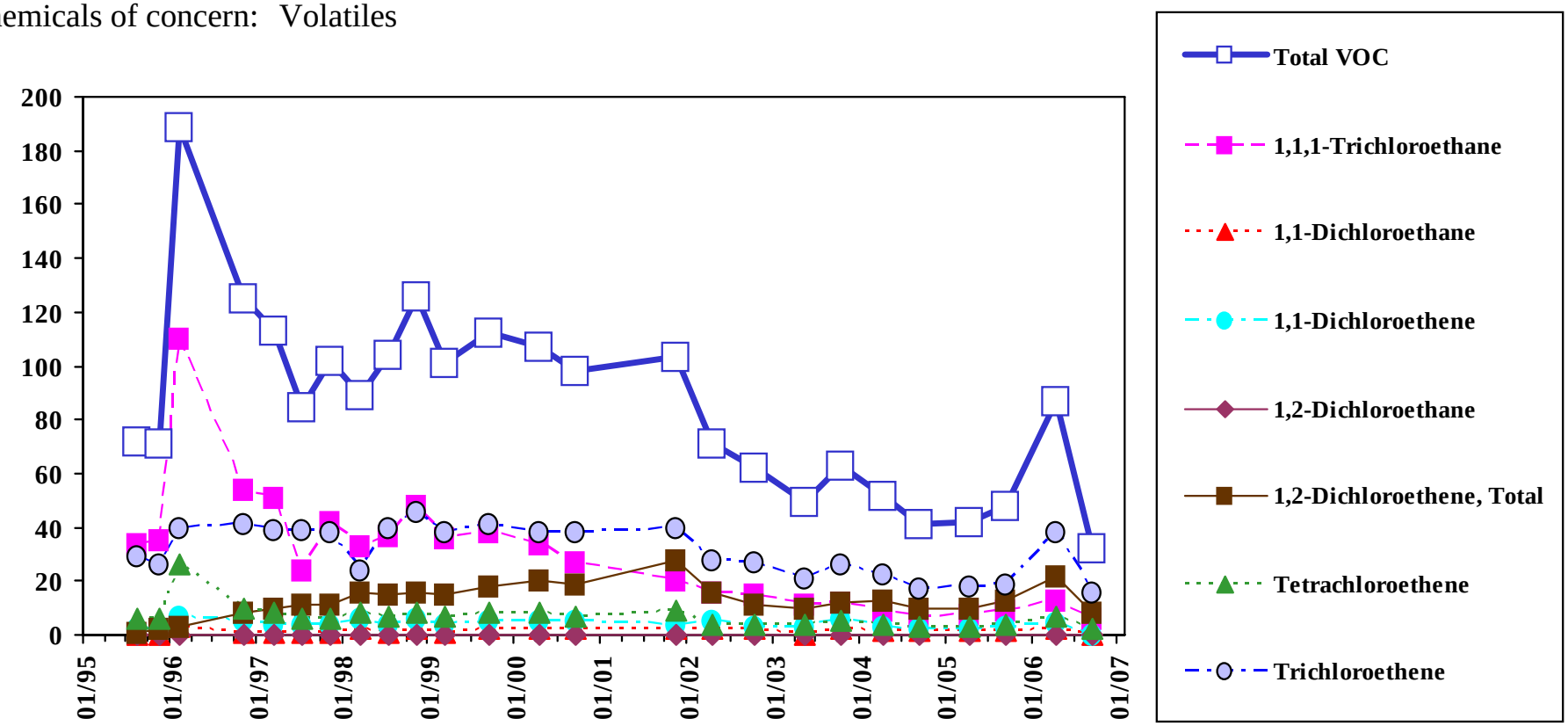
1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

Sample Location:

EW-01

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

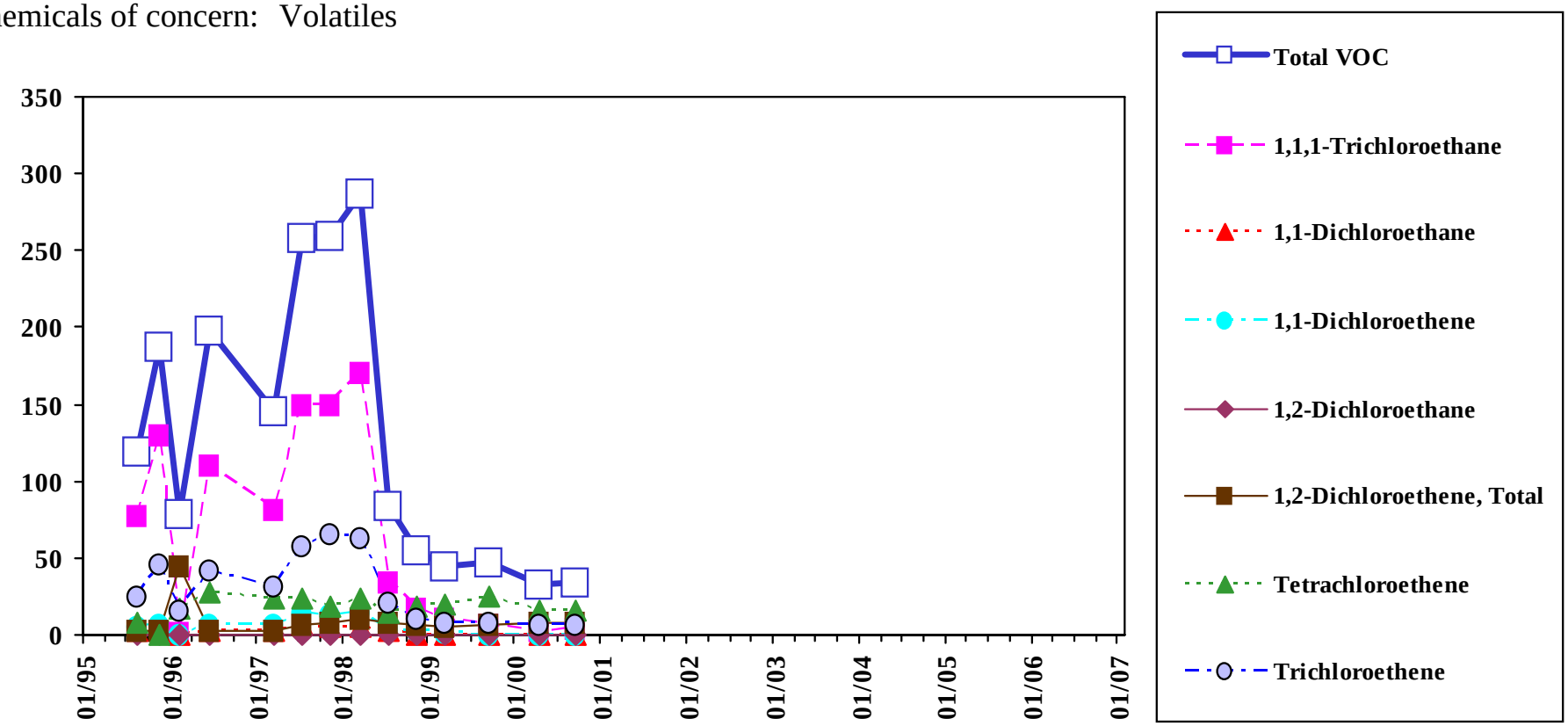
1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

Sample Location:

EW-02

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

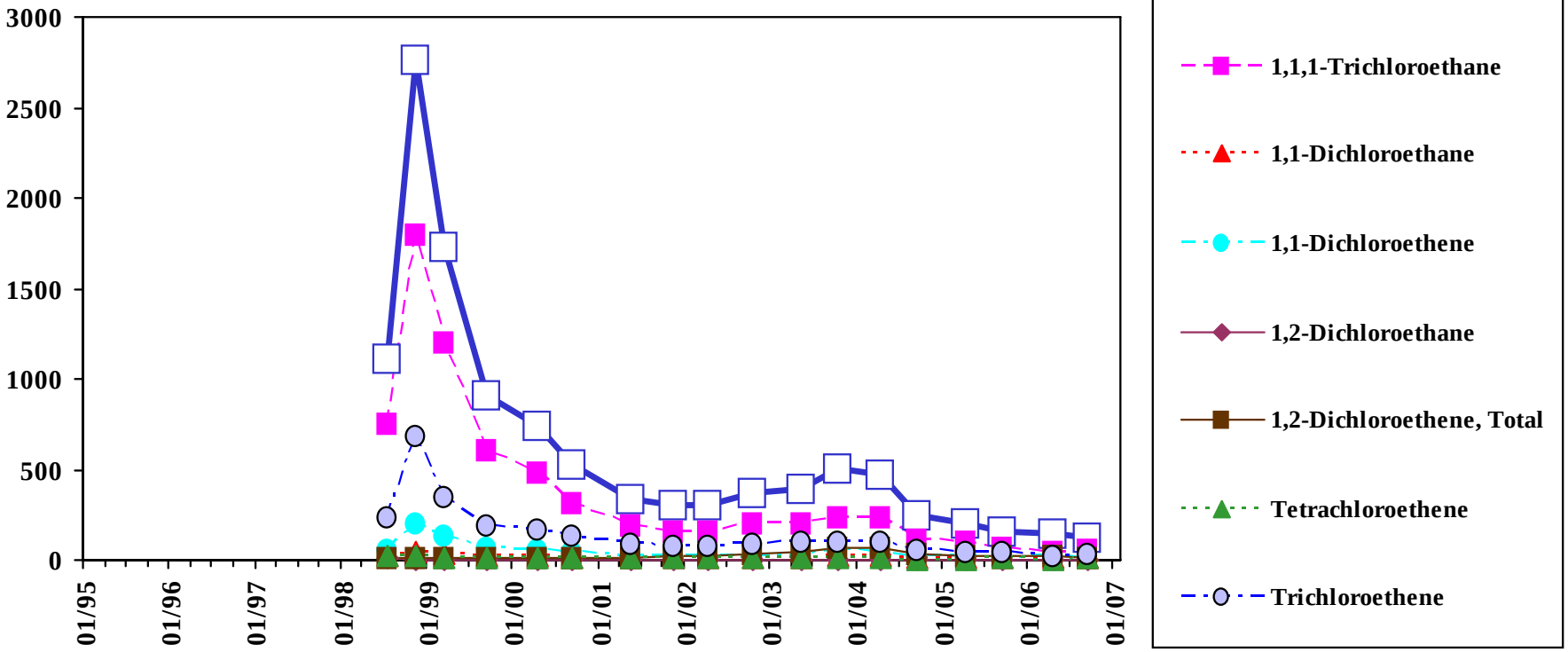
1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

Sample Location:

EW-02A

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

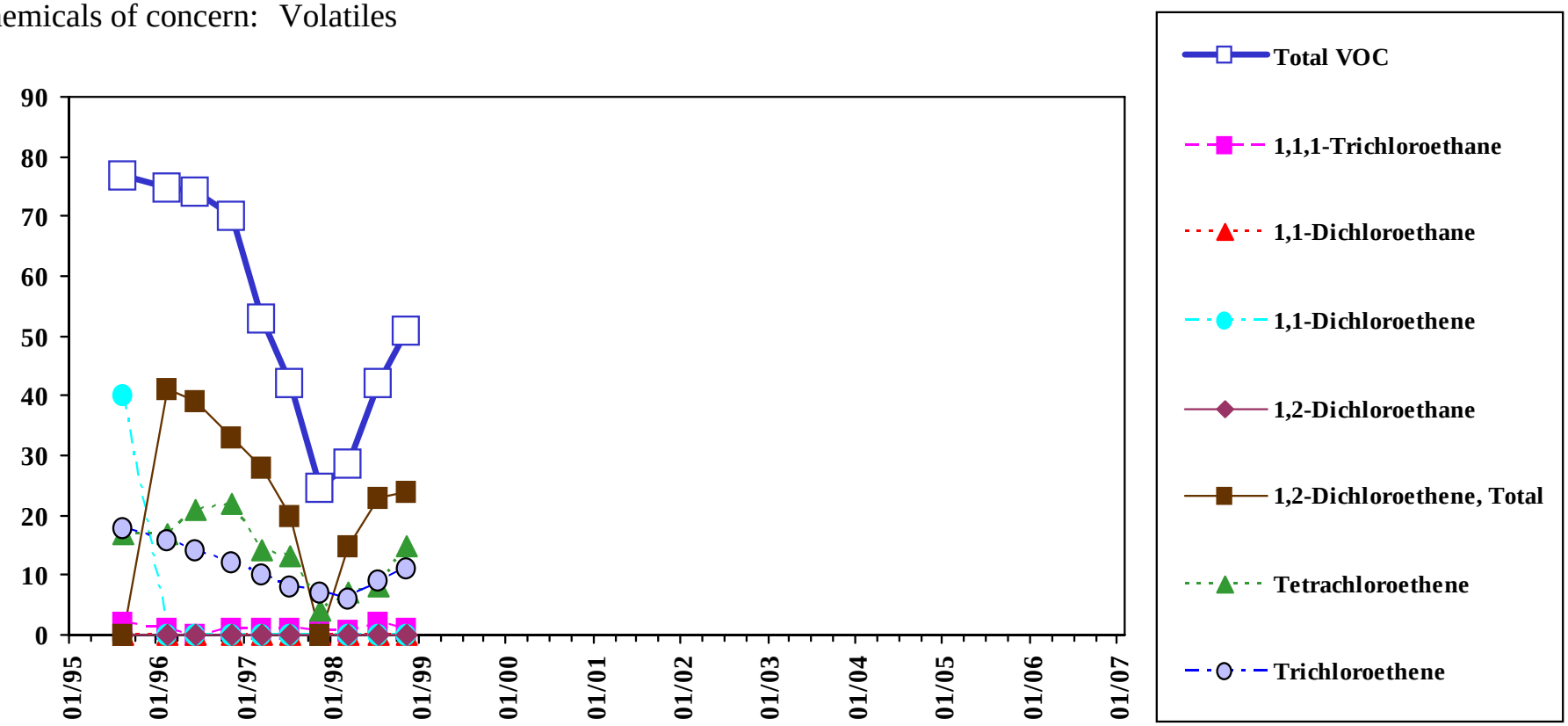
1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

Sample Location:

EW-03

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

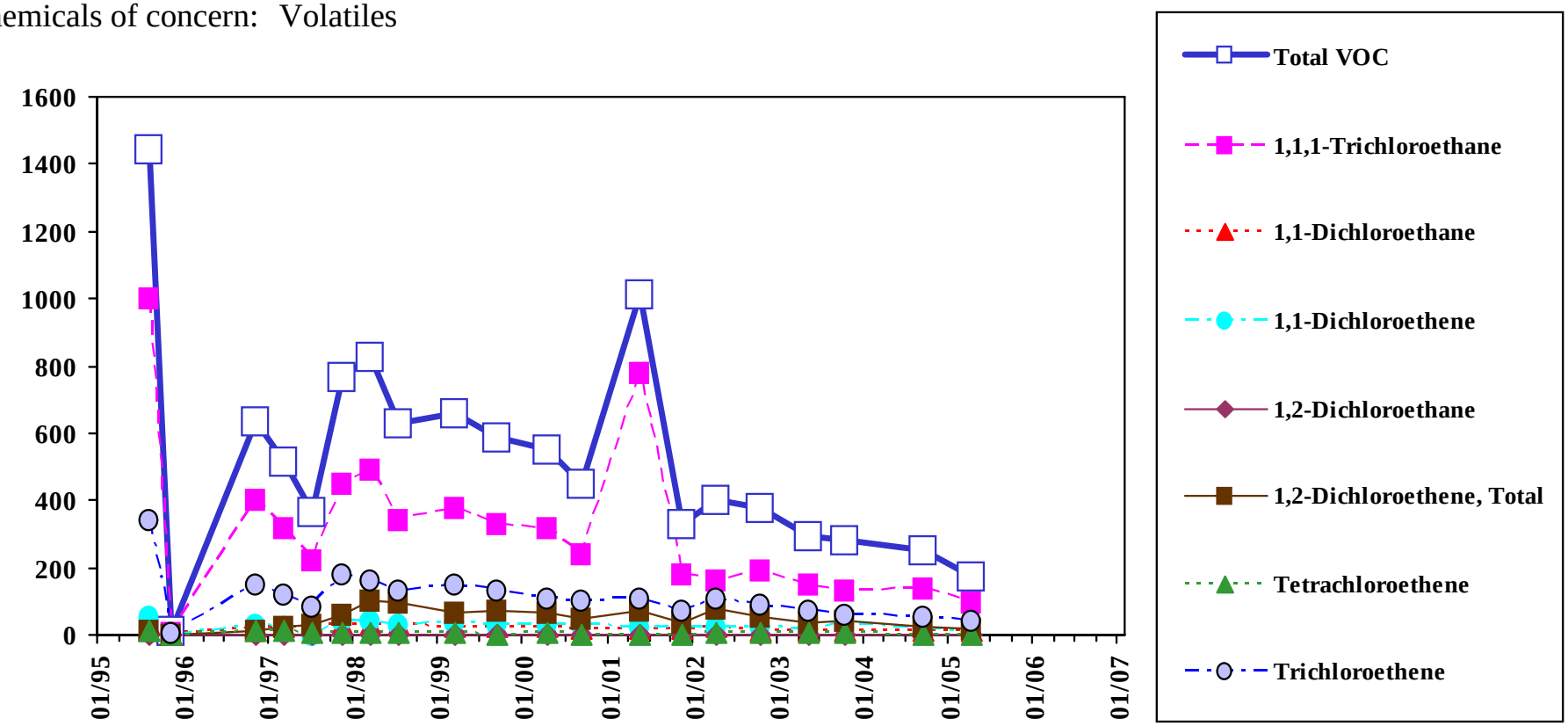
1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

Sample Location:

EW-04

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

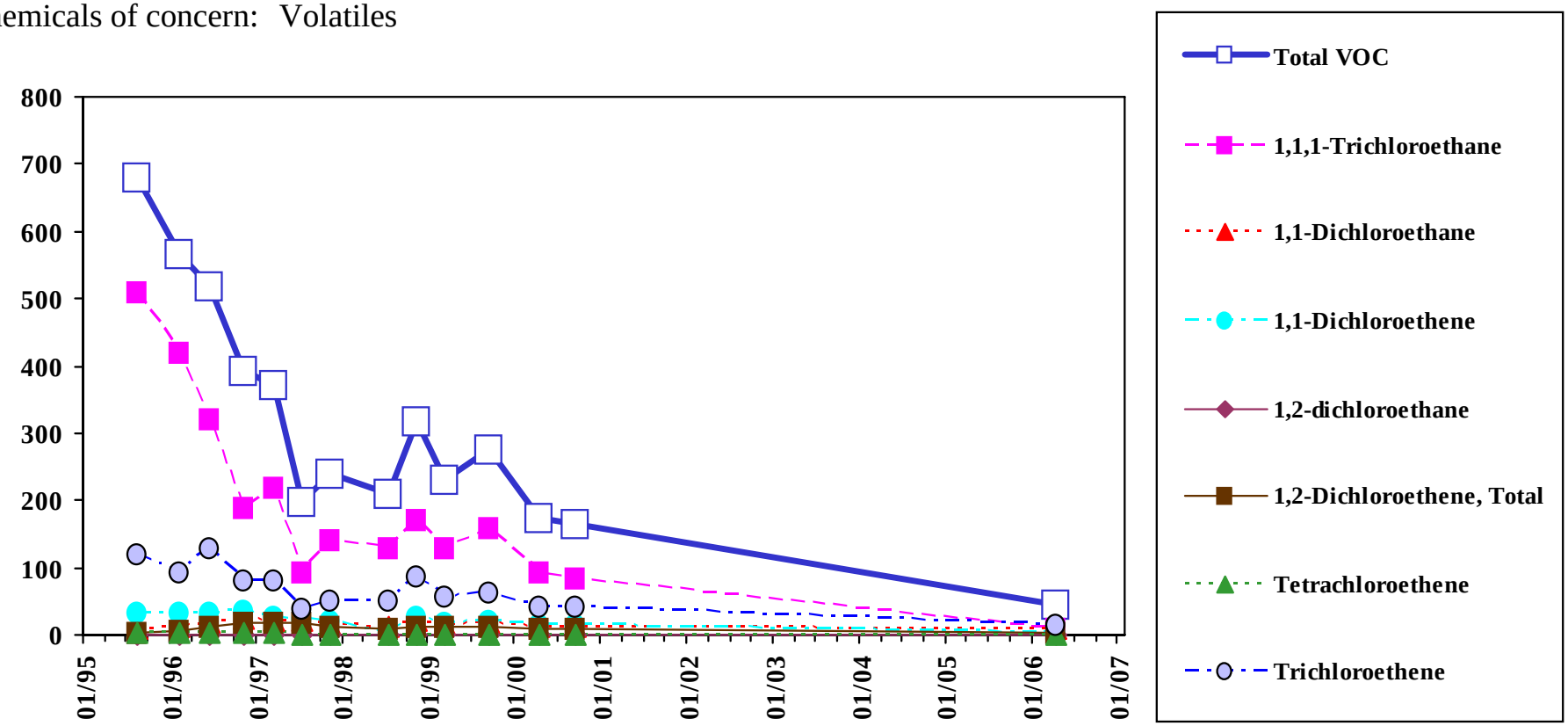
1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

Sample Location:

EW-05

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

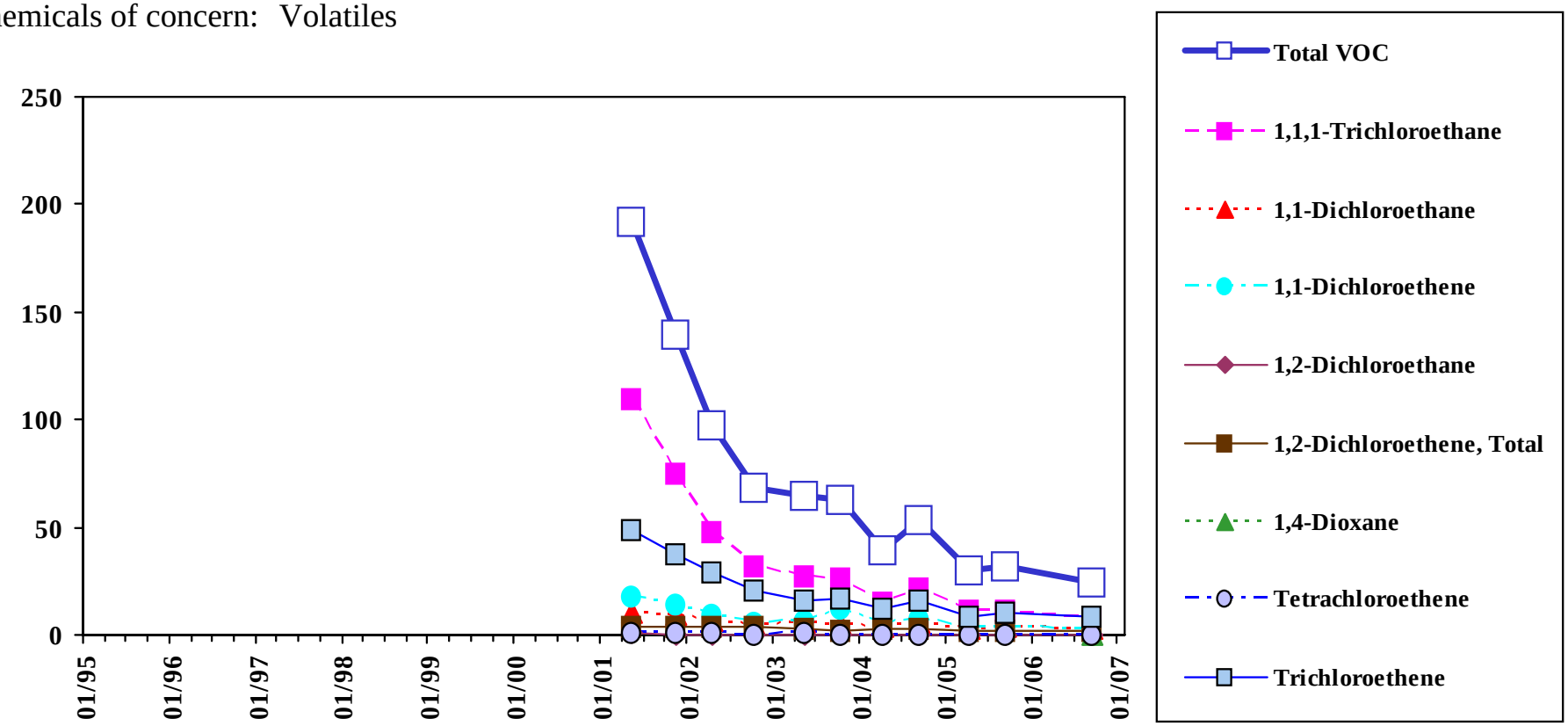
1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

Sample Location:

EW-05A

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

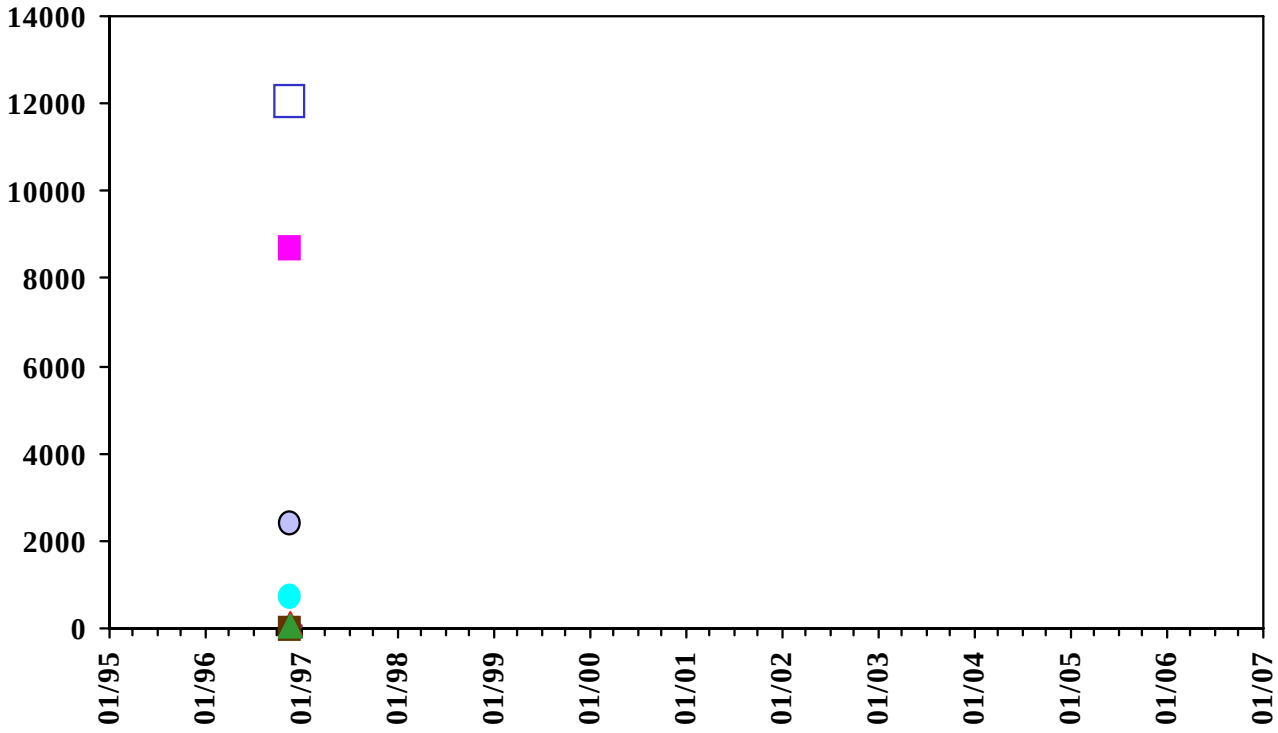
Sample Location:

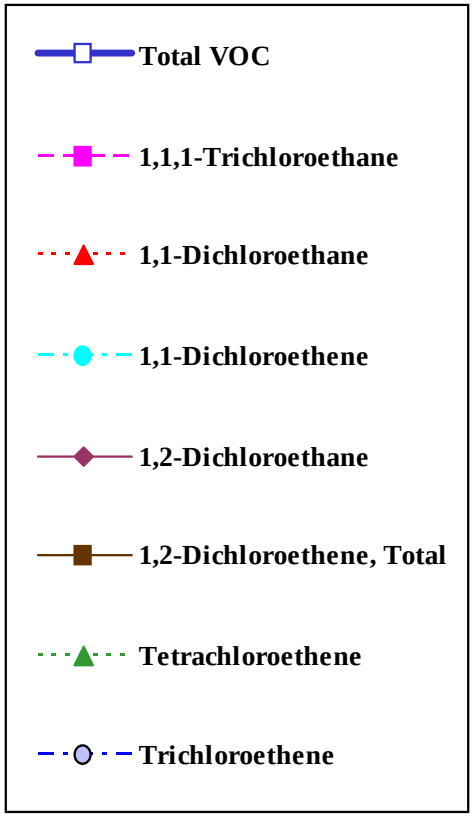
MW-101

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles





Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

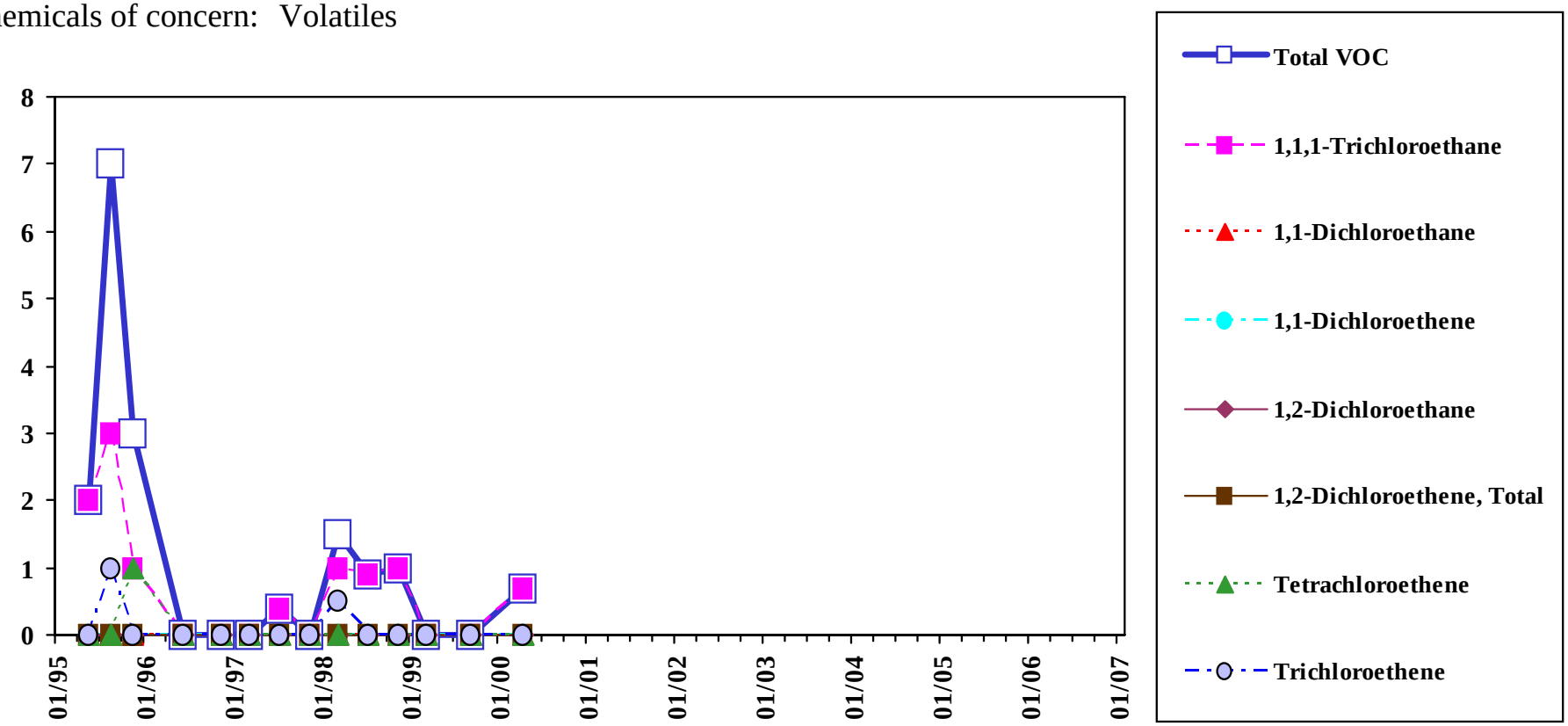
Sample Location:

MW-105A

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

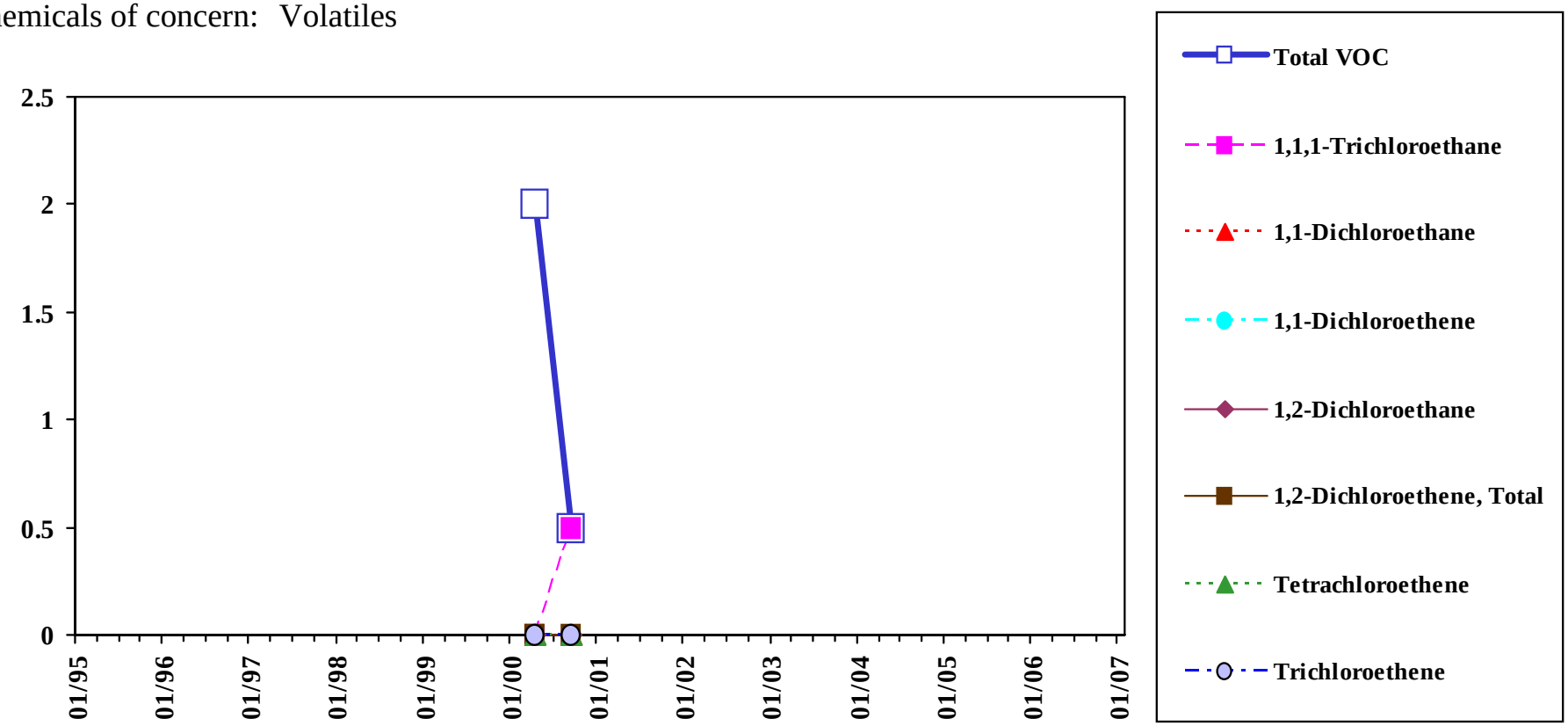
Sample Location:

MW-105A

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

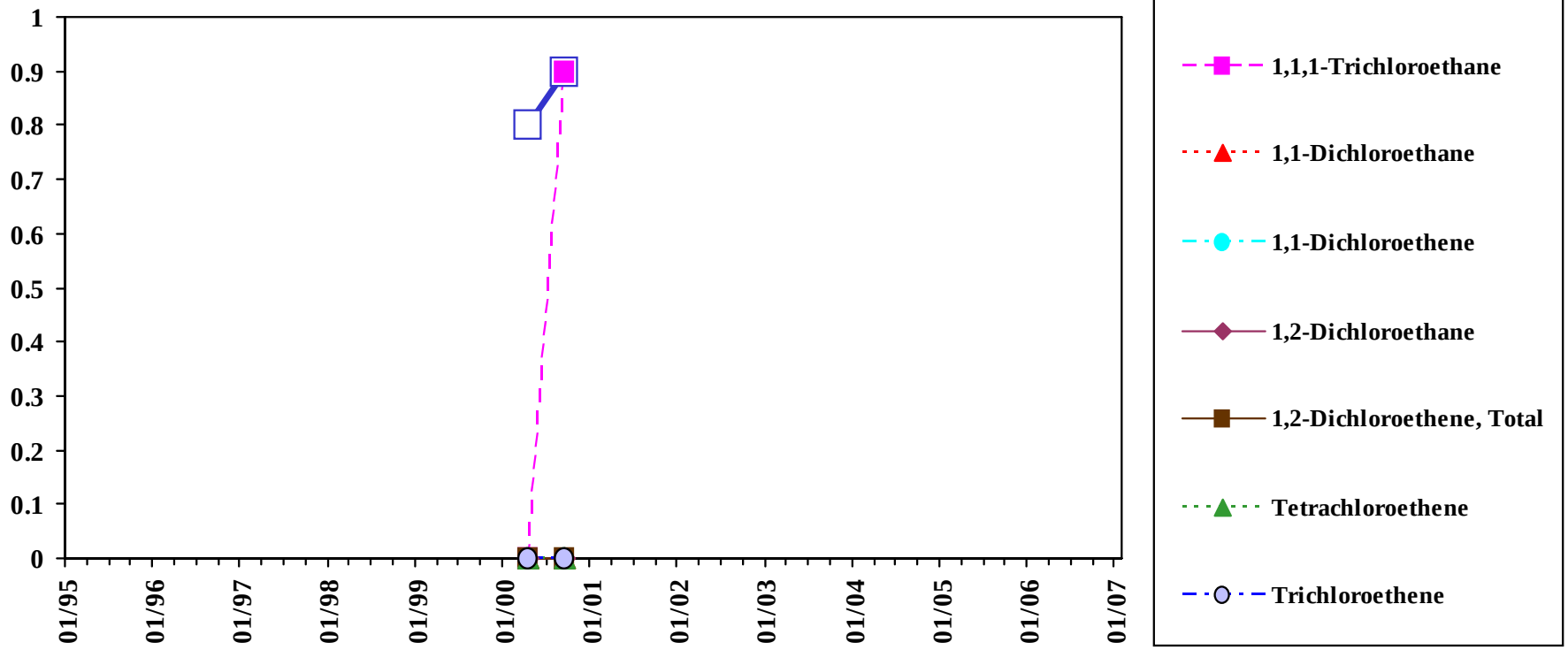
Sample Location:

MW-105A

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

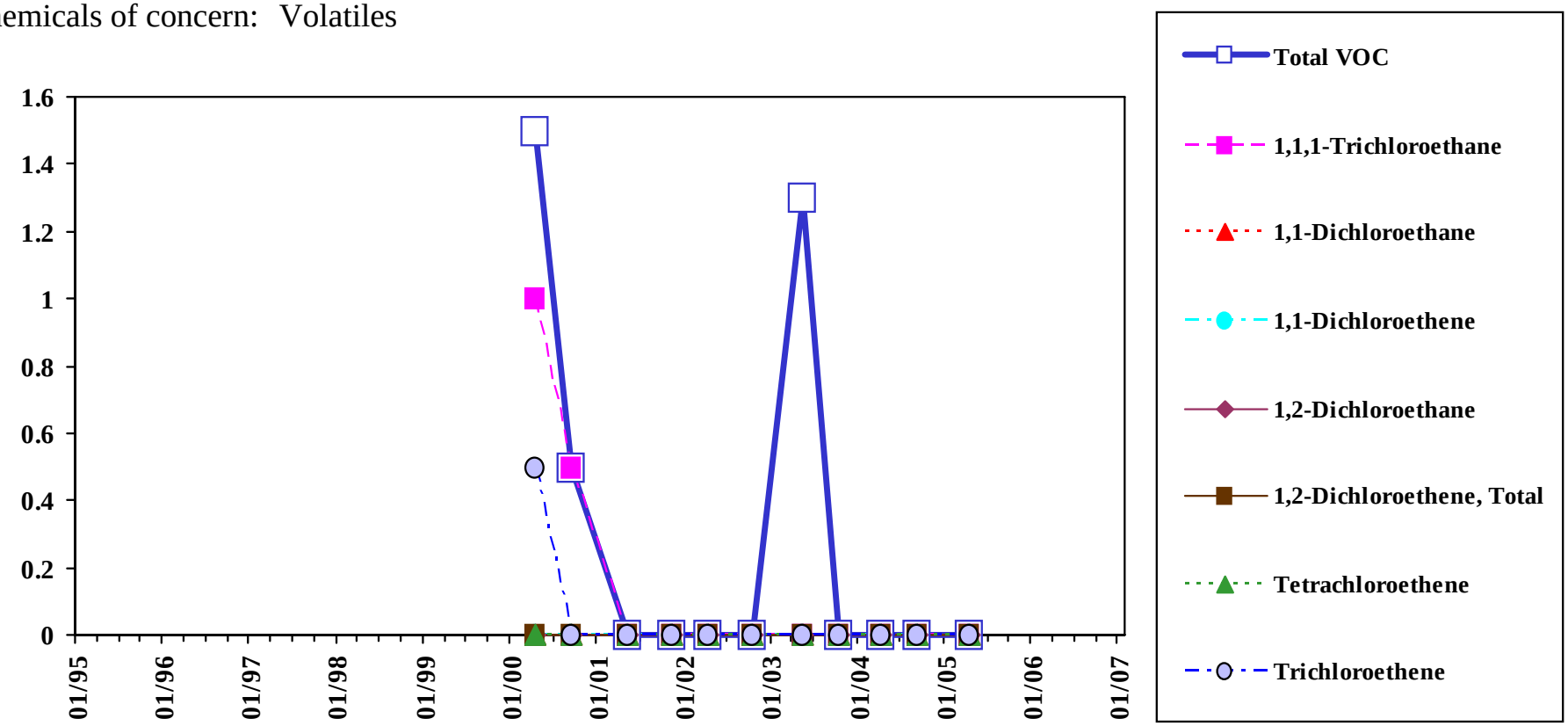
Sample Location:

MW-105A

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

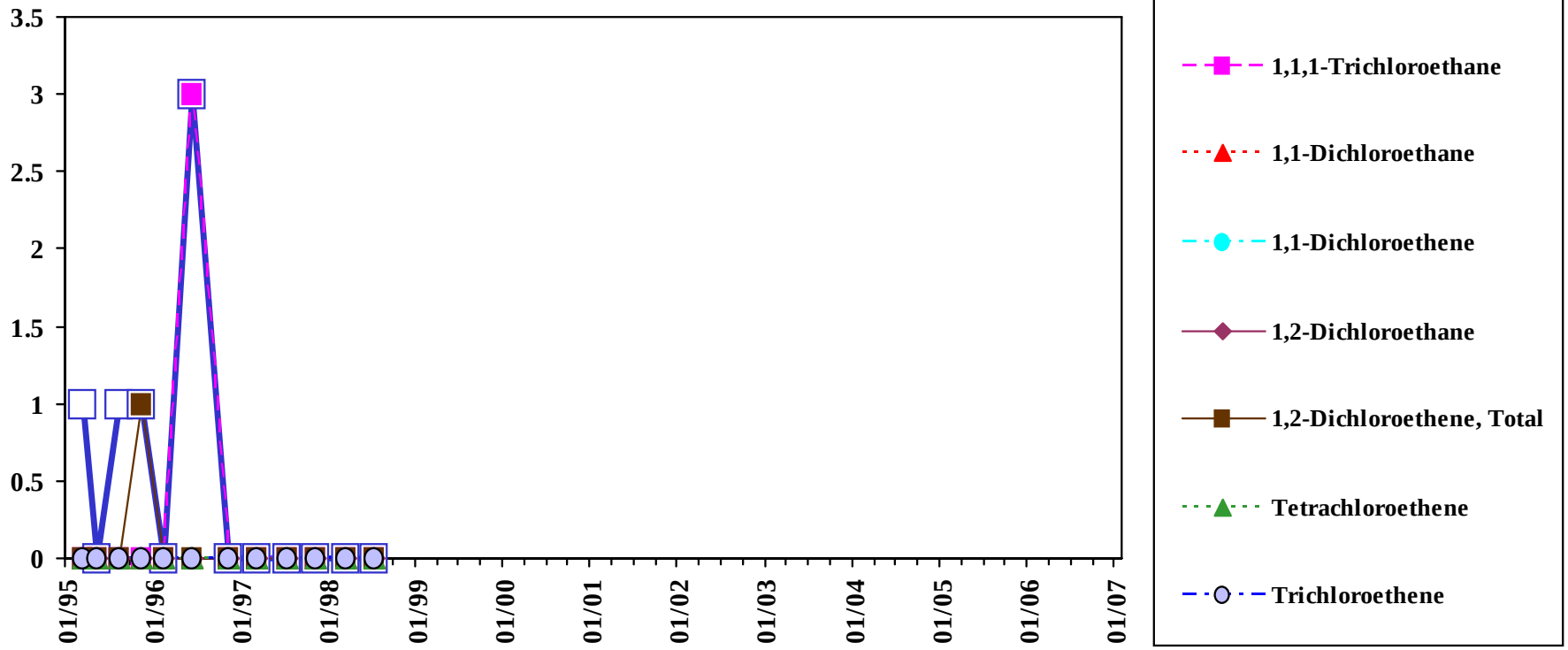
Sample Location:

MW-105B

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

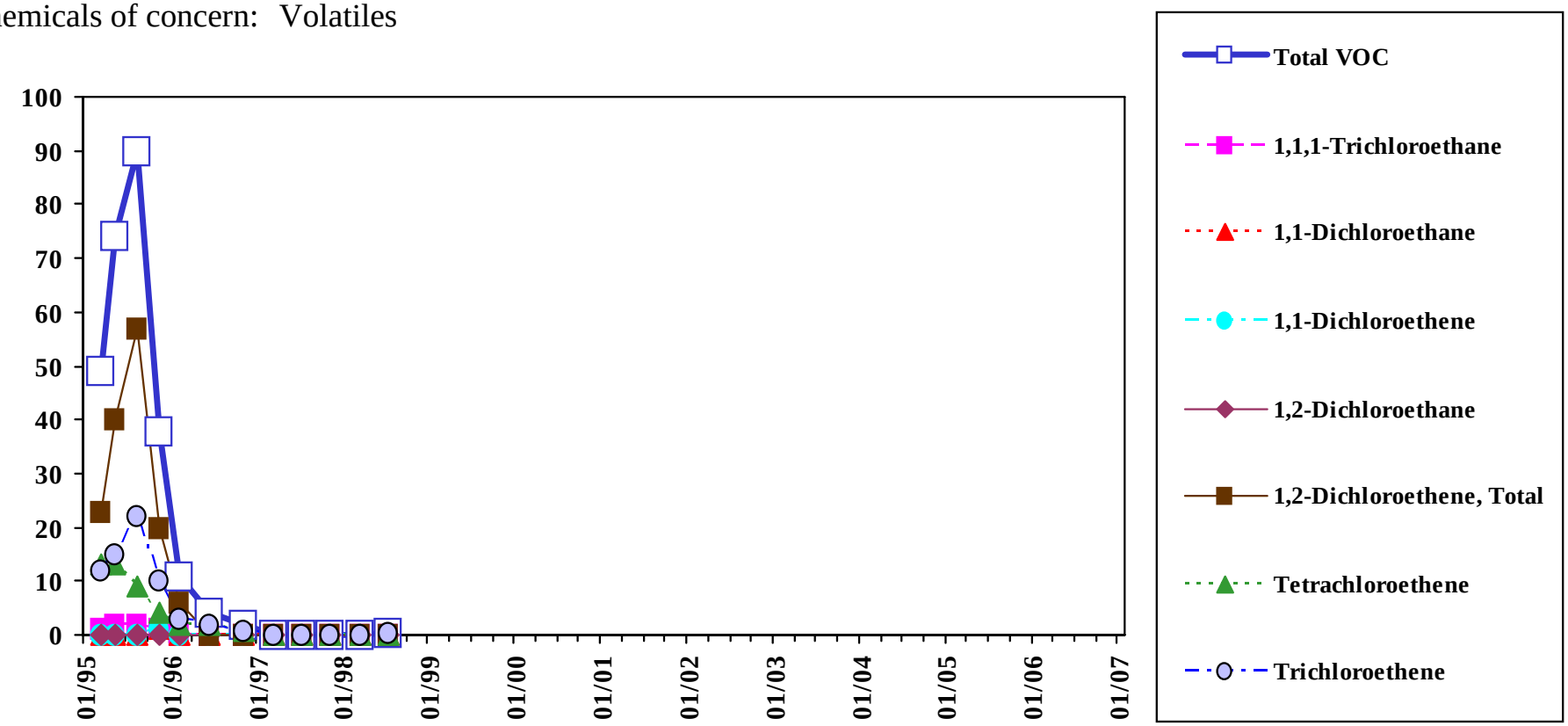
Sample Location:

MW-106

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

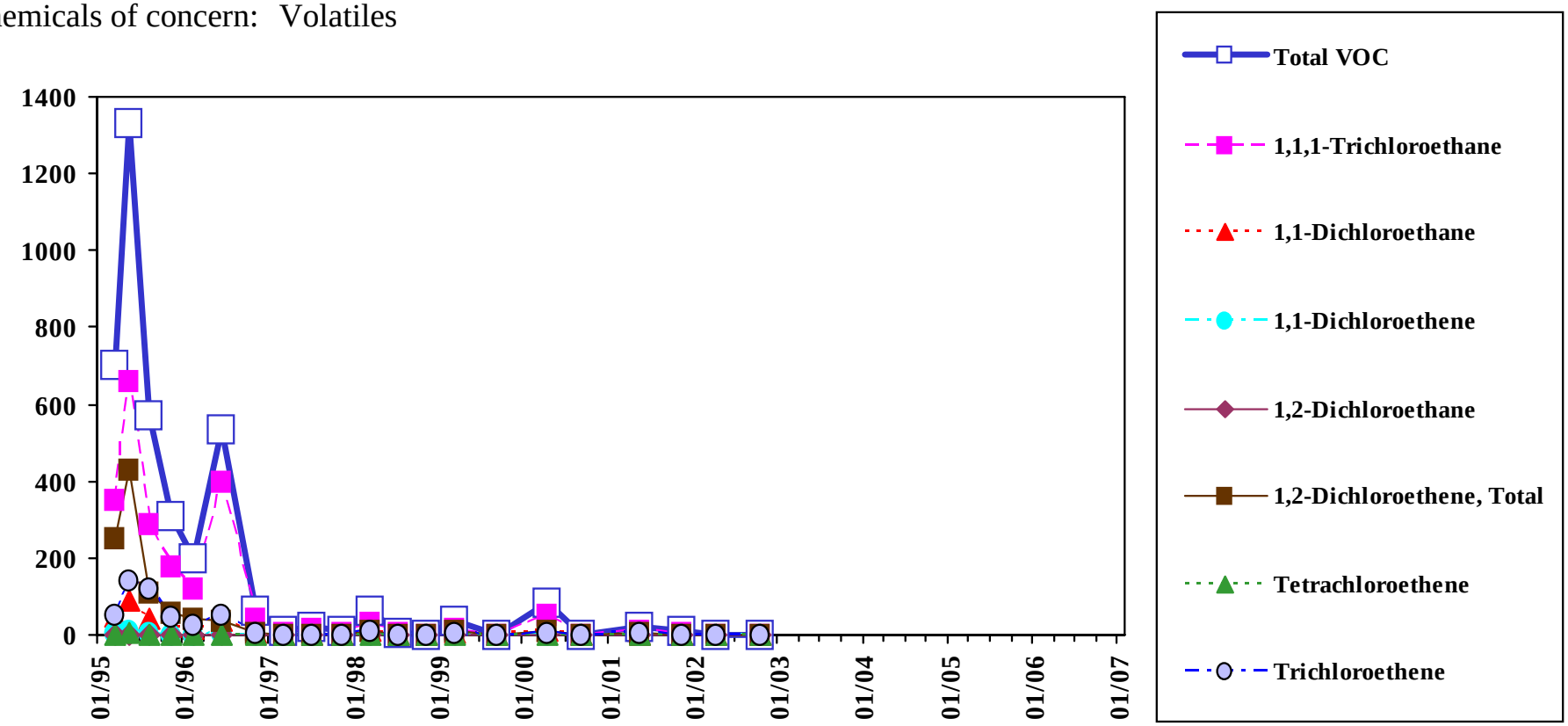
Sample Location:

MW-1104

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

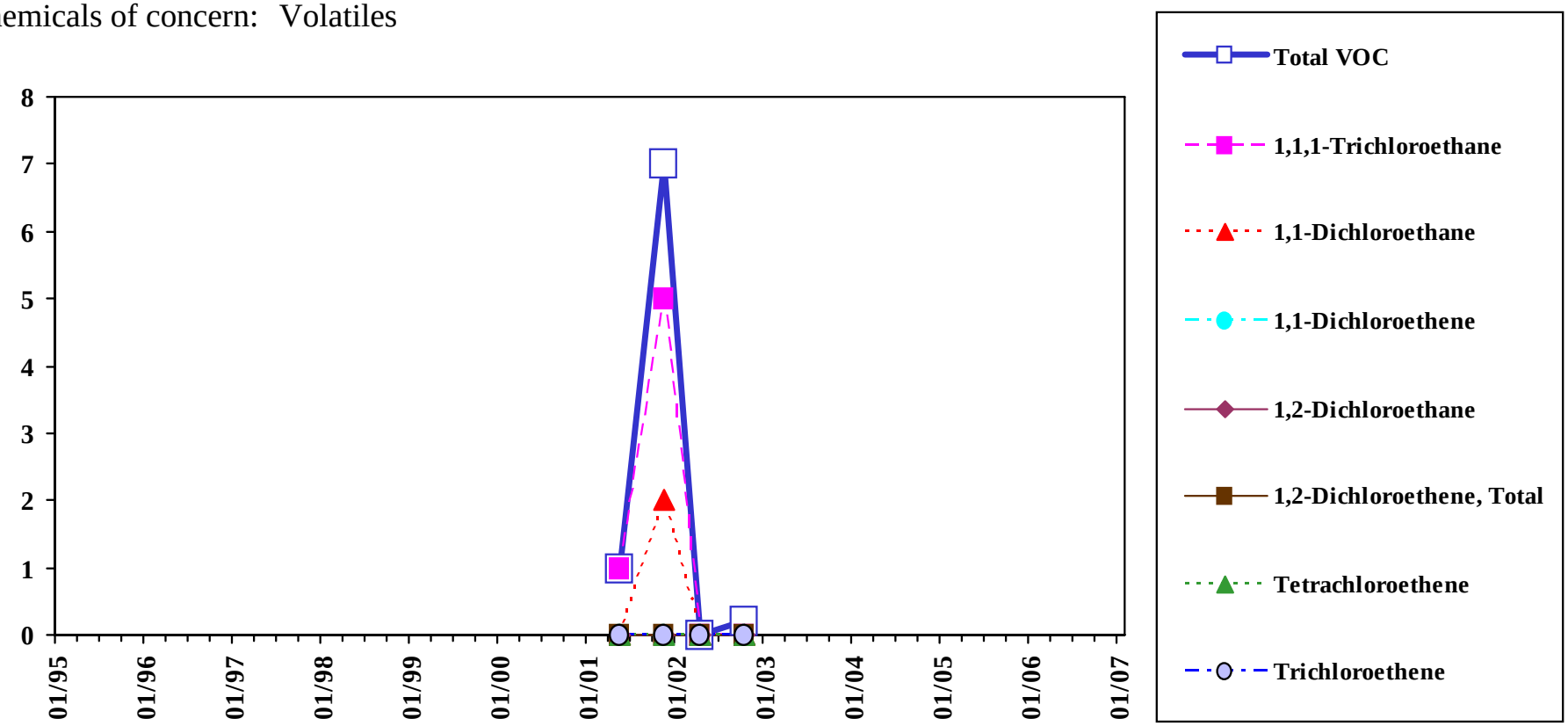
Sample Location:

MW-1104

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

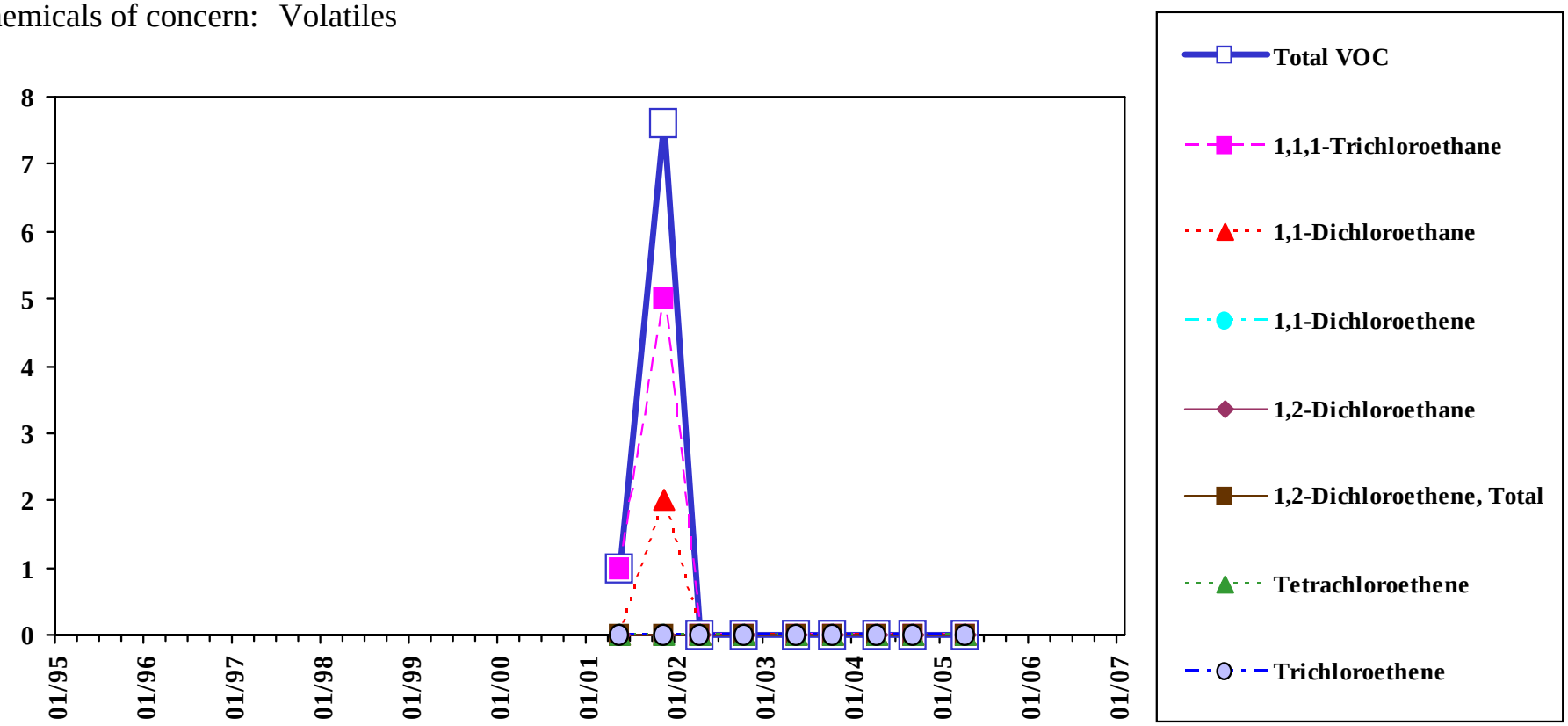
Sample Location:

MW-1104

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

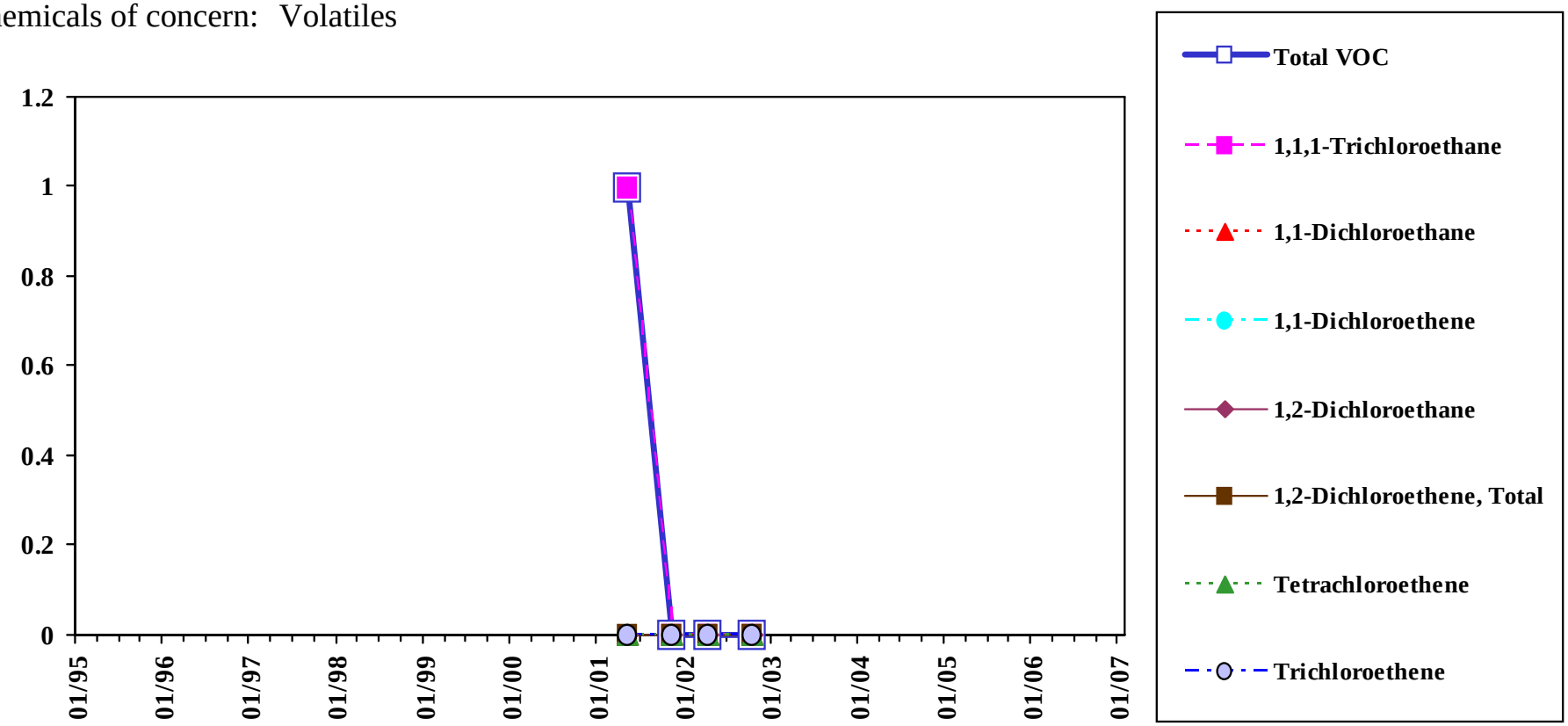
Sample Location:

MW-1104

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

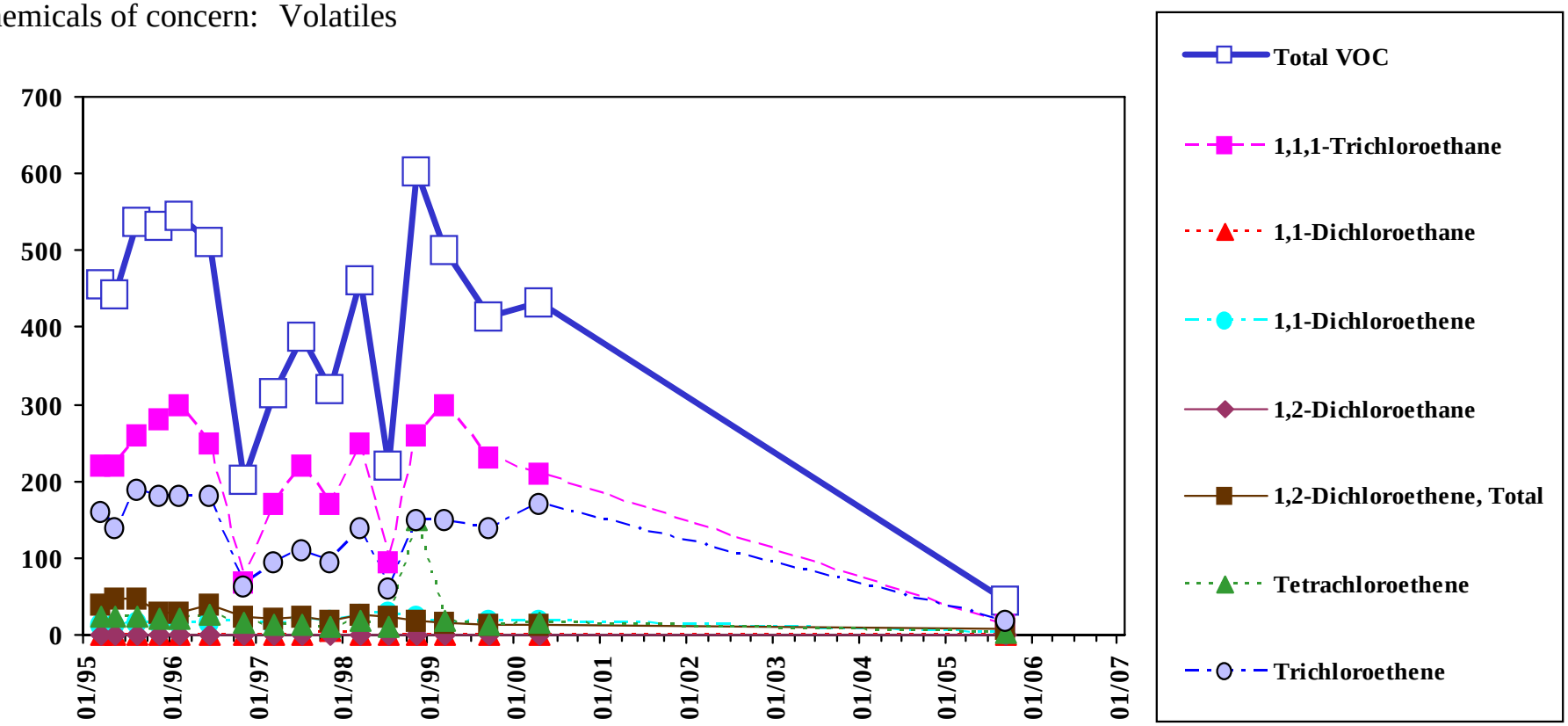
Sample Location:

MW-205

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

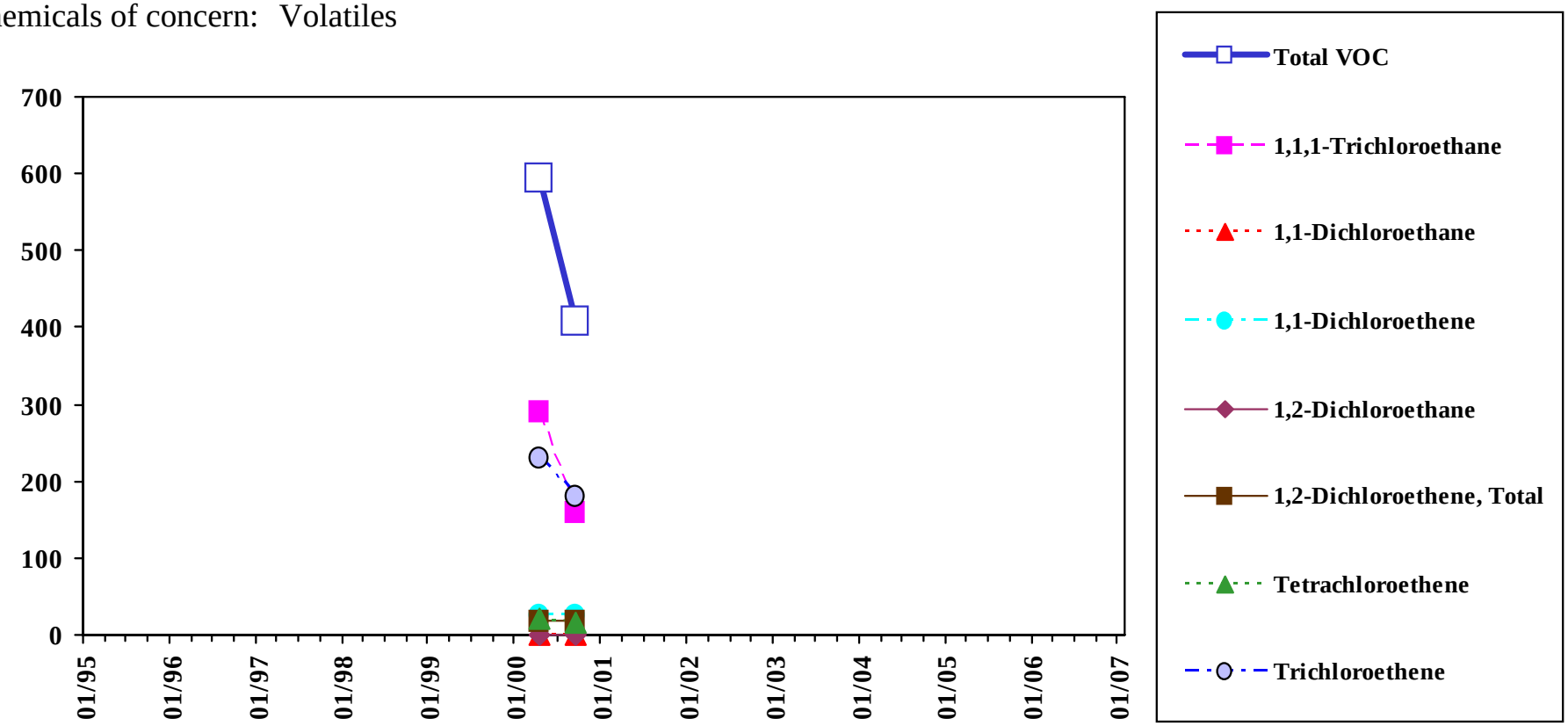
Sample Location:

MW-205

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

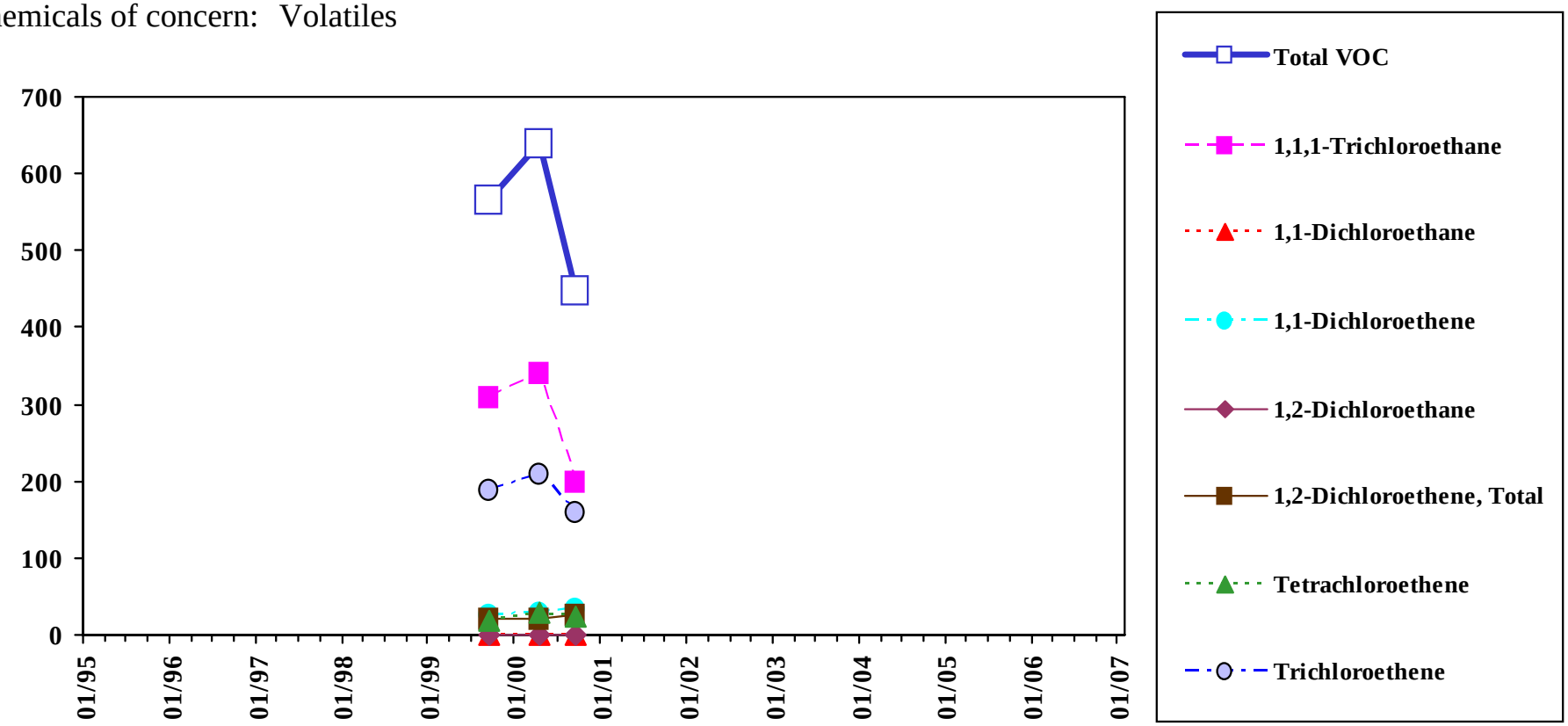
Sample Location:

MW-205

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

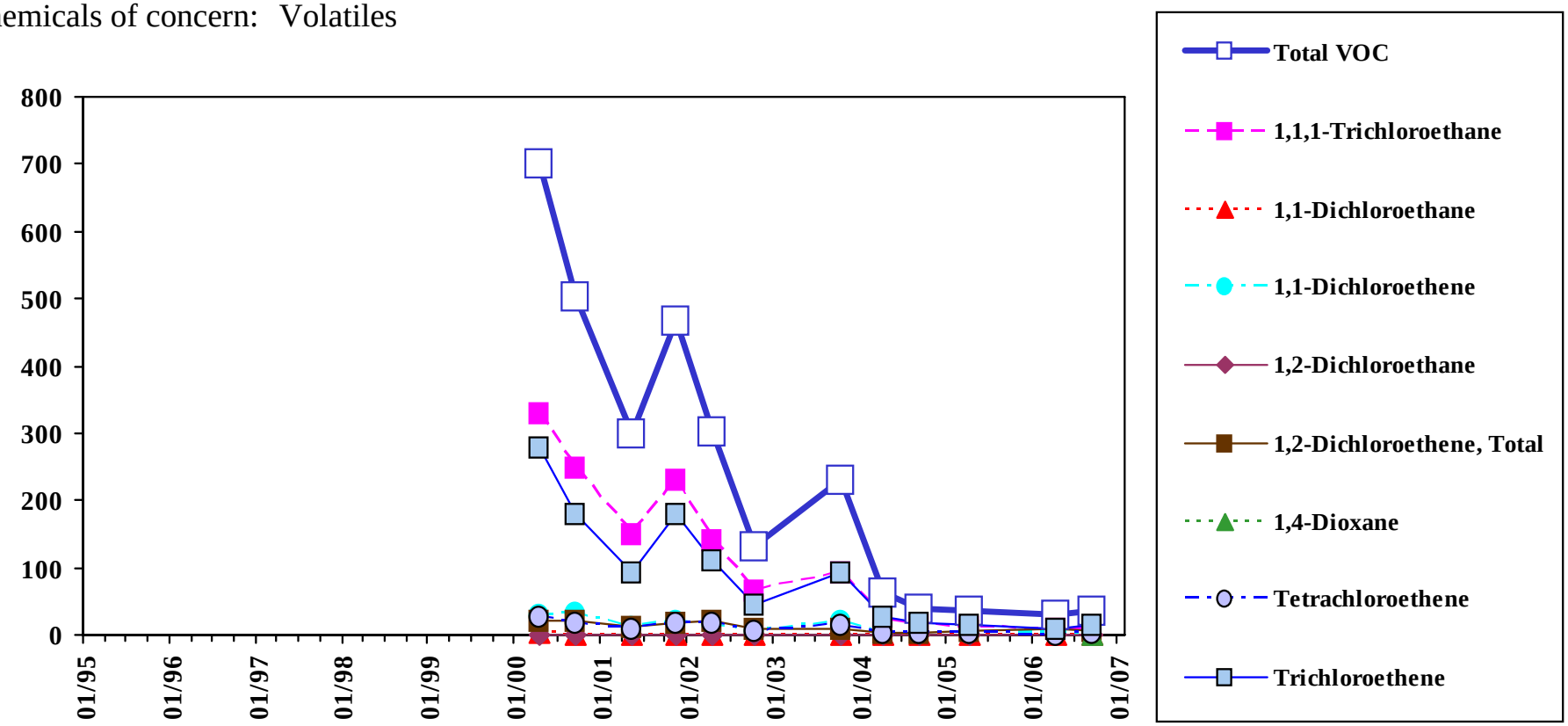
Sample Location:

MW-205

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

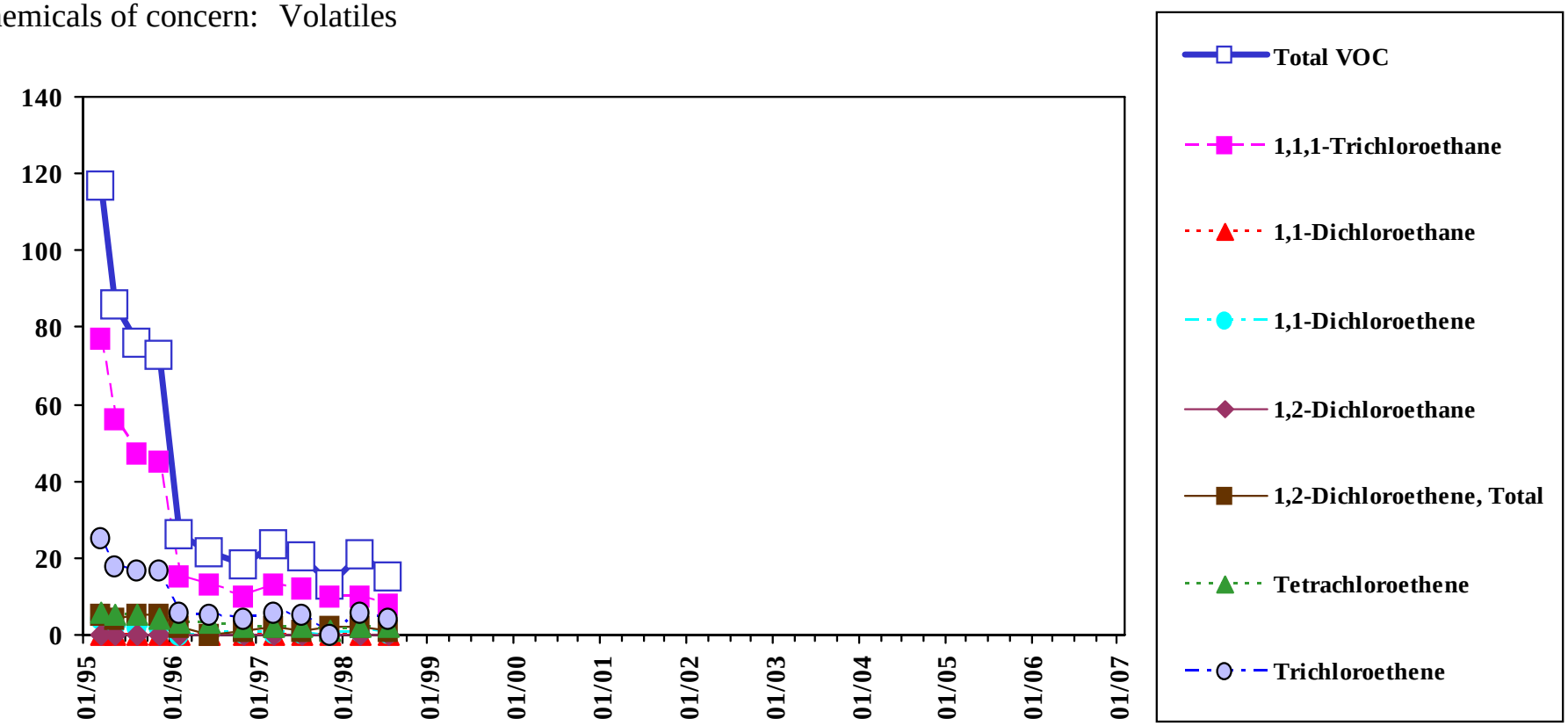
Sample Location:

MW-206A

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

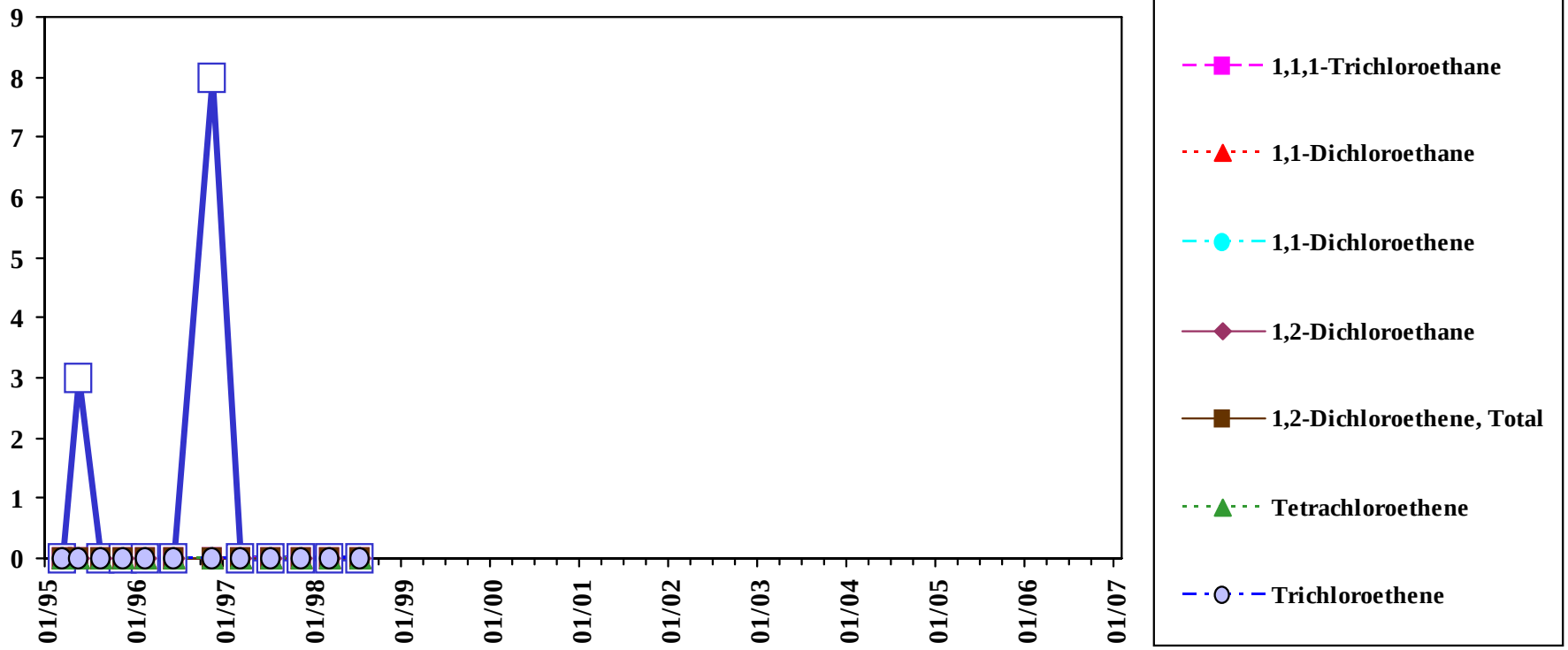
Sample Location:

MW-206B

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

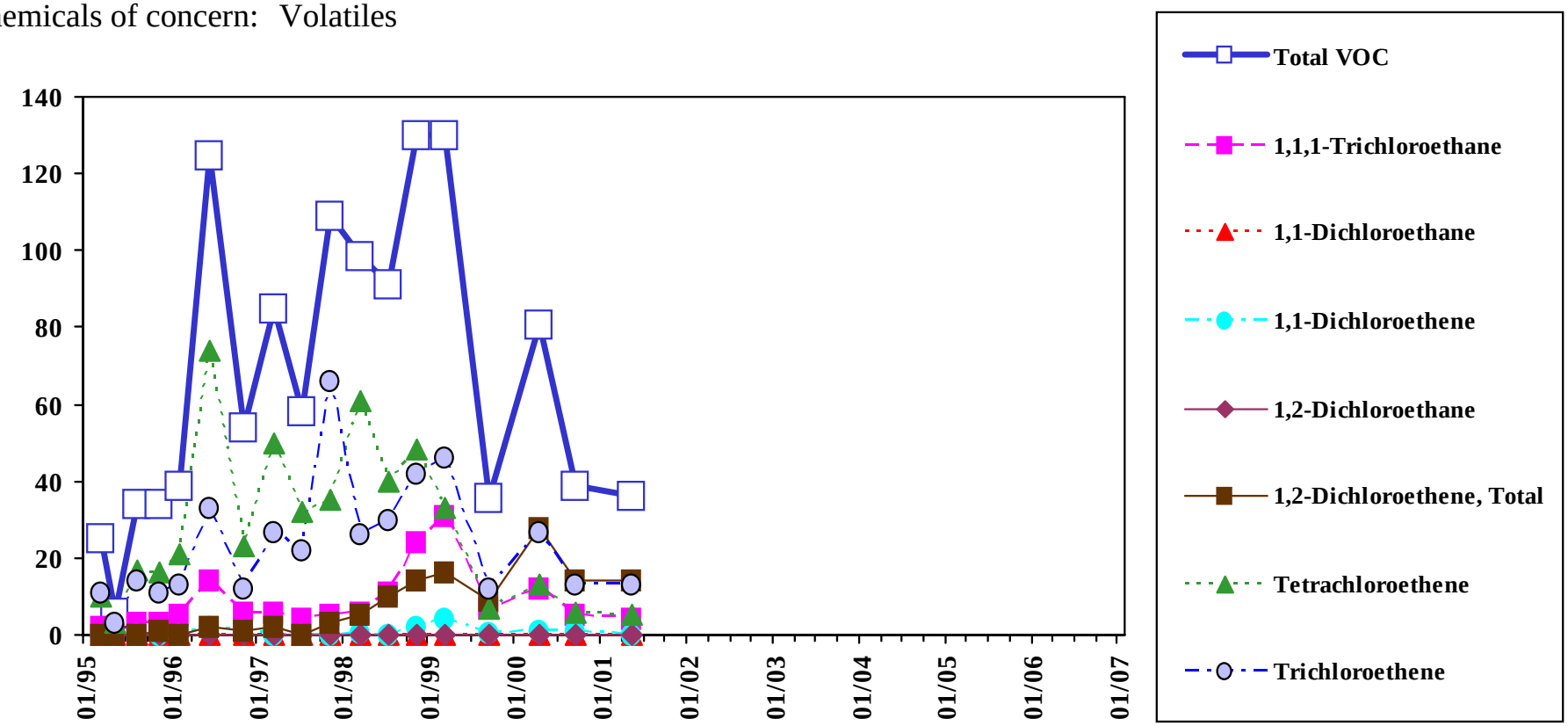
Sample Location:

MW-207A

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

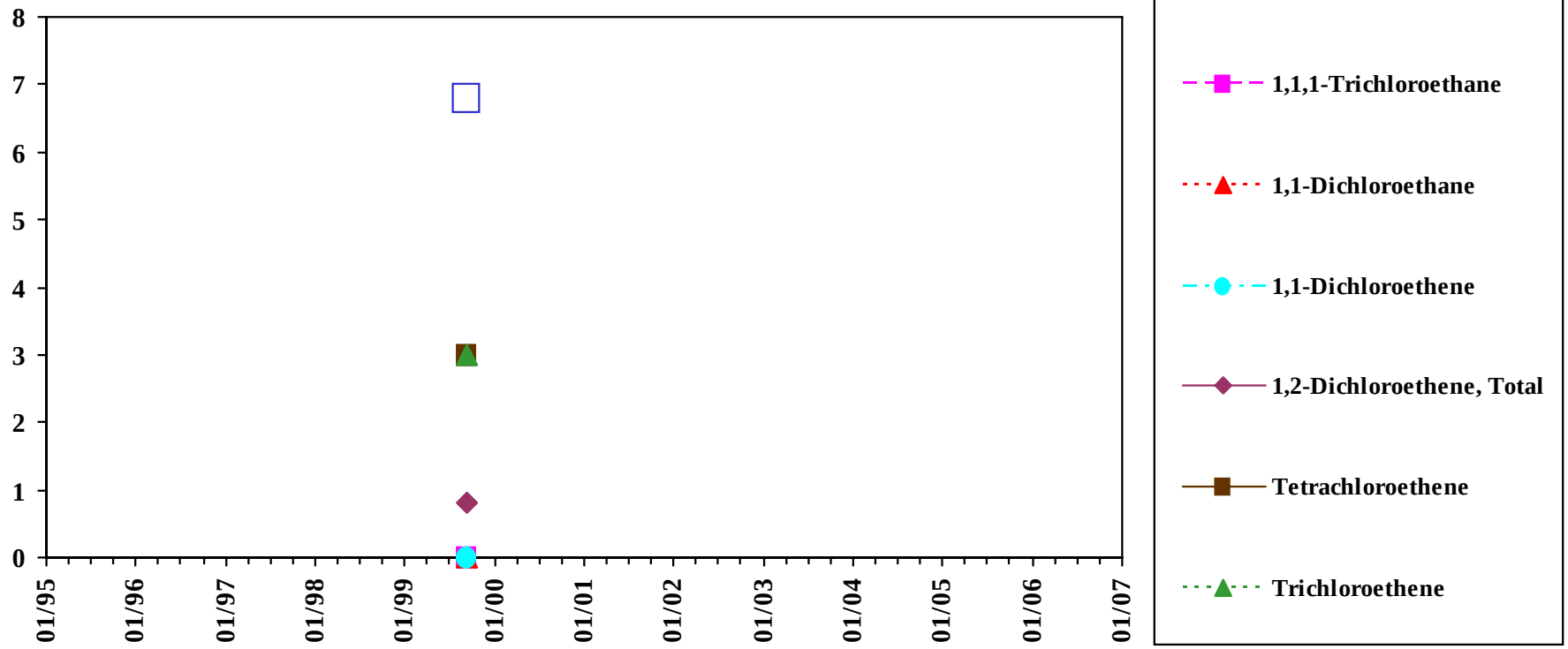
Sample Location:

MW-207A

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

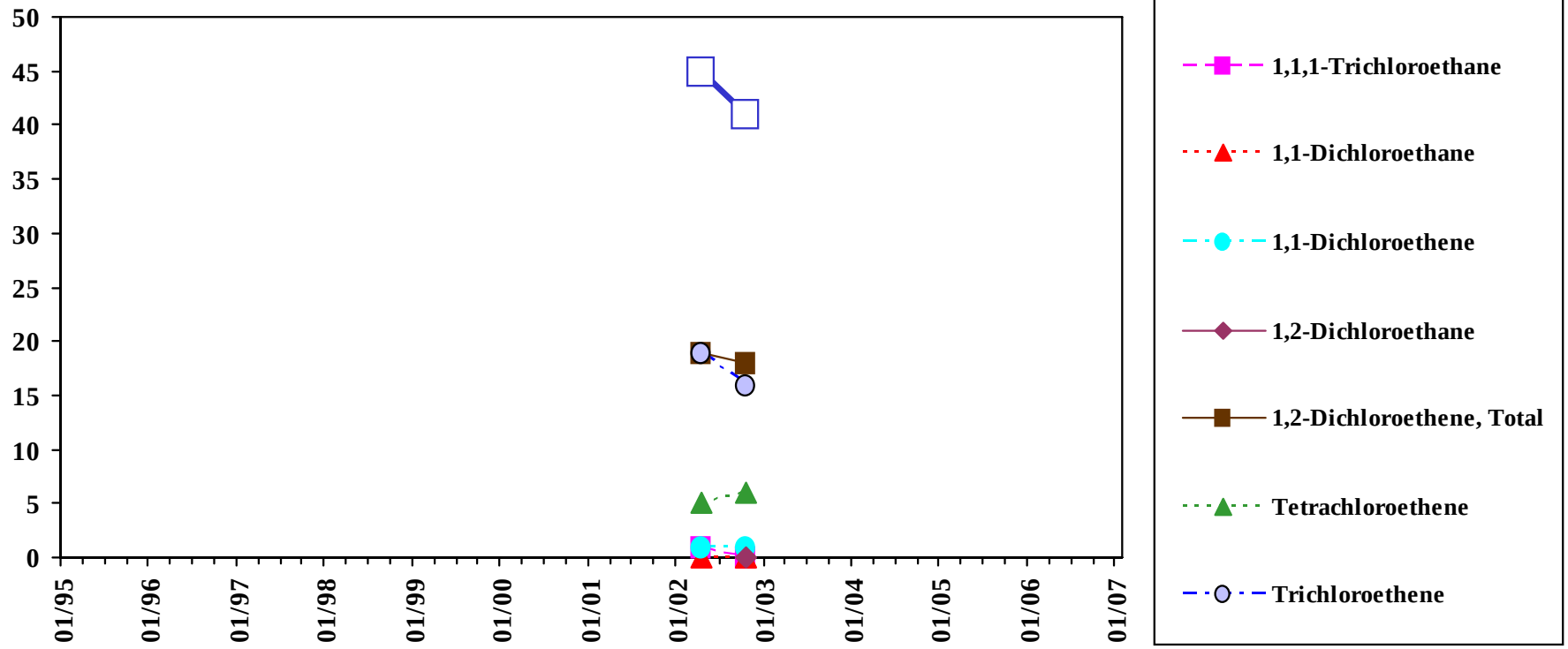
Sample Location:

MW-207AR

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

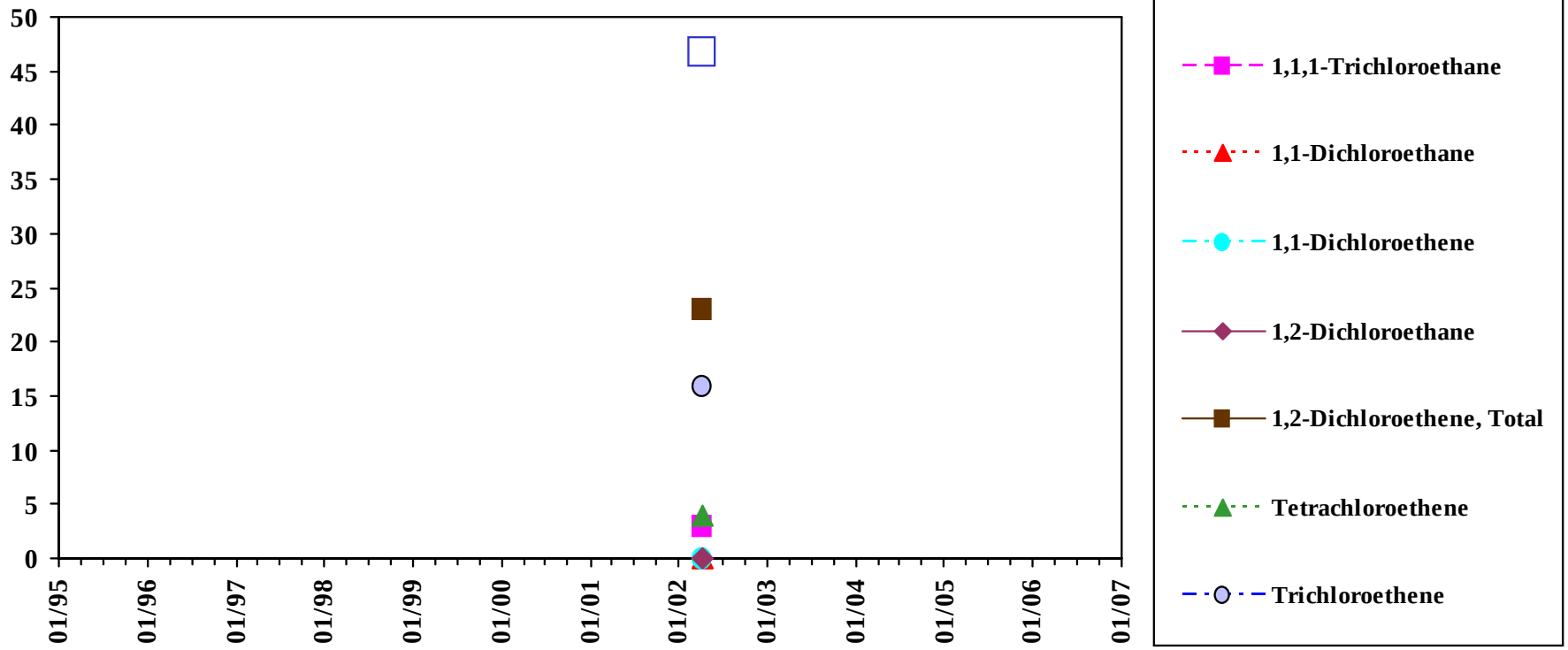
Sample Location:

MW-207AR

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

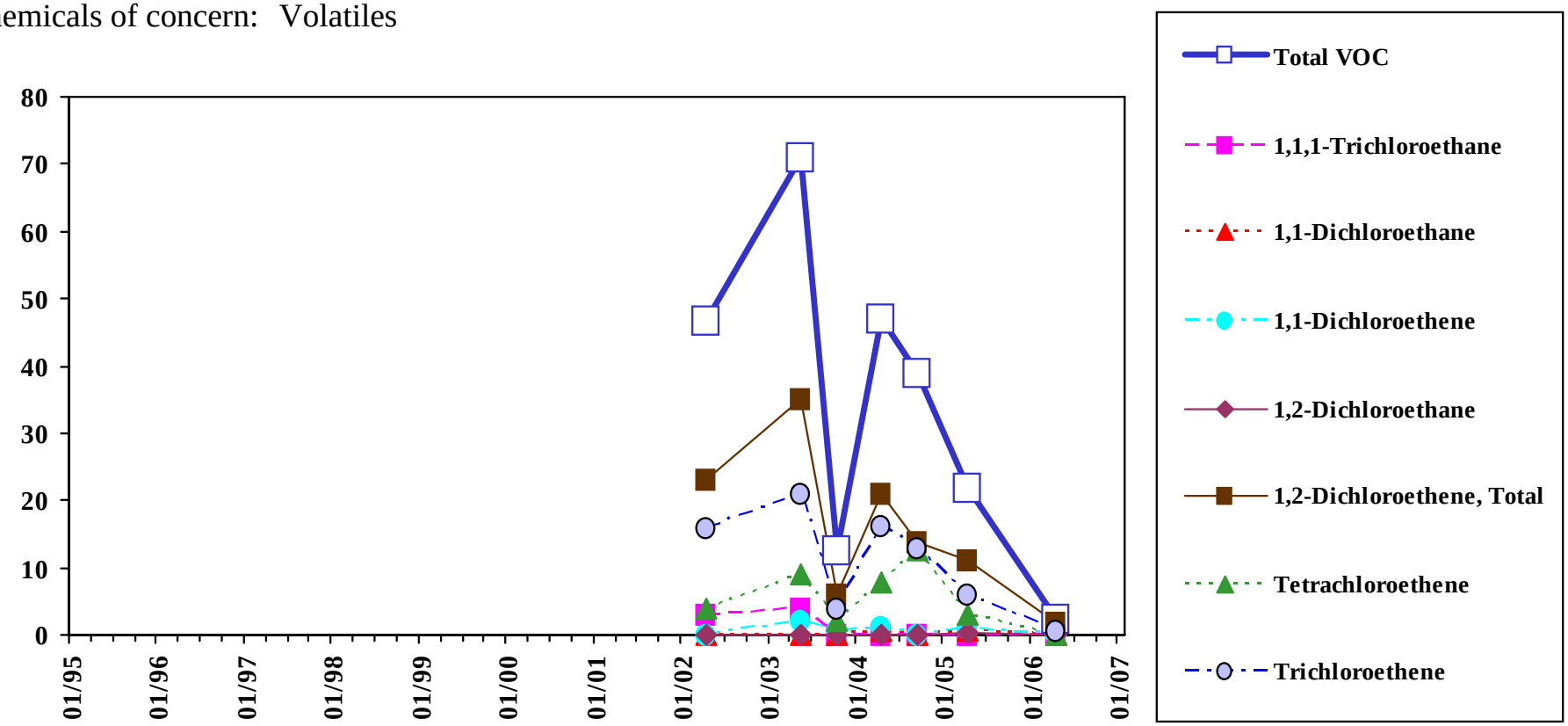
Sample Location:

MW-207AR

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

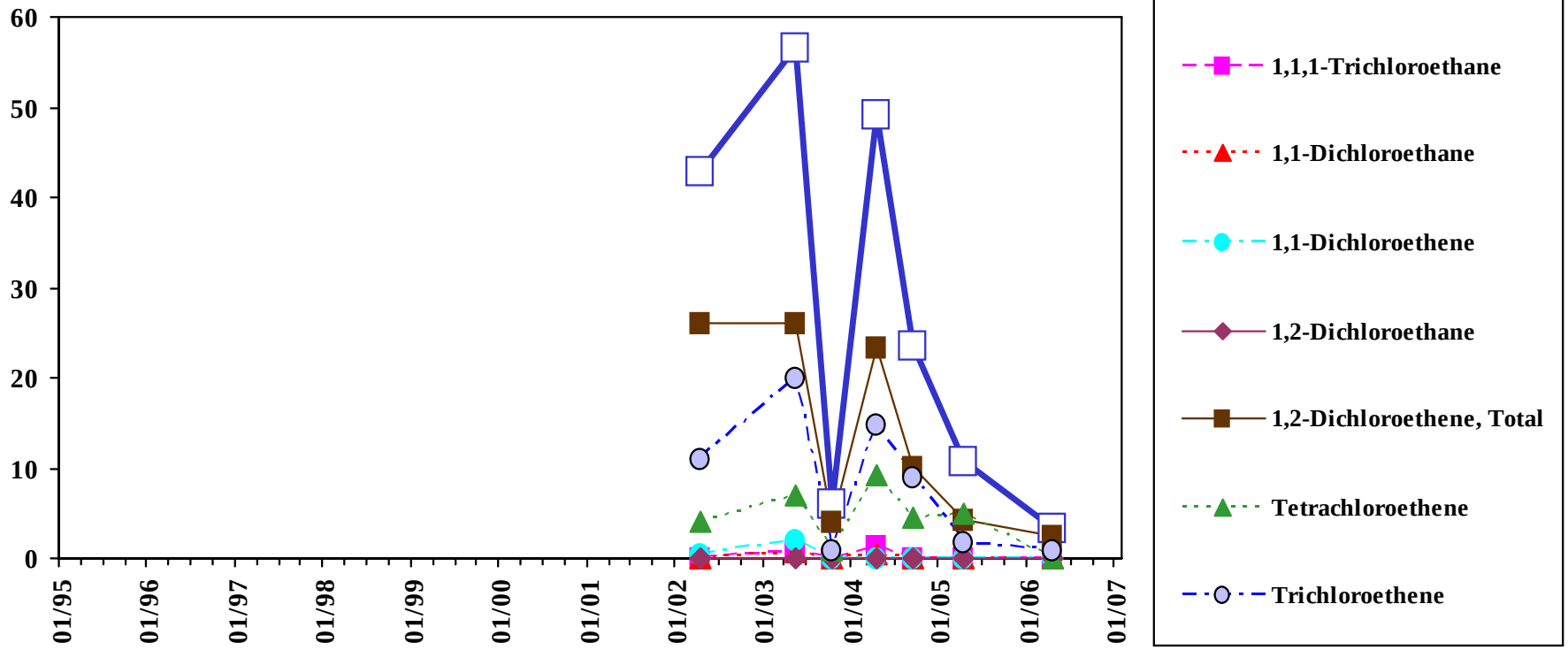
Sample Location:

MW-207AR

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

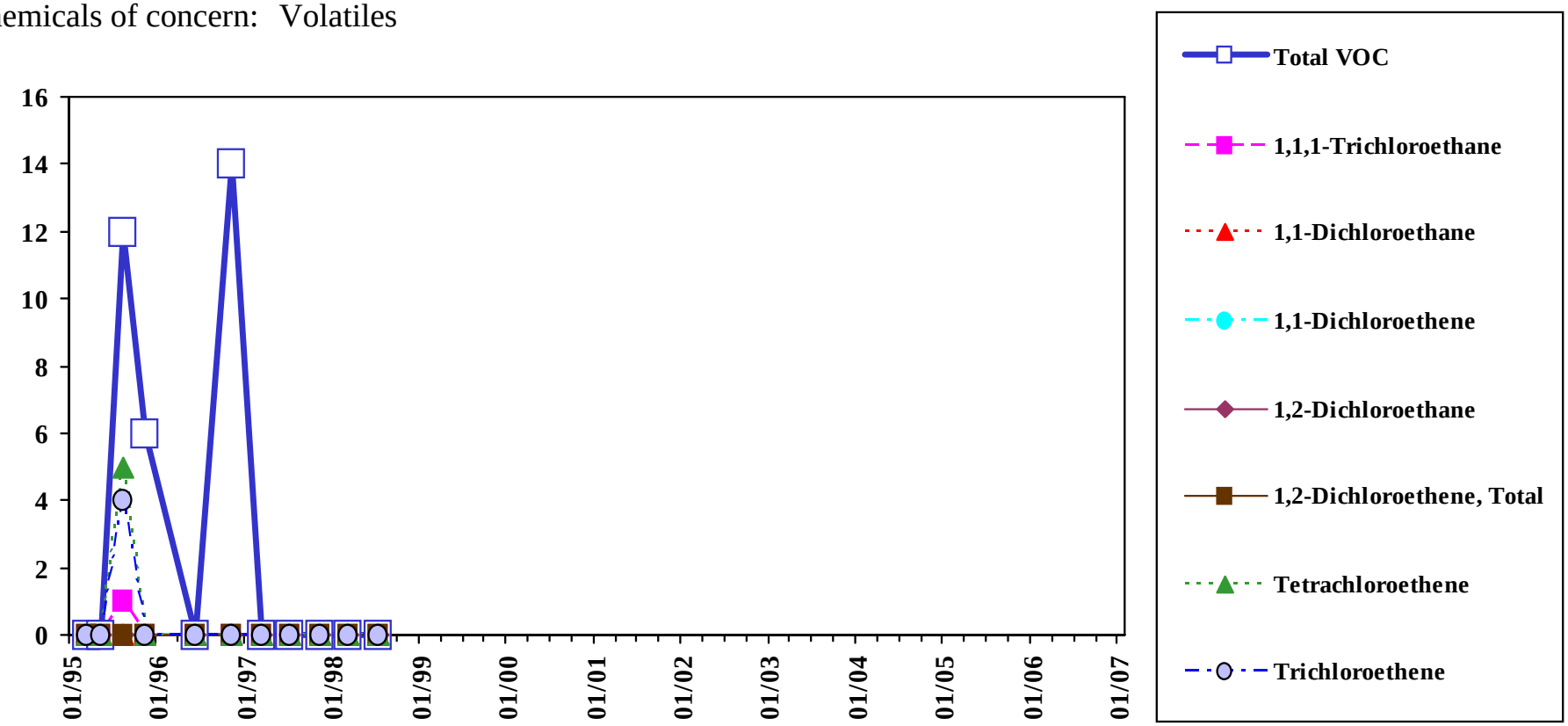
Sample Location:

MW-207B

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

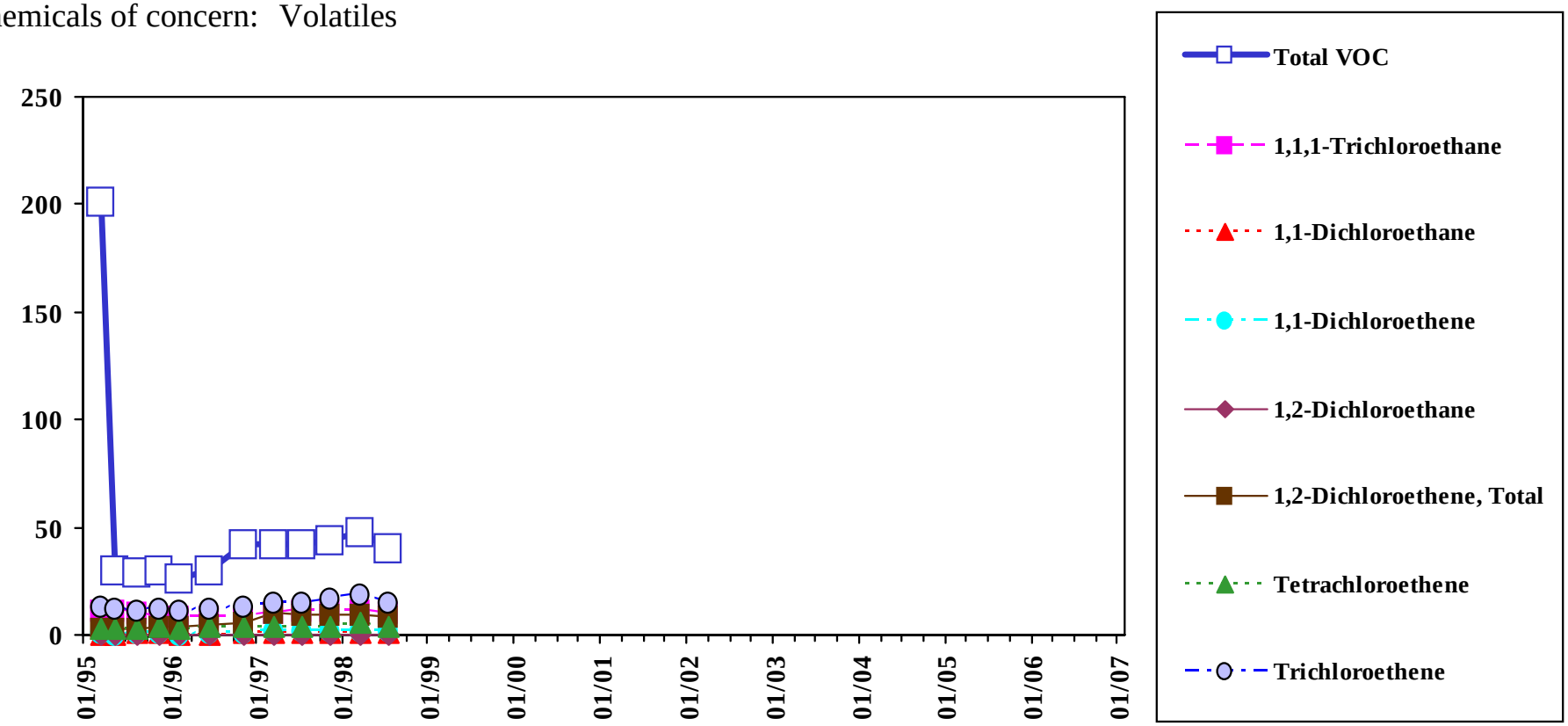
Sample Location:

MW-208

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

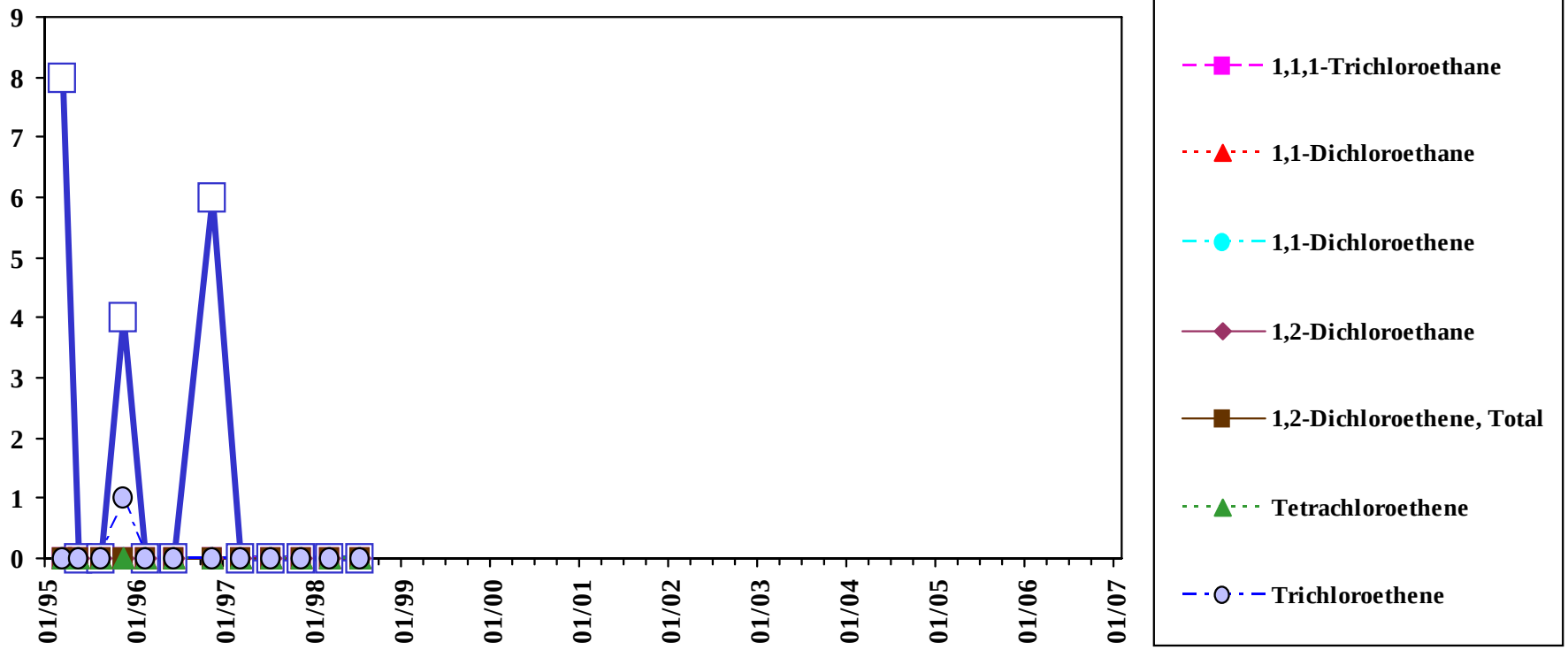
Sample Location:

MW-209

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

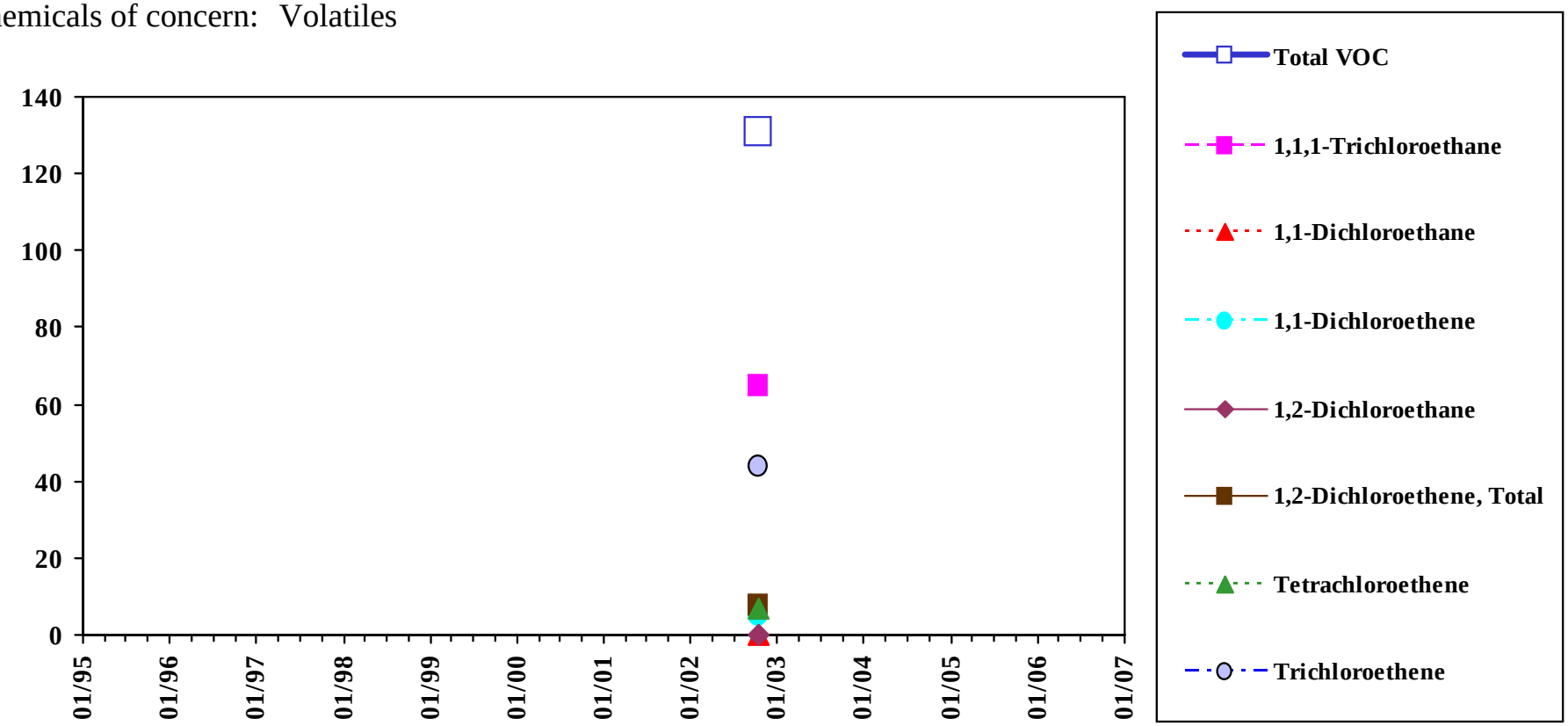
Sample Location:

MW-209

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

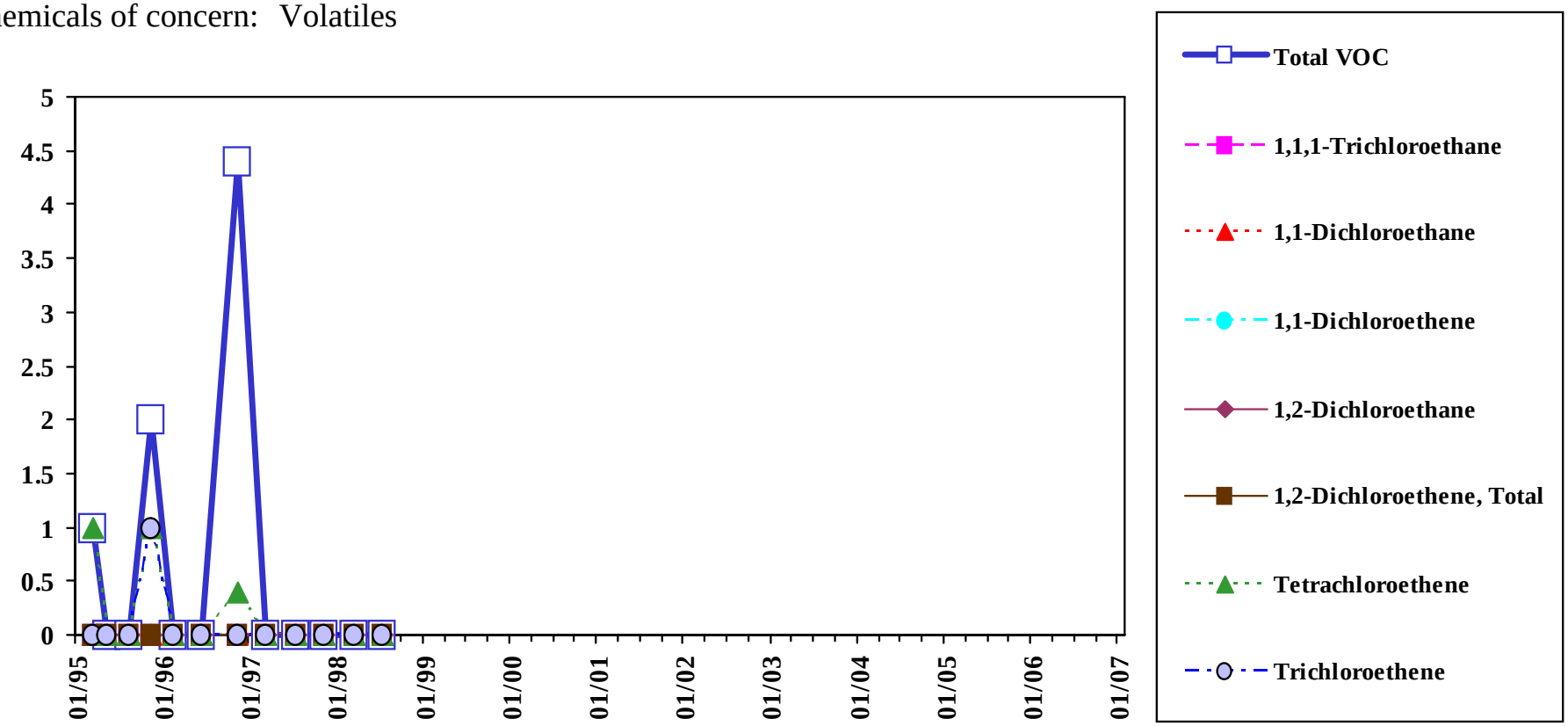
Sample Location:

MW-222

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

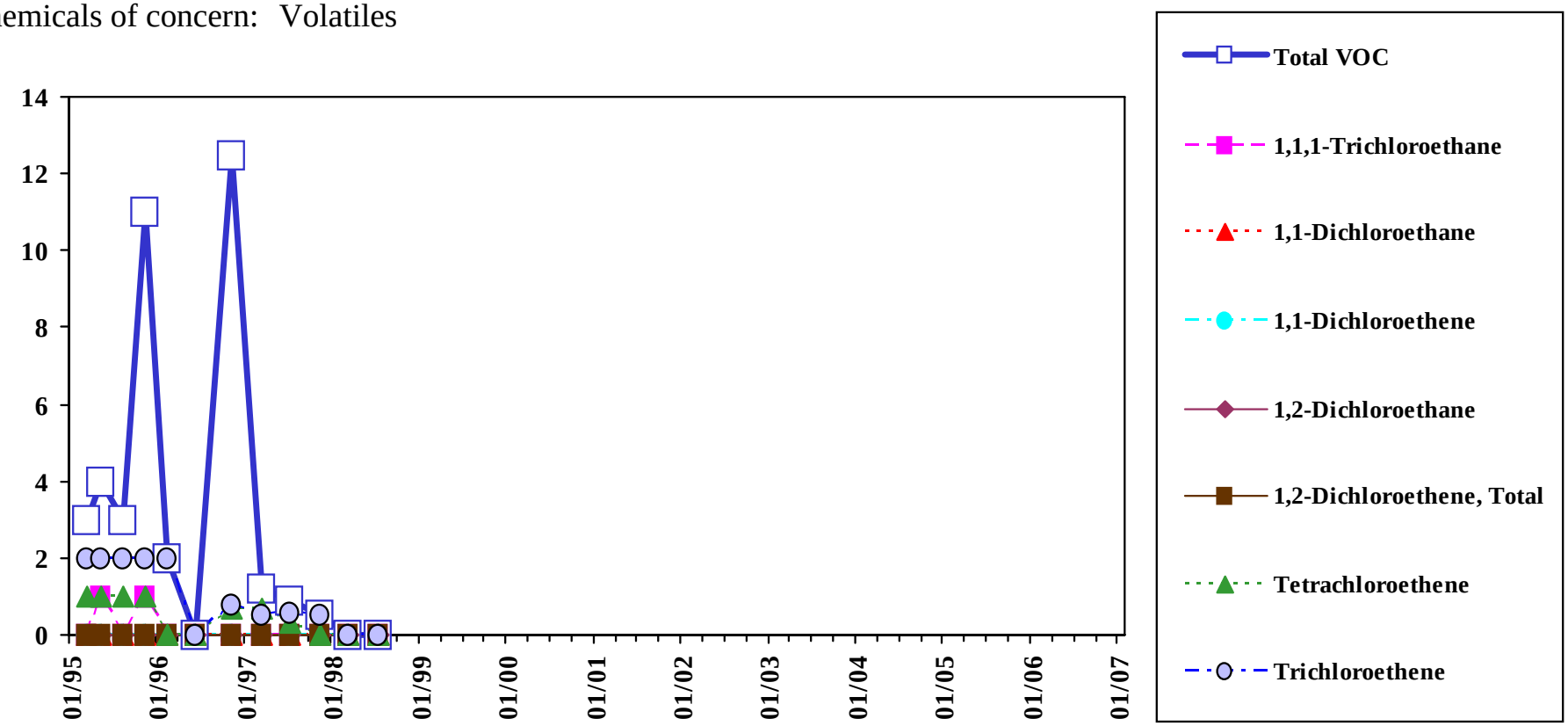
Sample Location:

MW-223

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

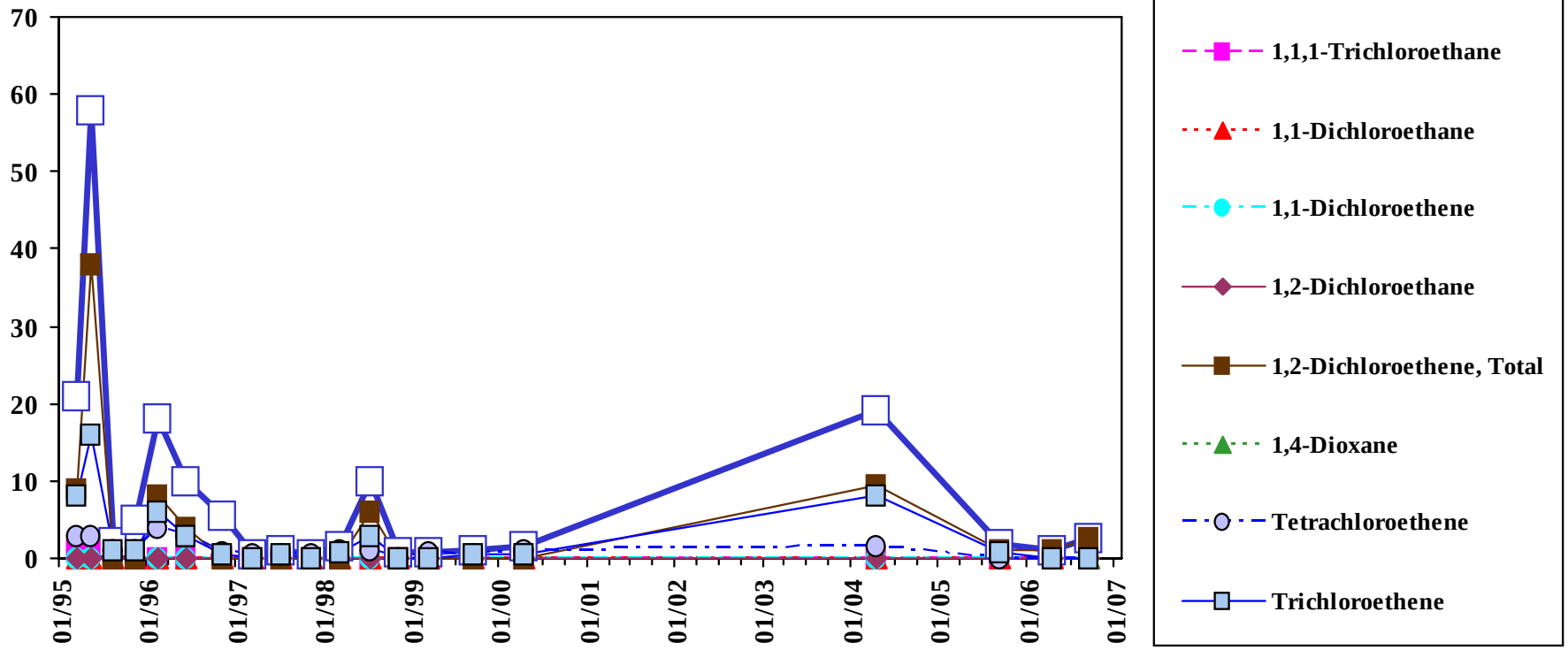
Sample Location:

MW-224

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

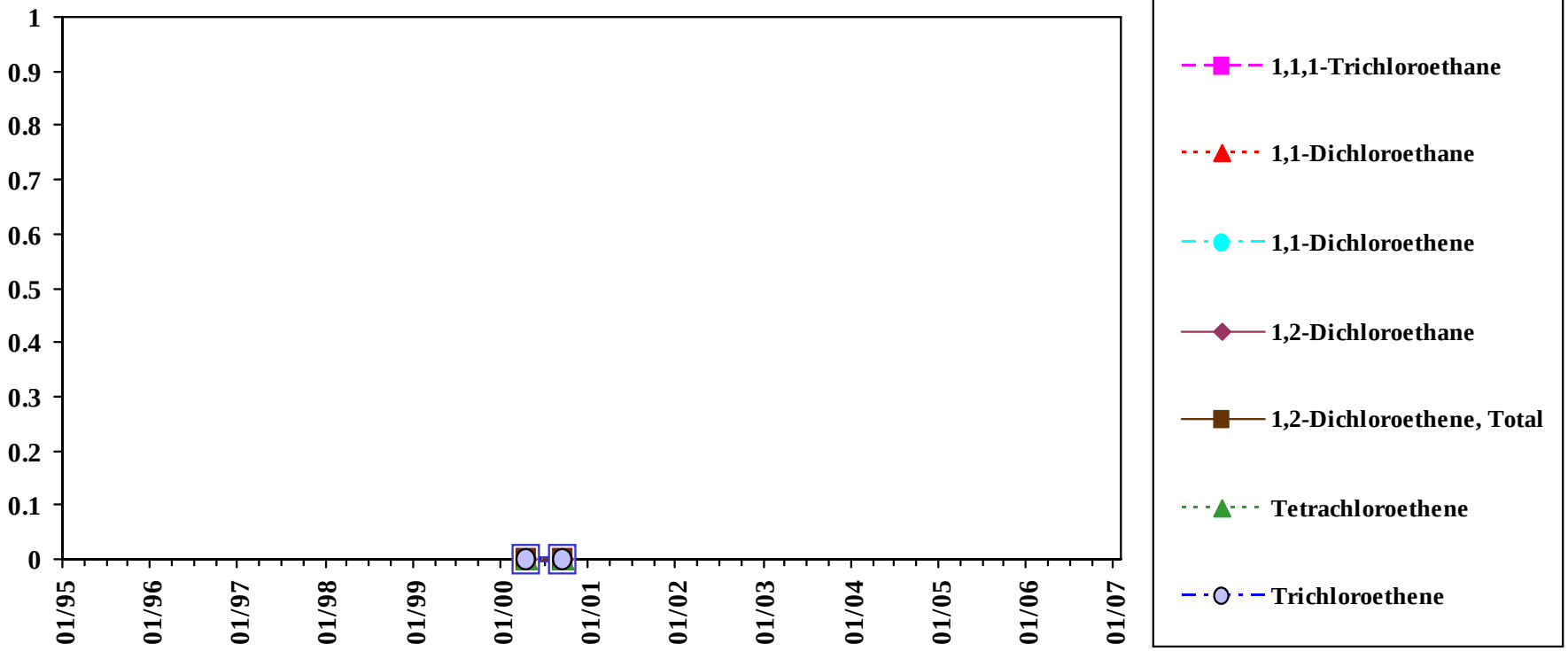
Sample Location:

MW-224

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

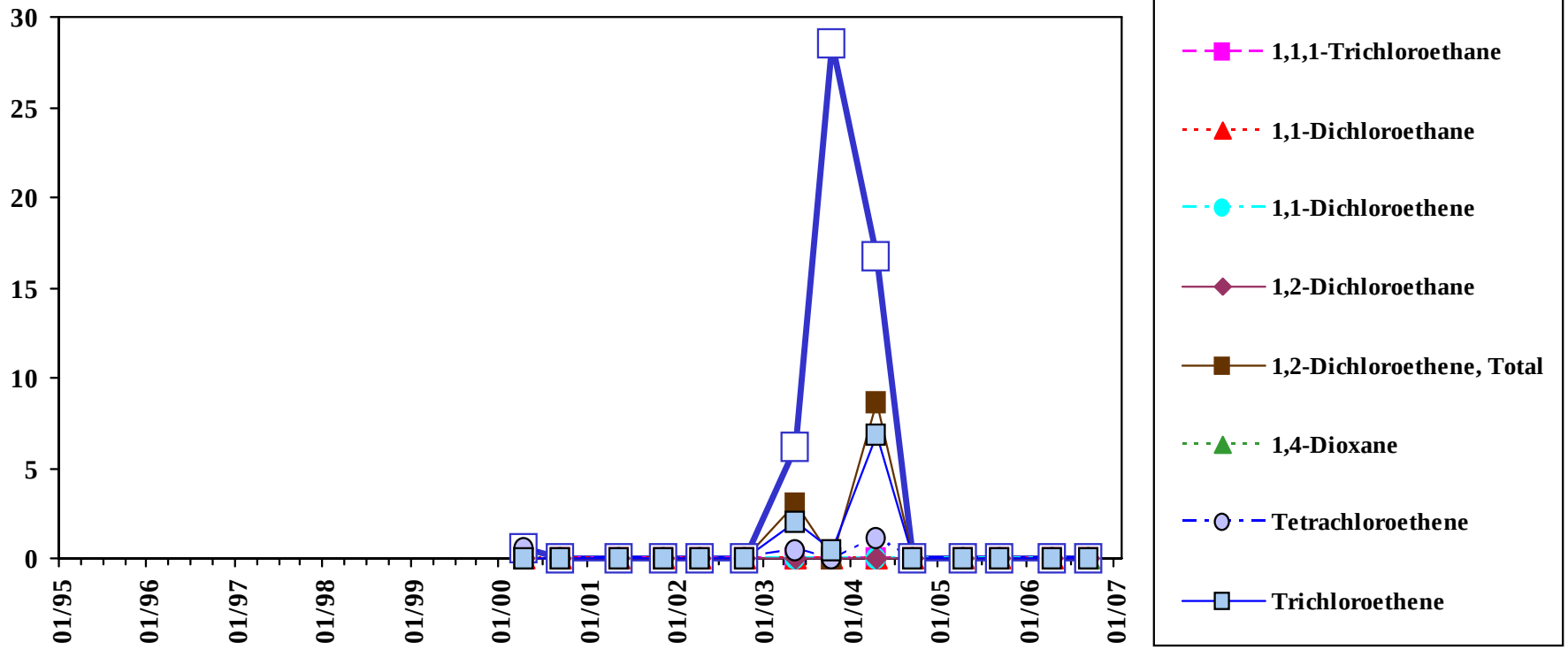
Sample Location:

MW-224

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

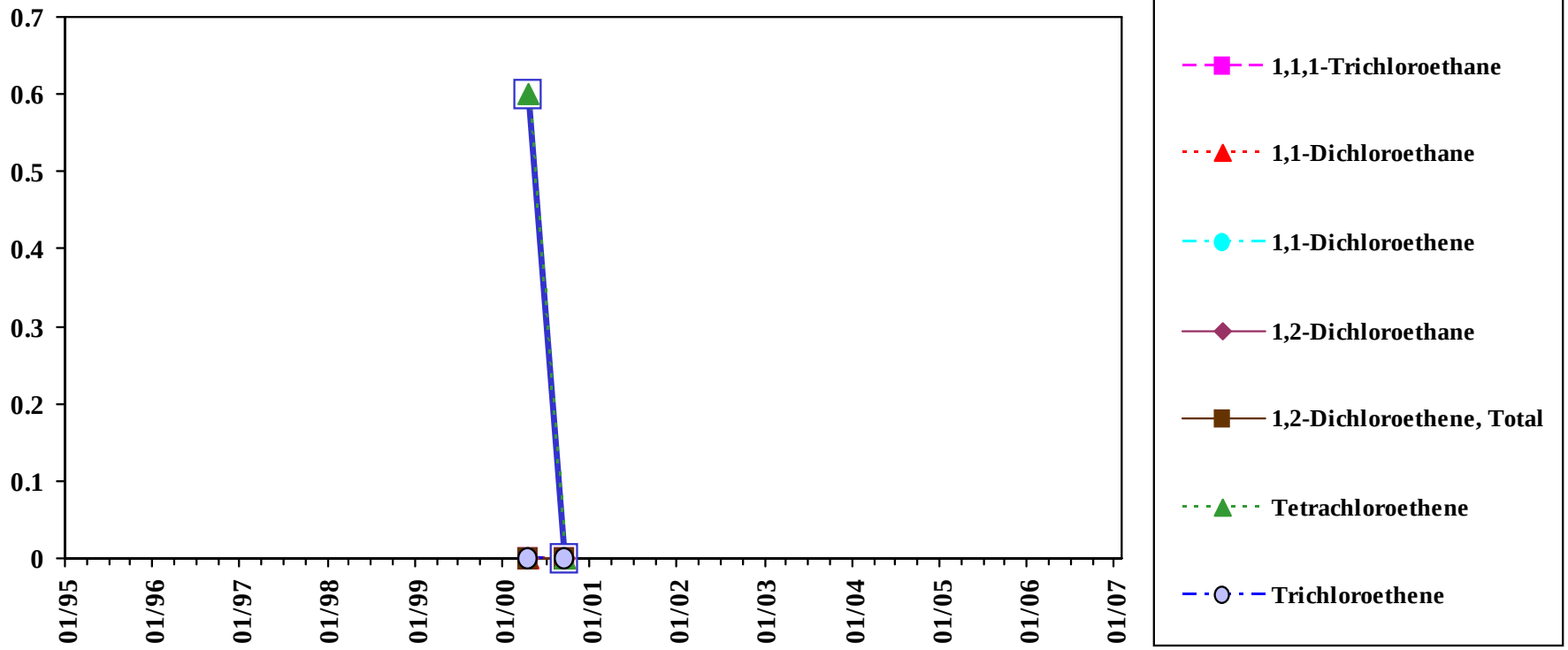
Sample Location:

MW-224

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

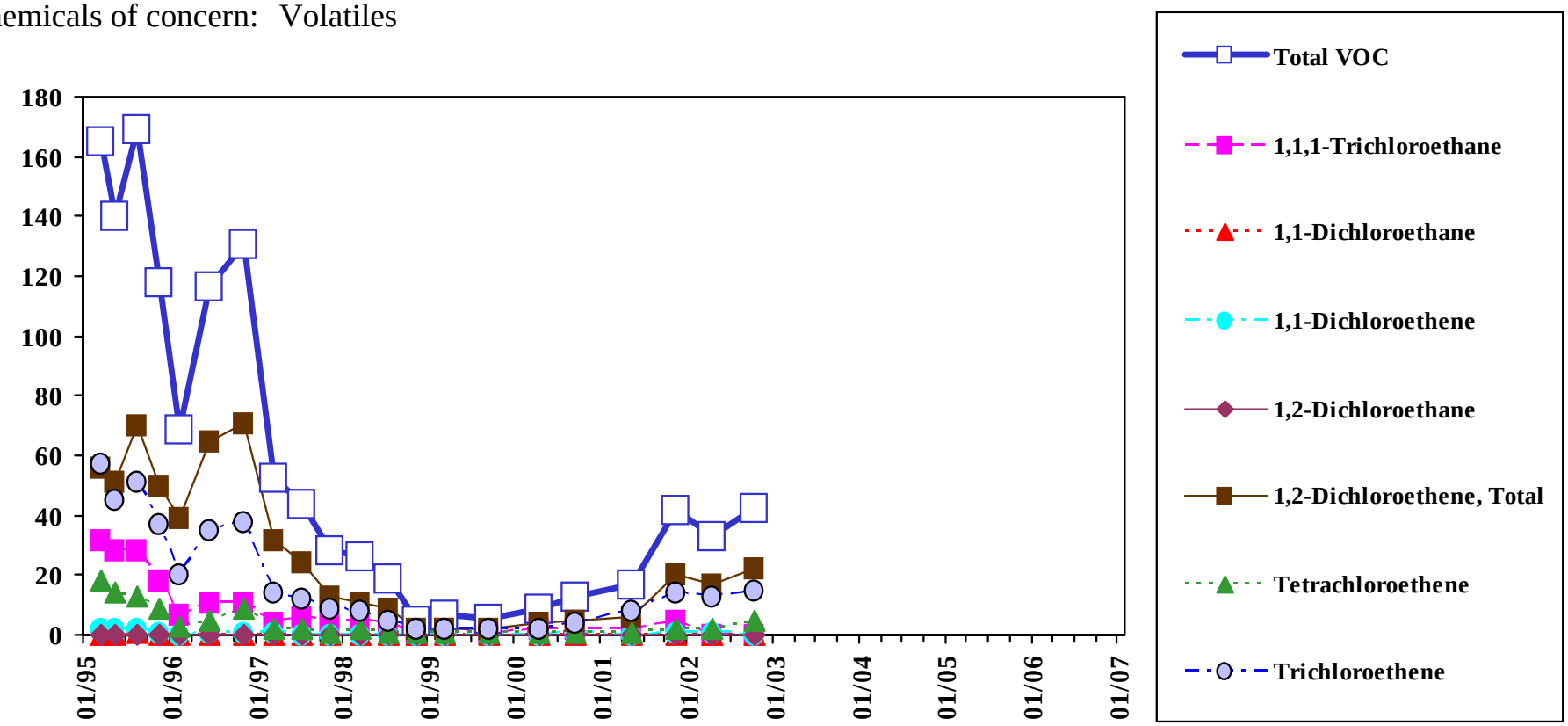
Sample Location:

MW-225A

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

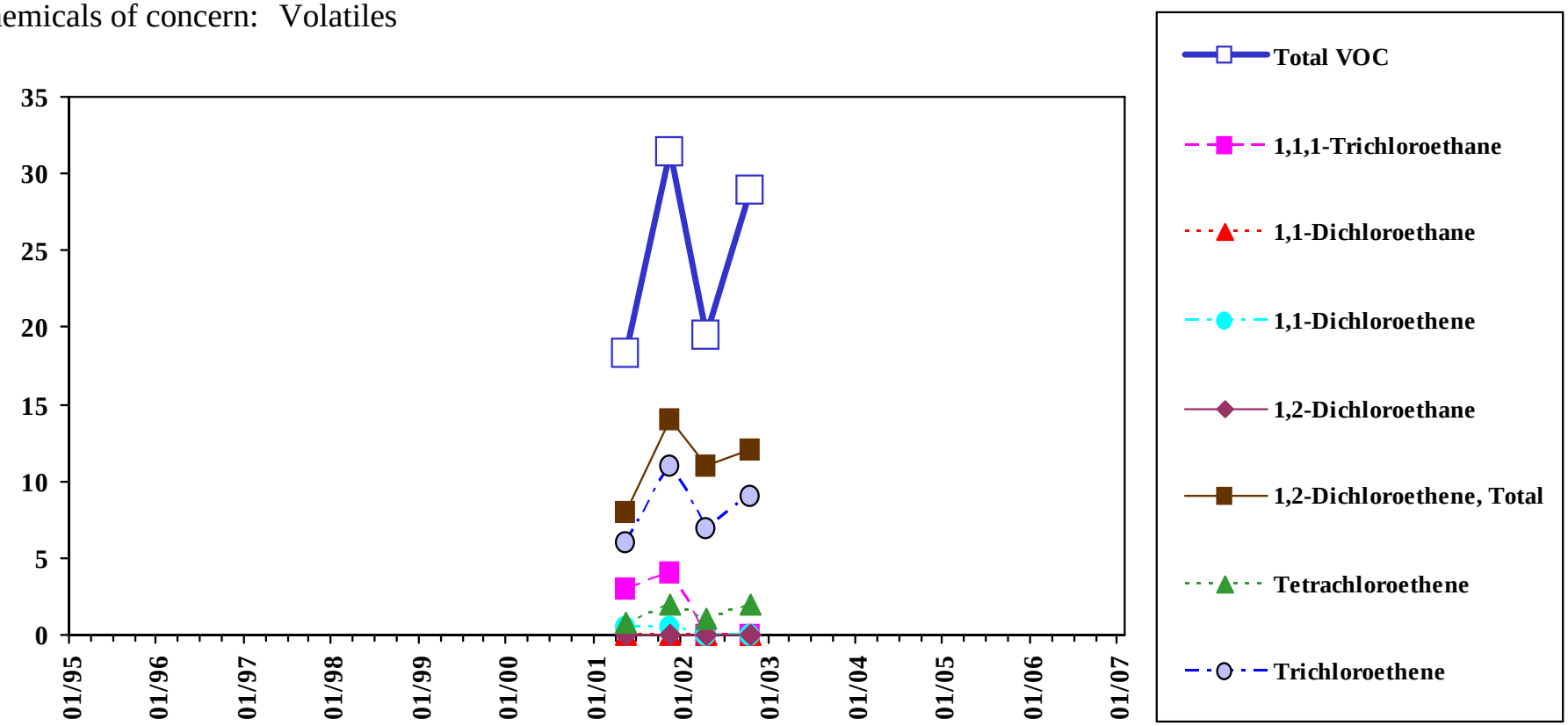
Sample Location:

MW-225A

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

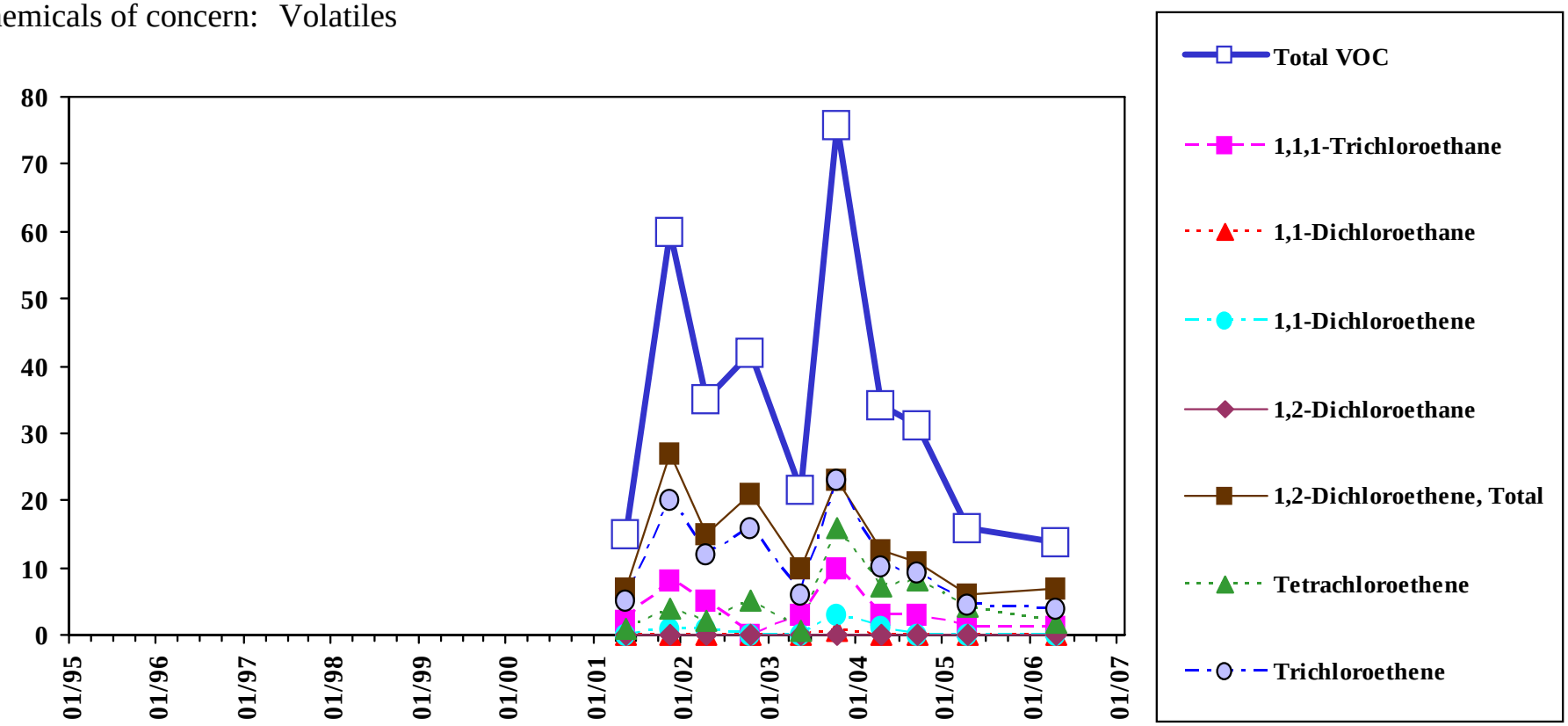
Sample Location:

MW-225A

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

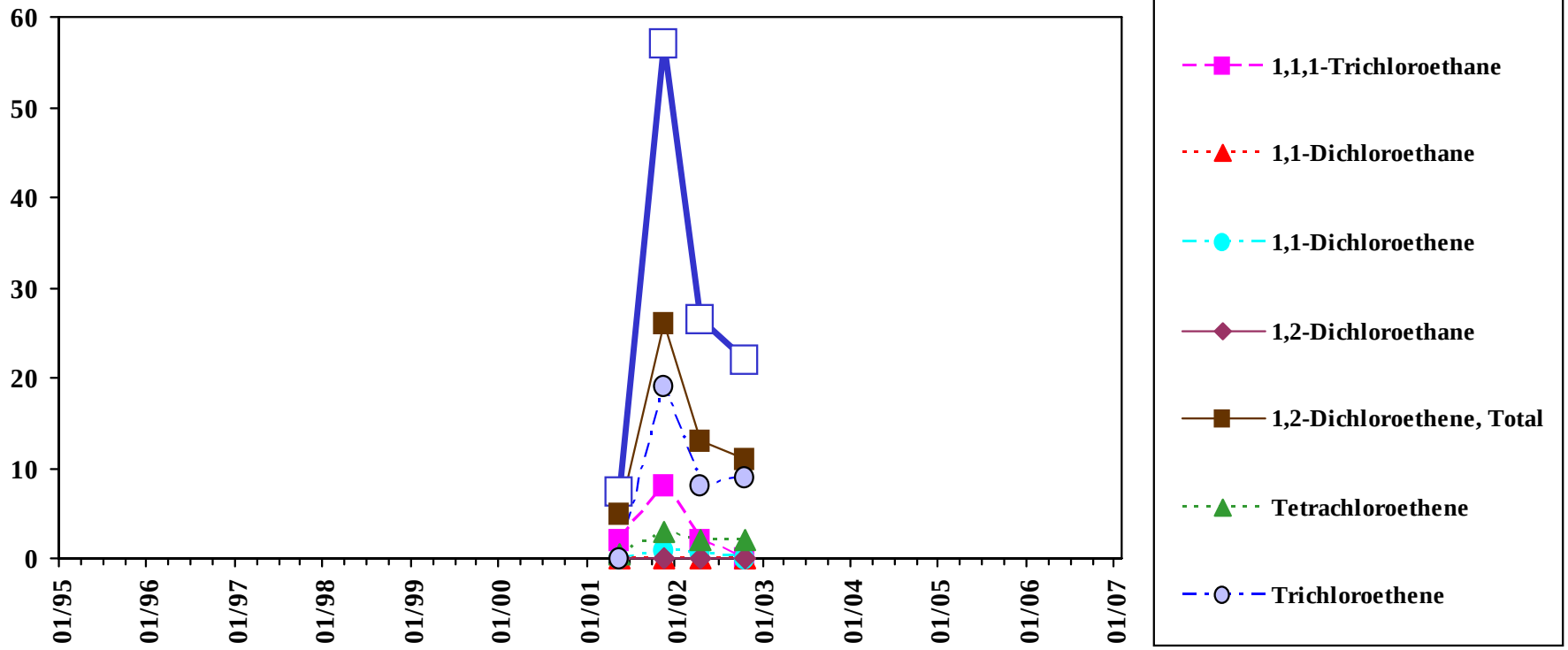
Sample Location:

MW-225A

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

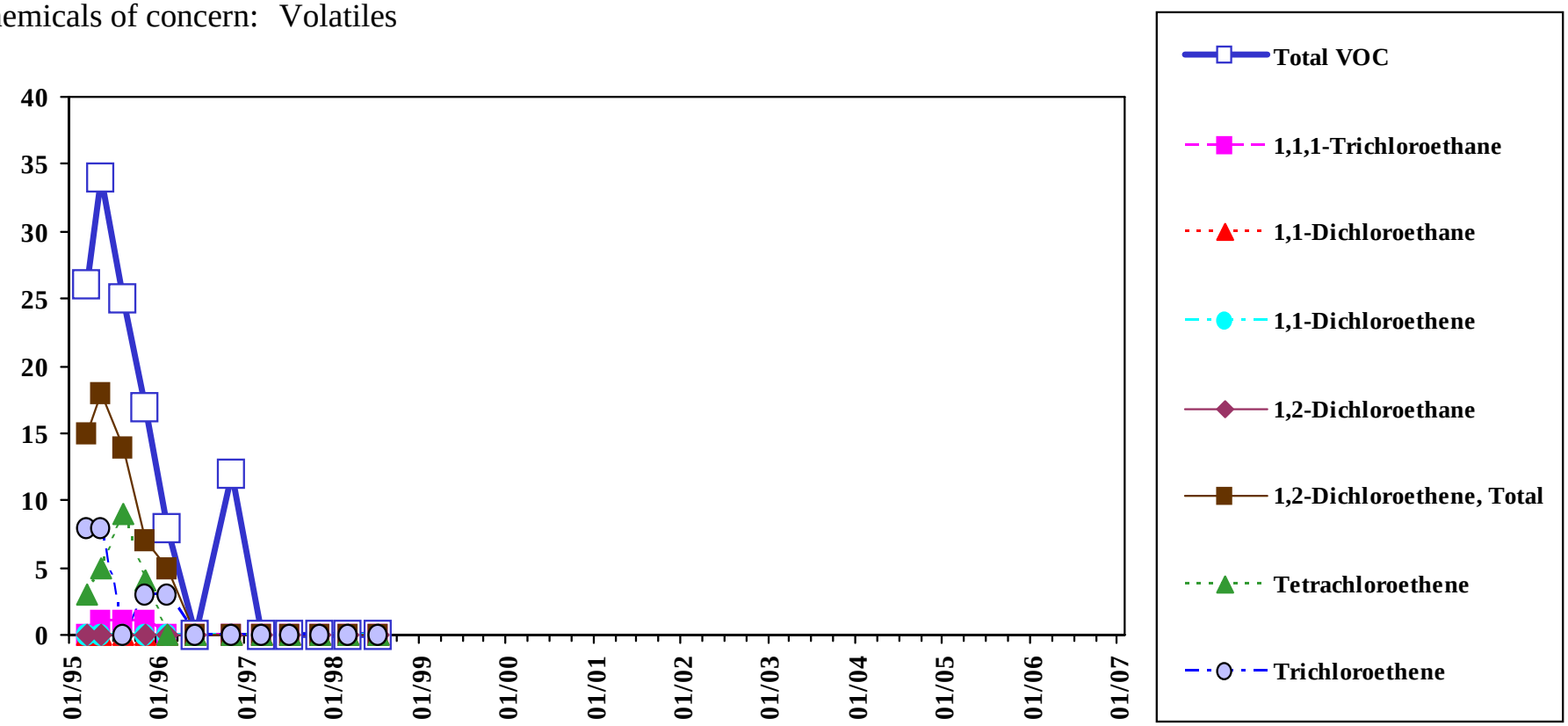
Sample Location:

MW-225B

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

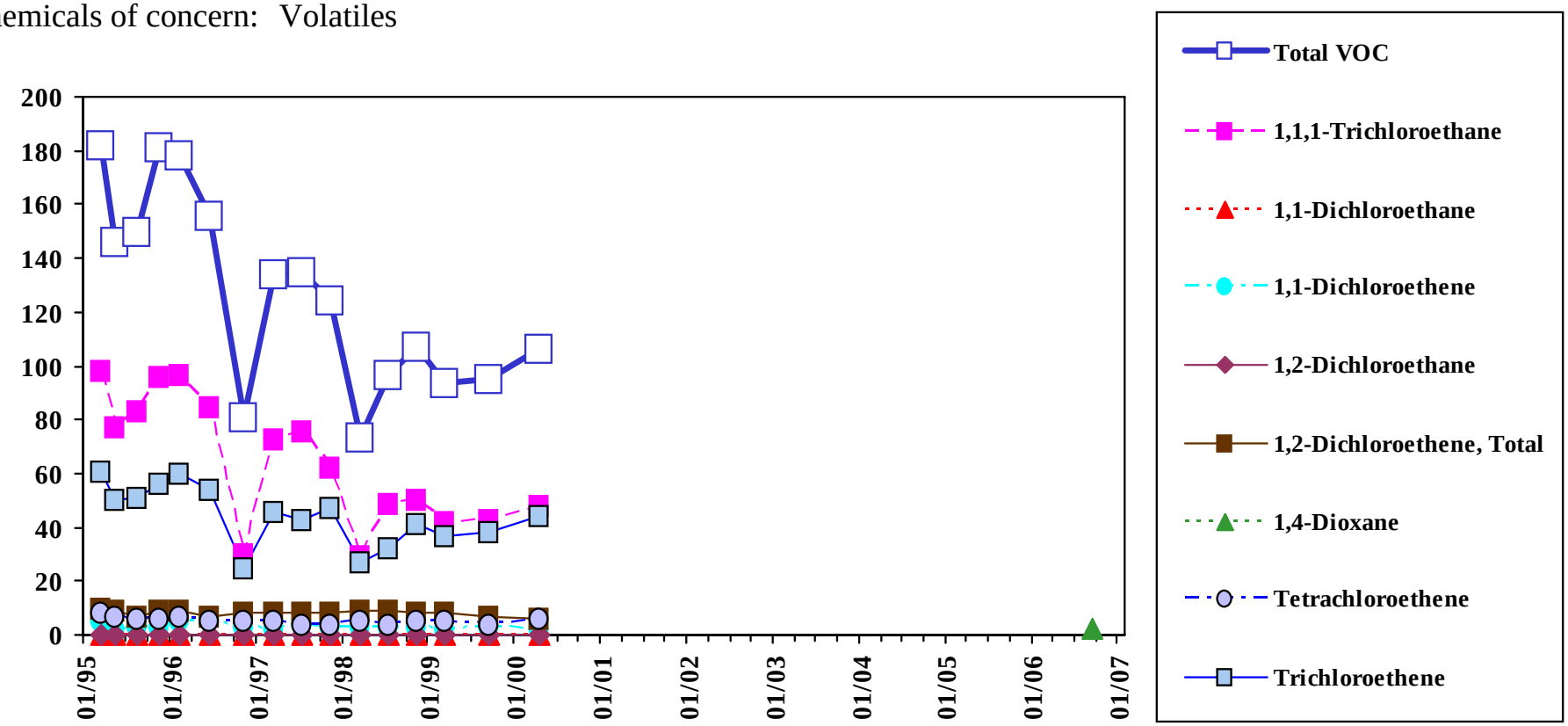
Sample Location:

MW-229A

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

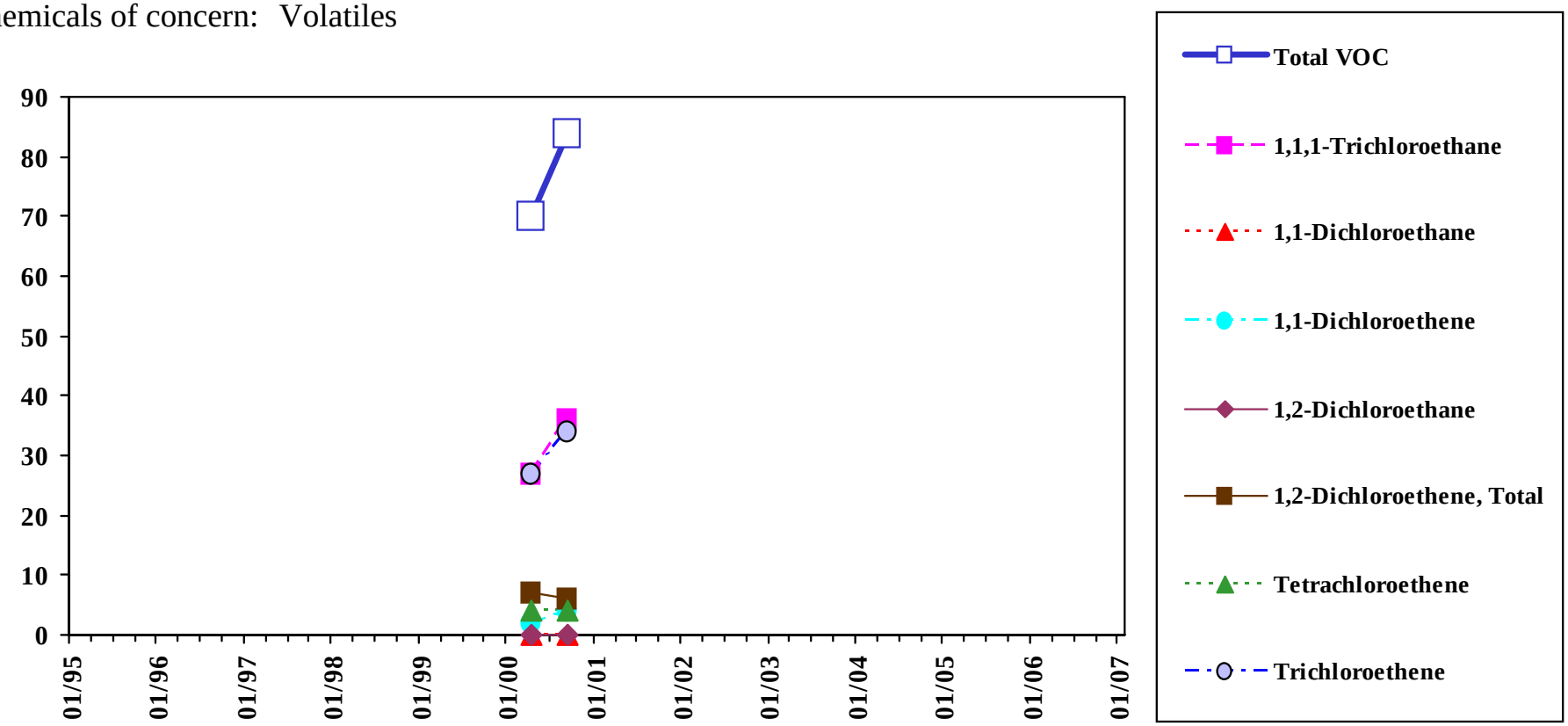
Sample Location:

MW-229A

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

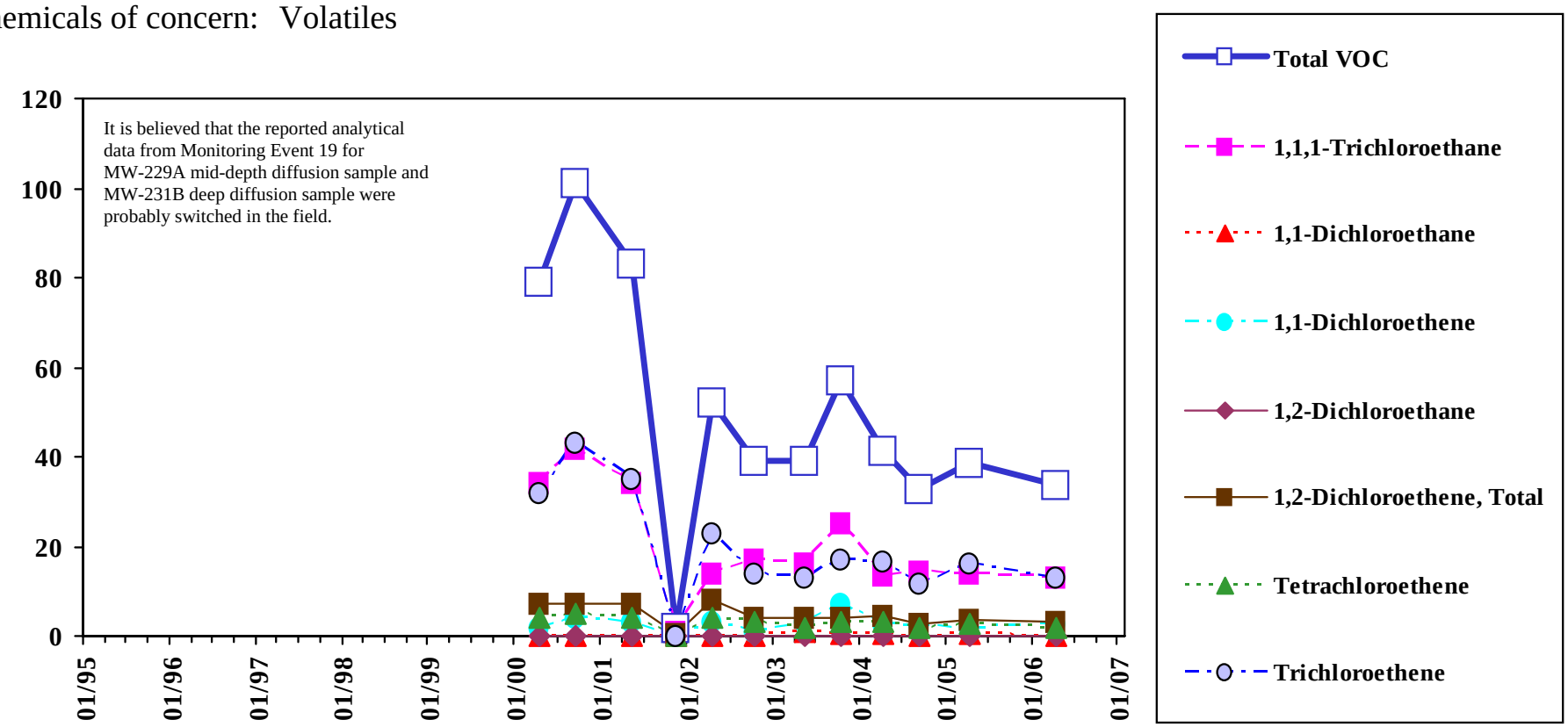
Sample Location:

MW-229A

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

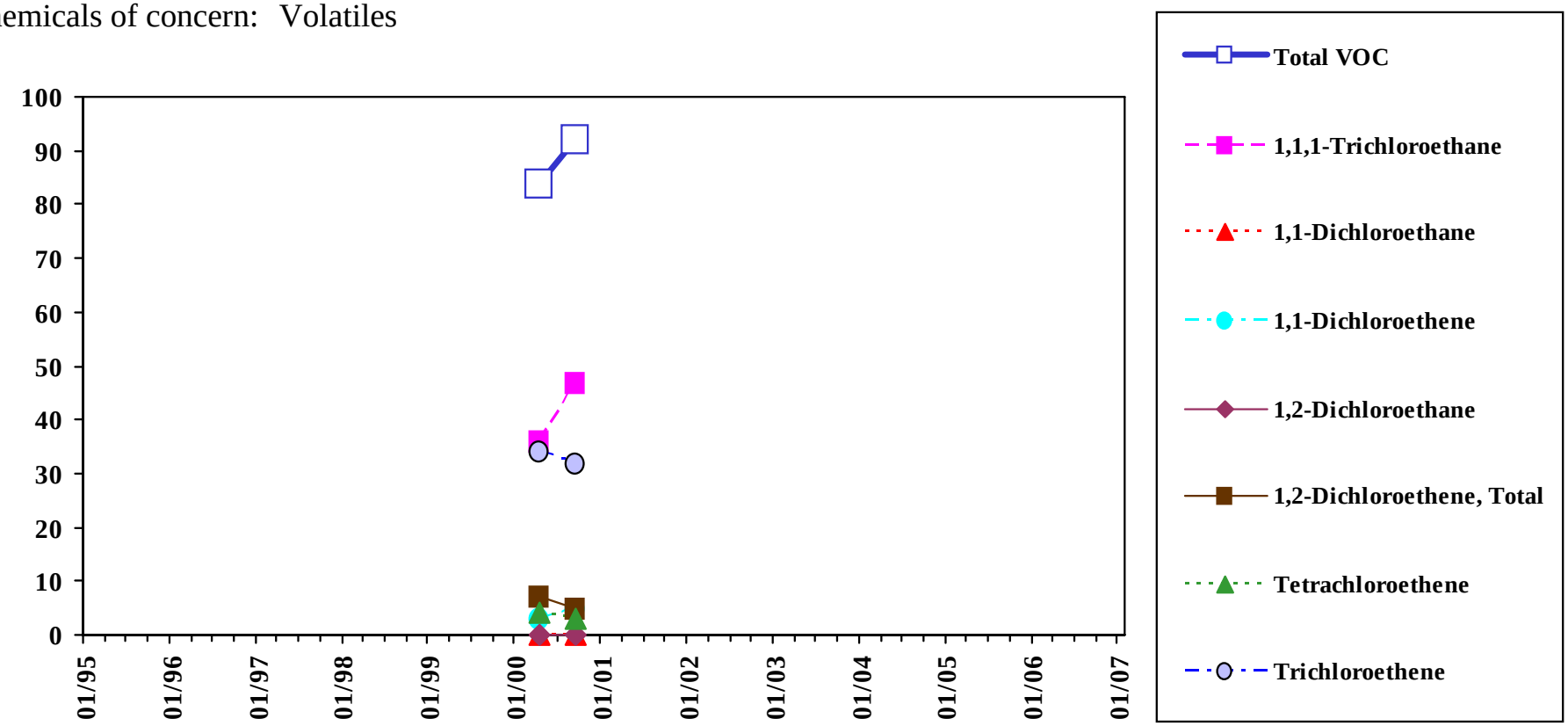
Sample Location:

MW-229A

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

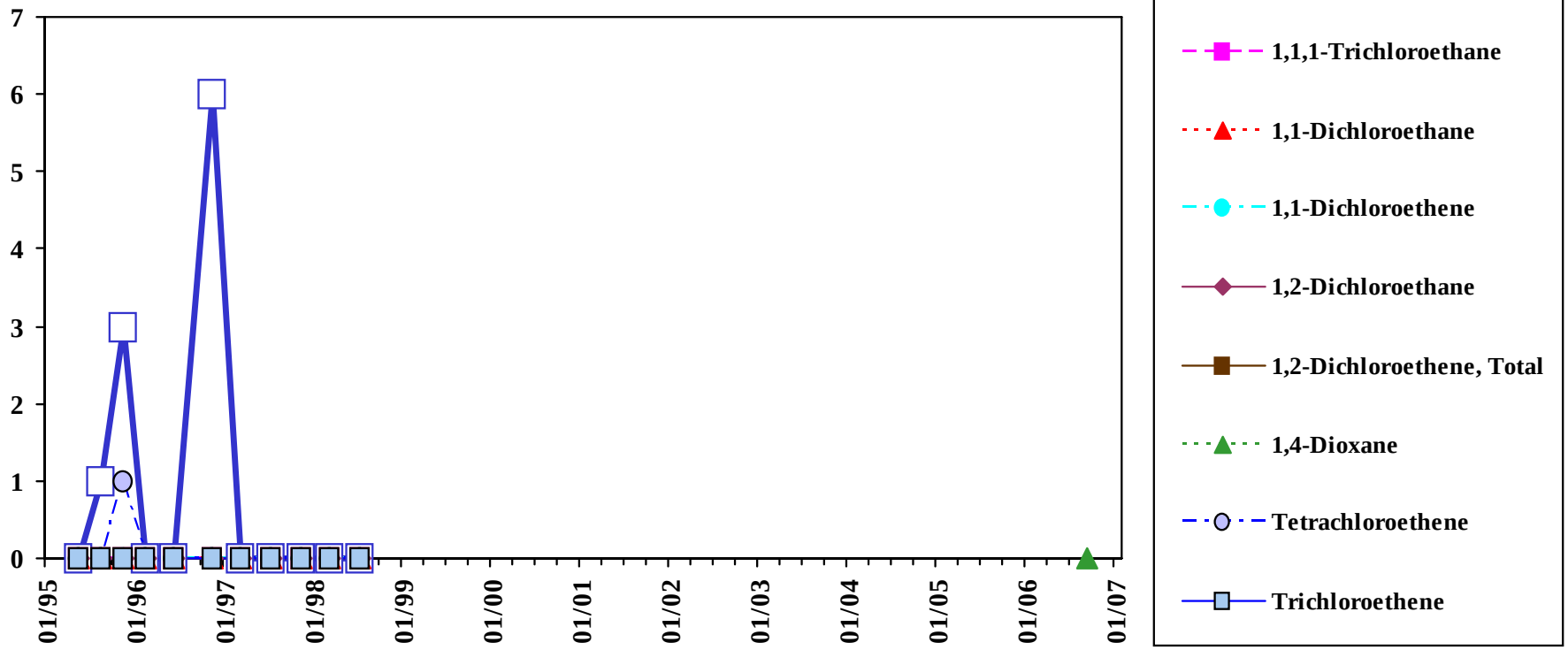
Sample Location:

MW-229B

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

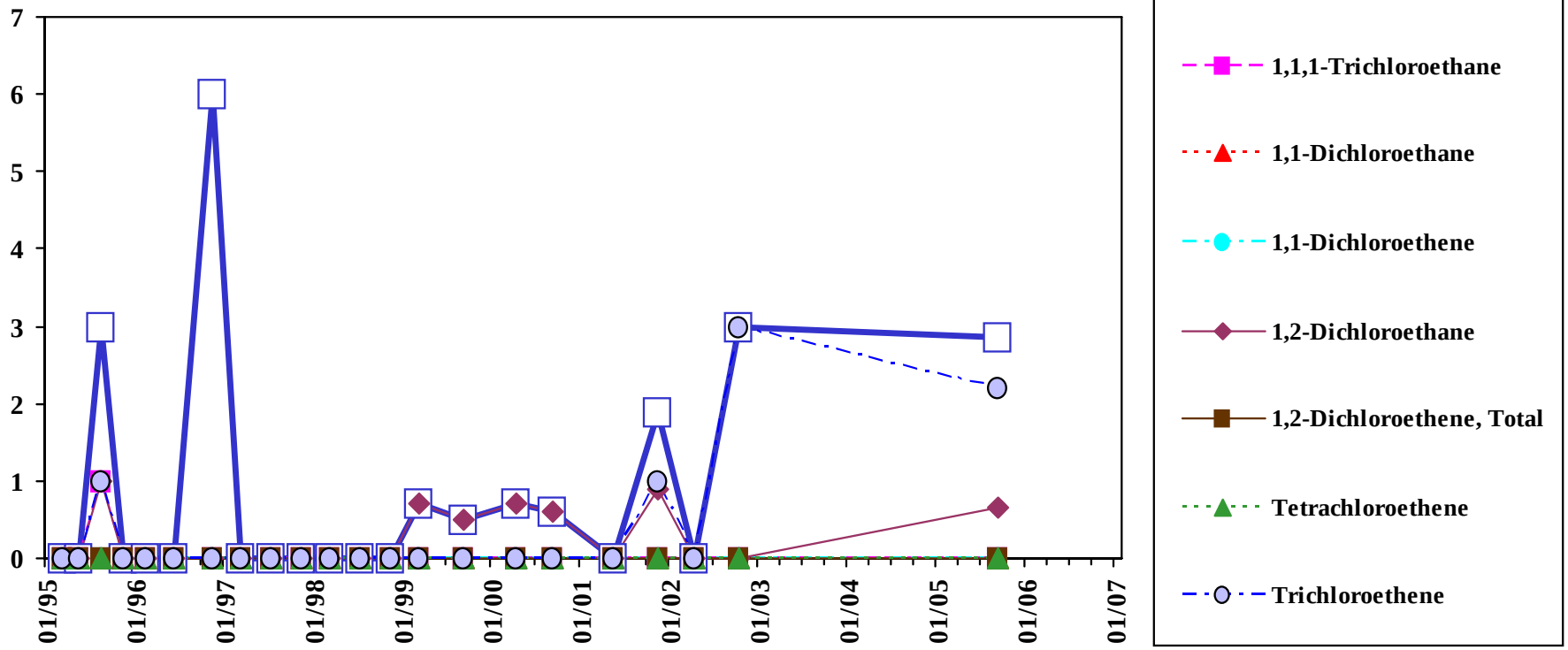
Sample Location:

MW-230A

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

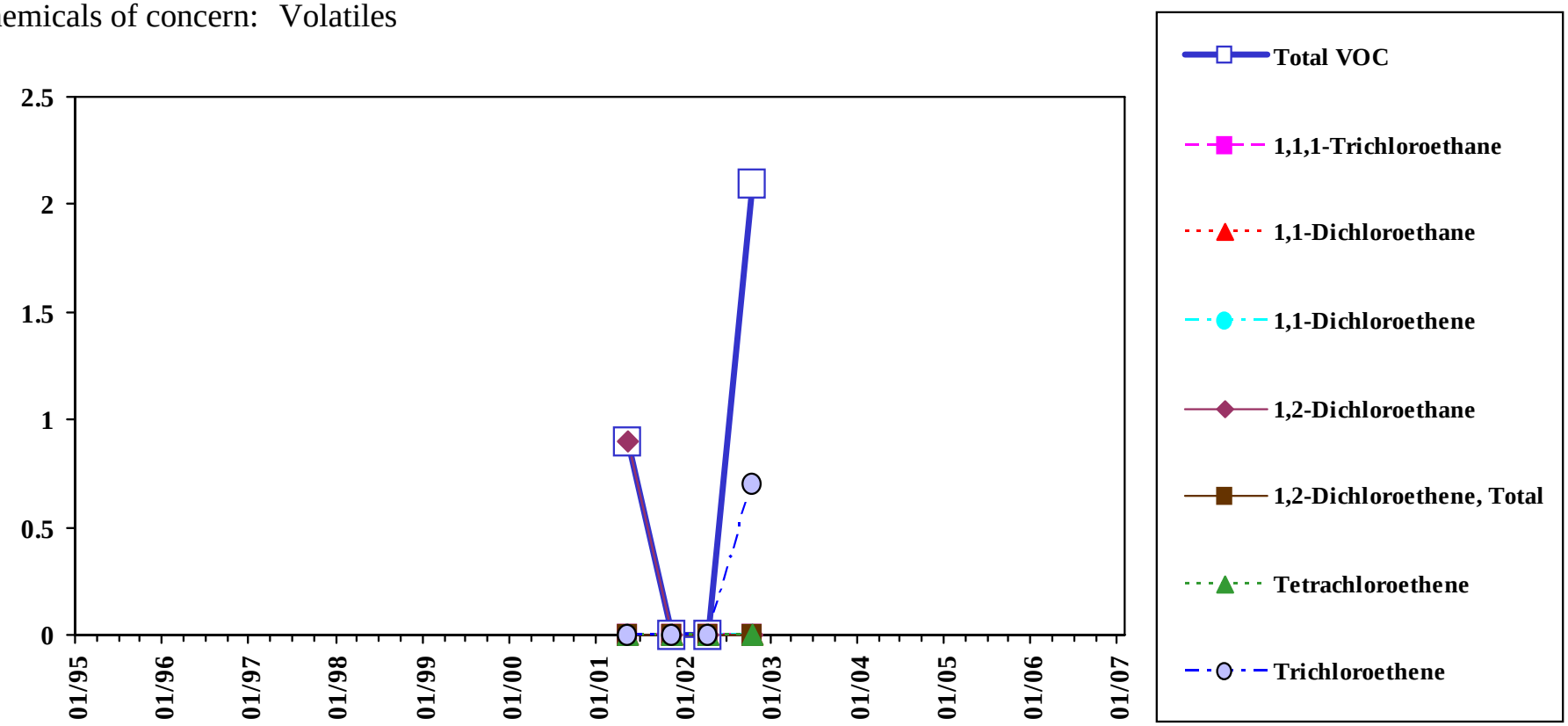
Sample Location:

MW-230A

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

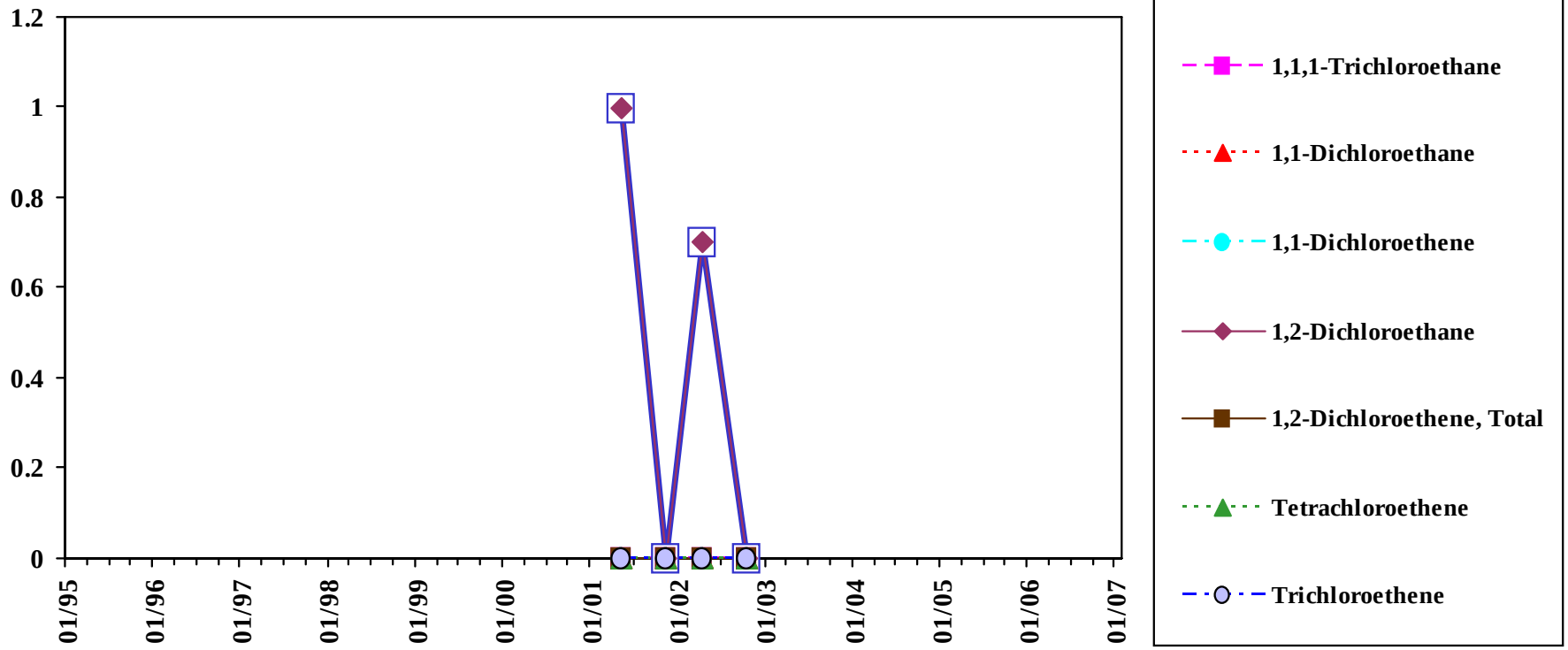
Sample Location:

MW-230A

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

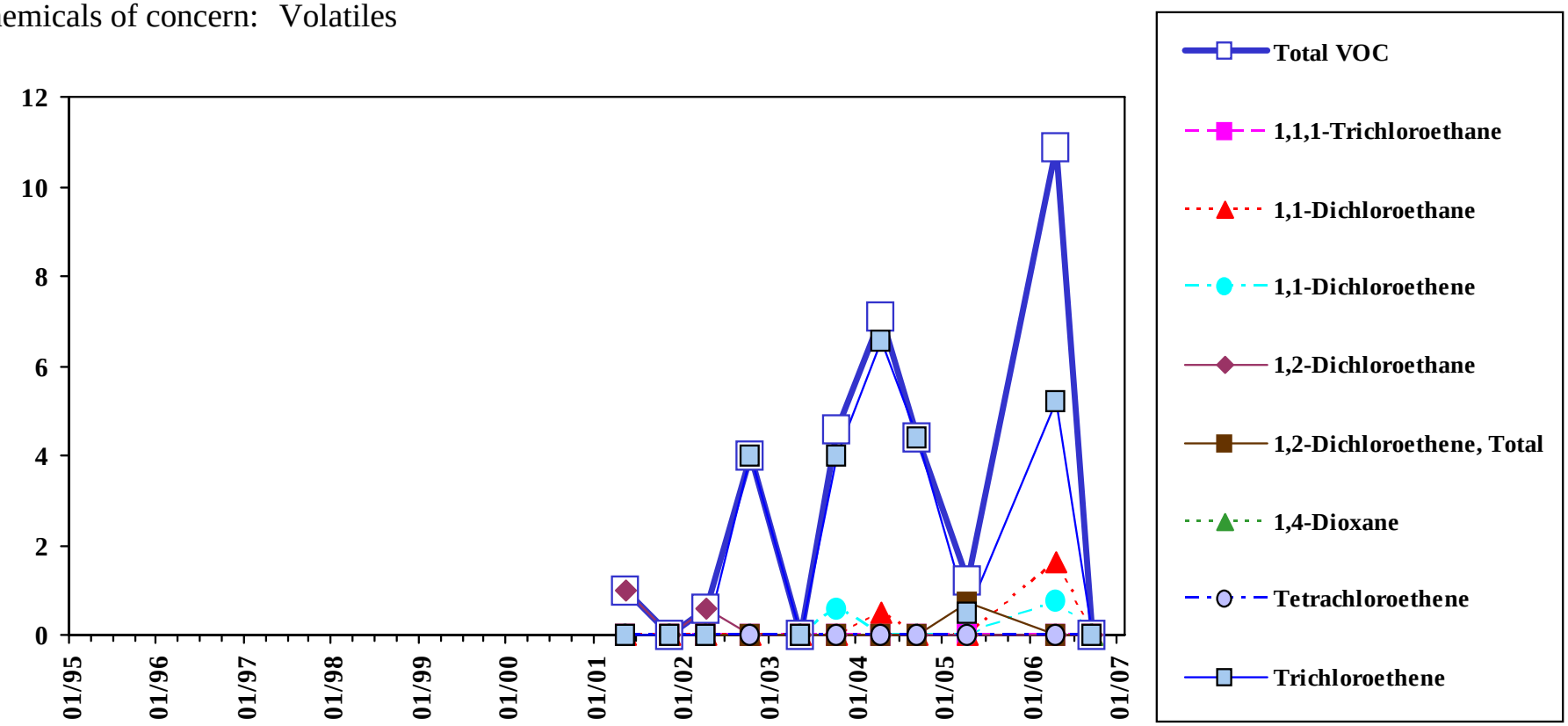
Sample Location:

MW-230A

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

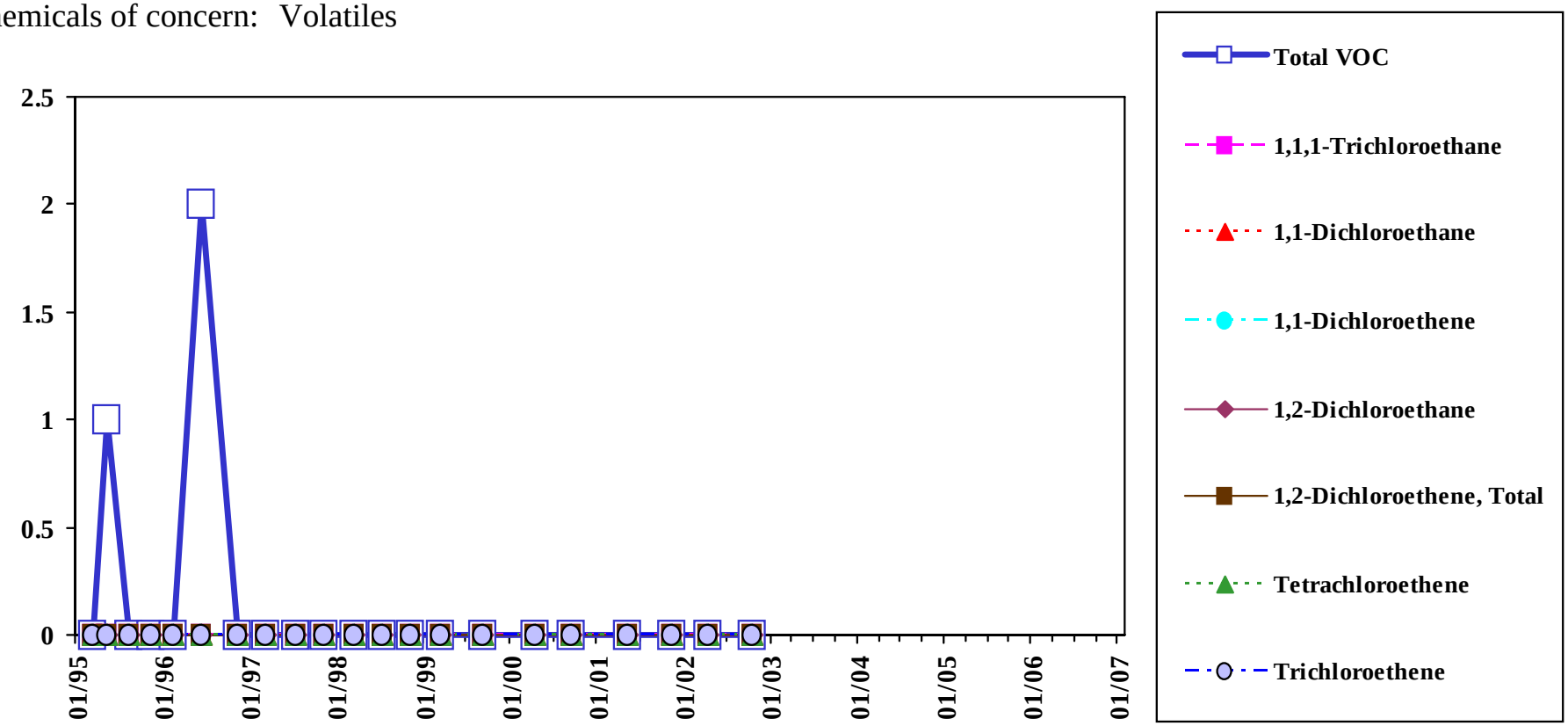
Sample Location:

MW-231A

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

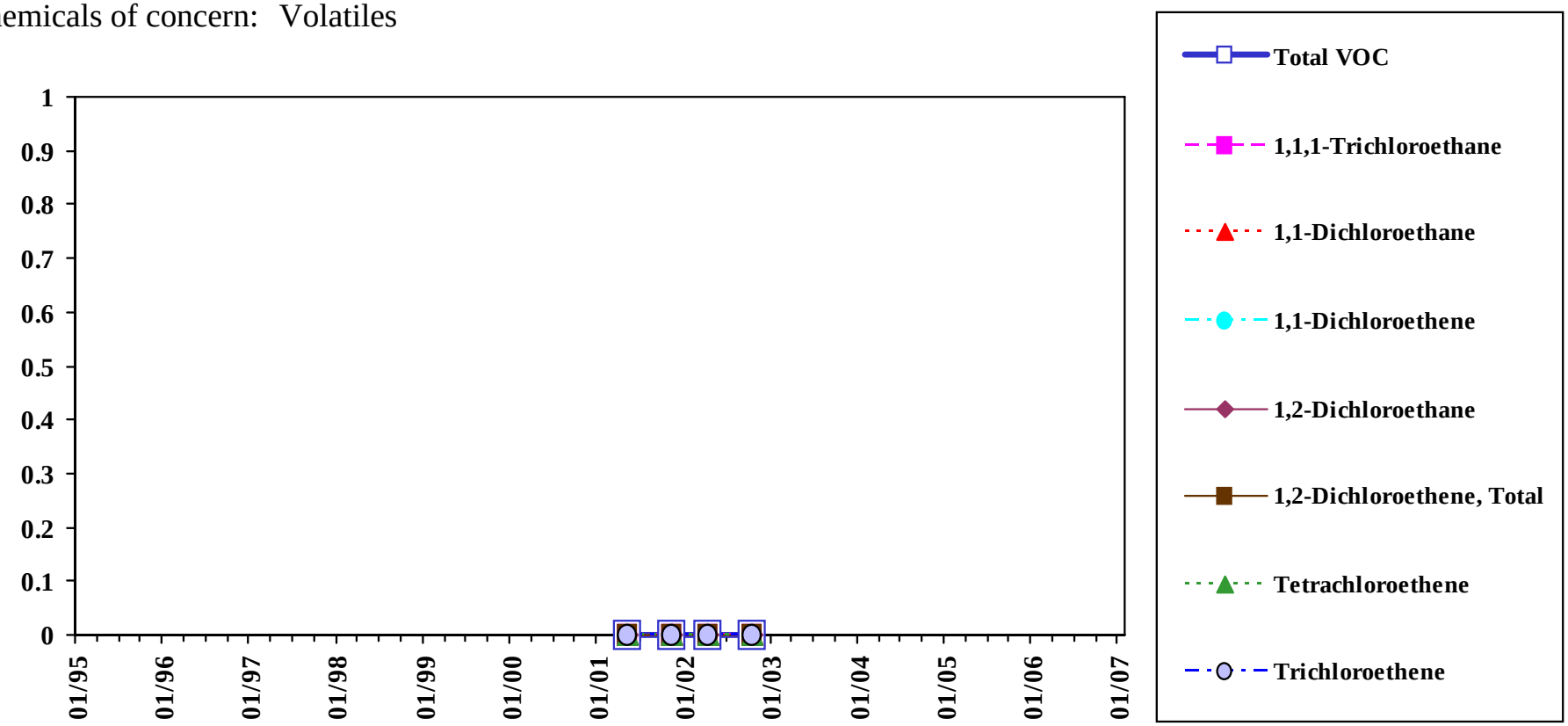
Sample Location:

MW-231A

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

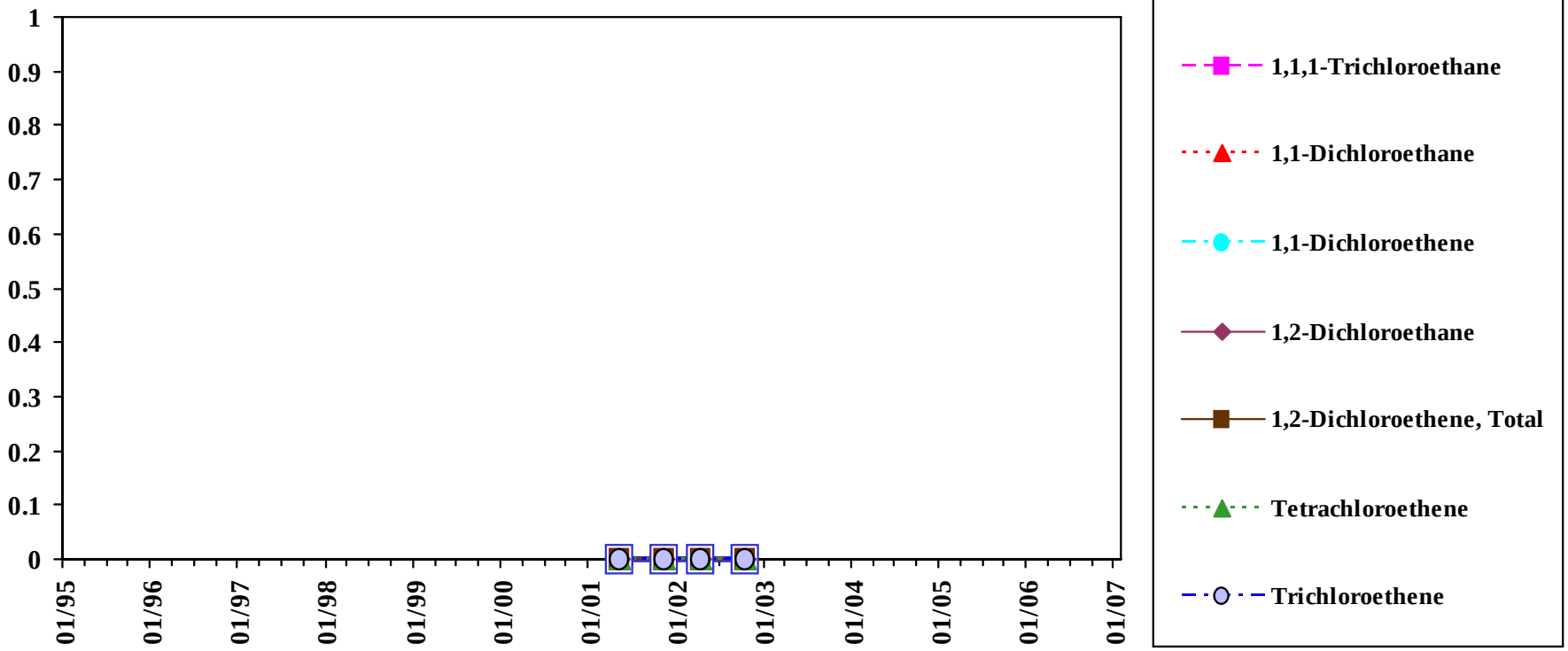
Sample Location:

MW-231A

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

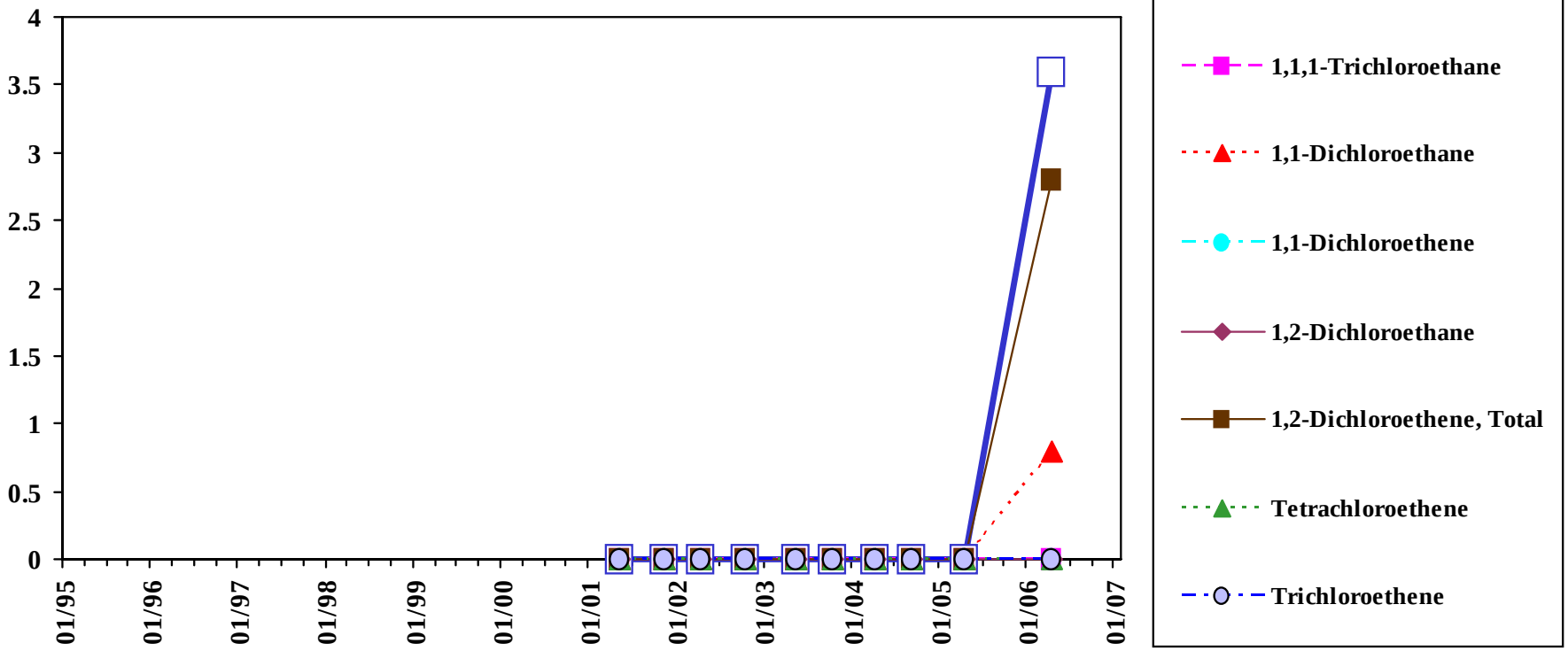
Sample Location:

MW-231A

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

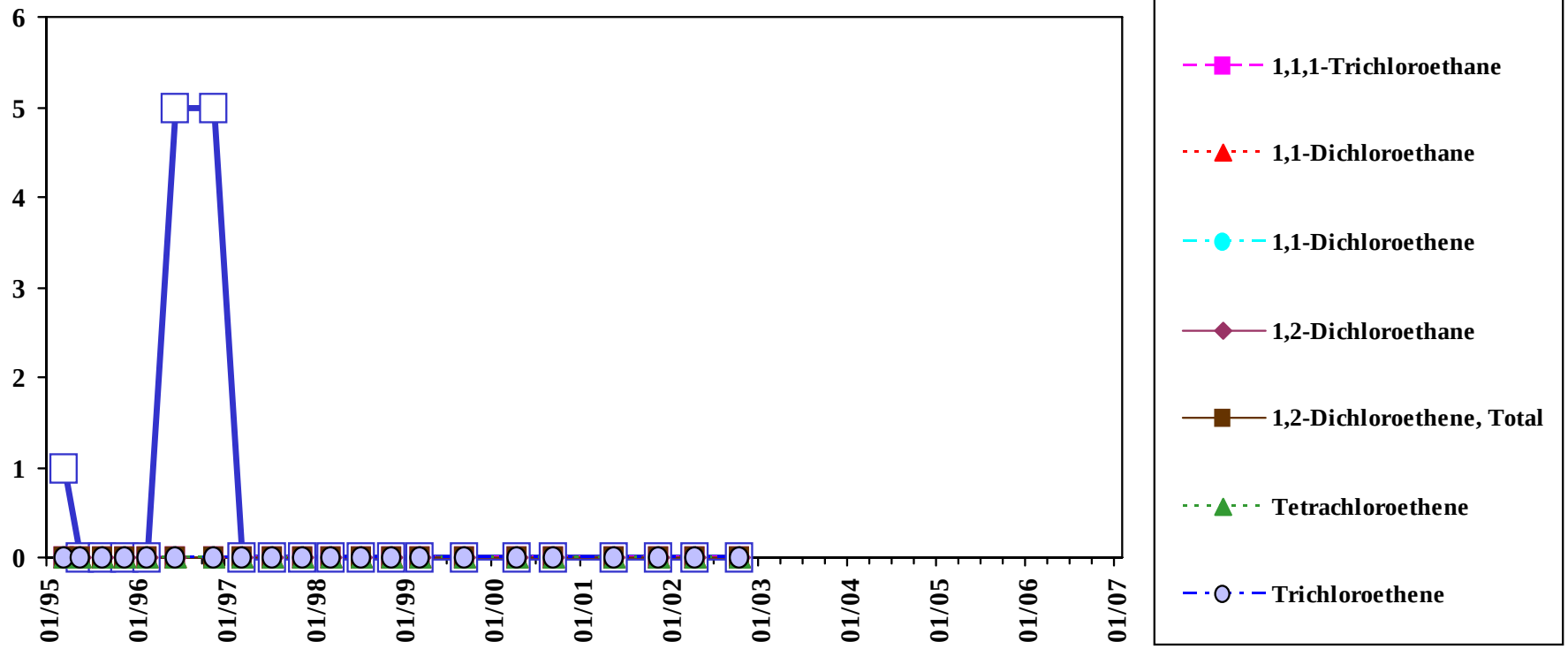
Sample Location:

MW-231B

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

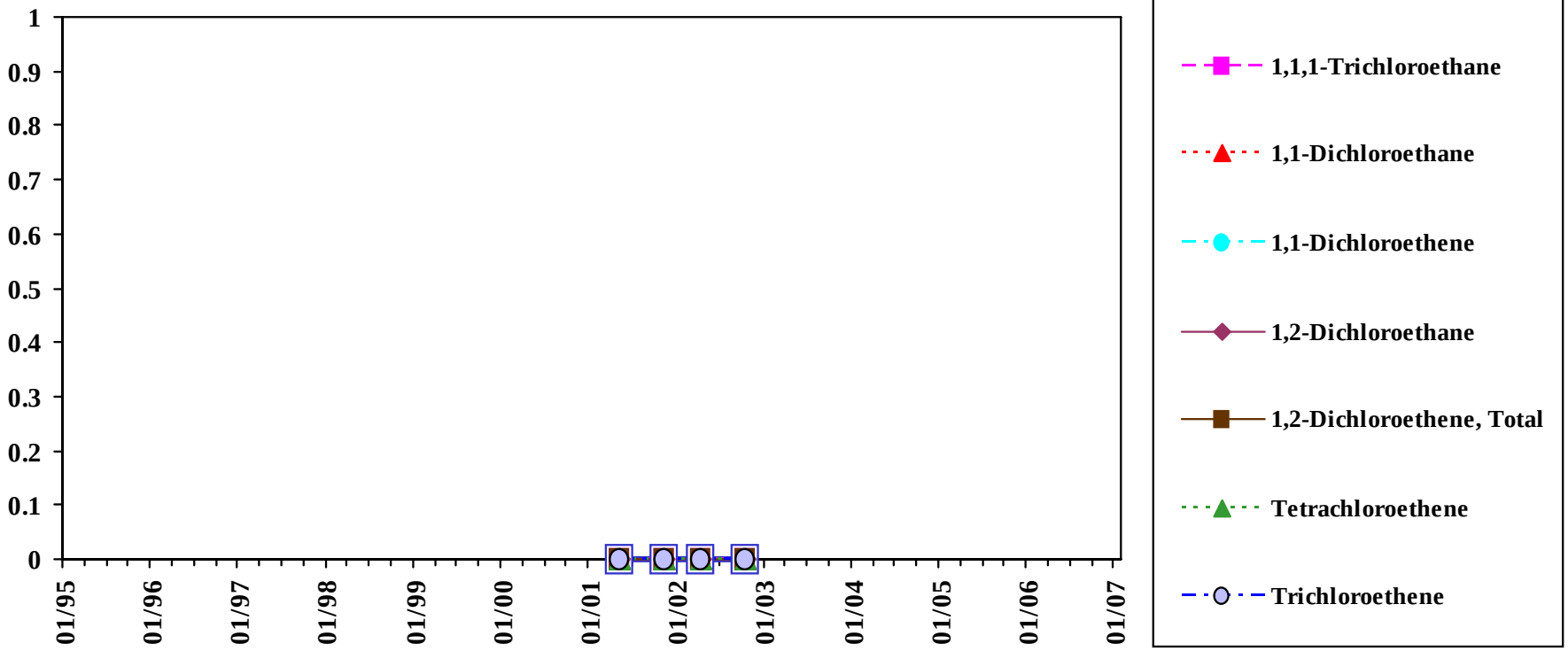
Sample Location:

MW-231B

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

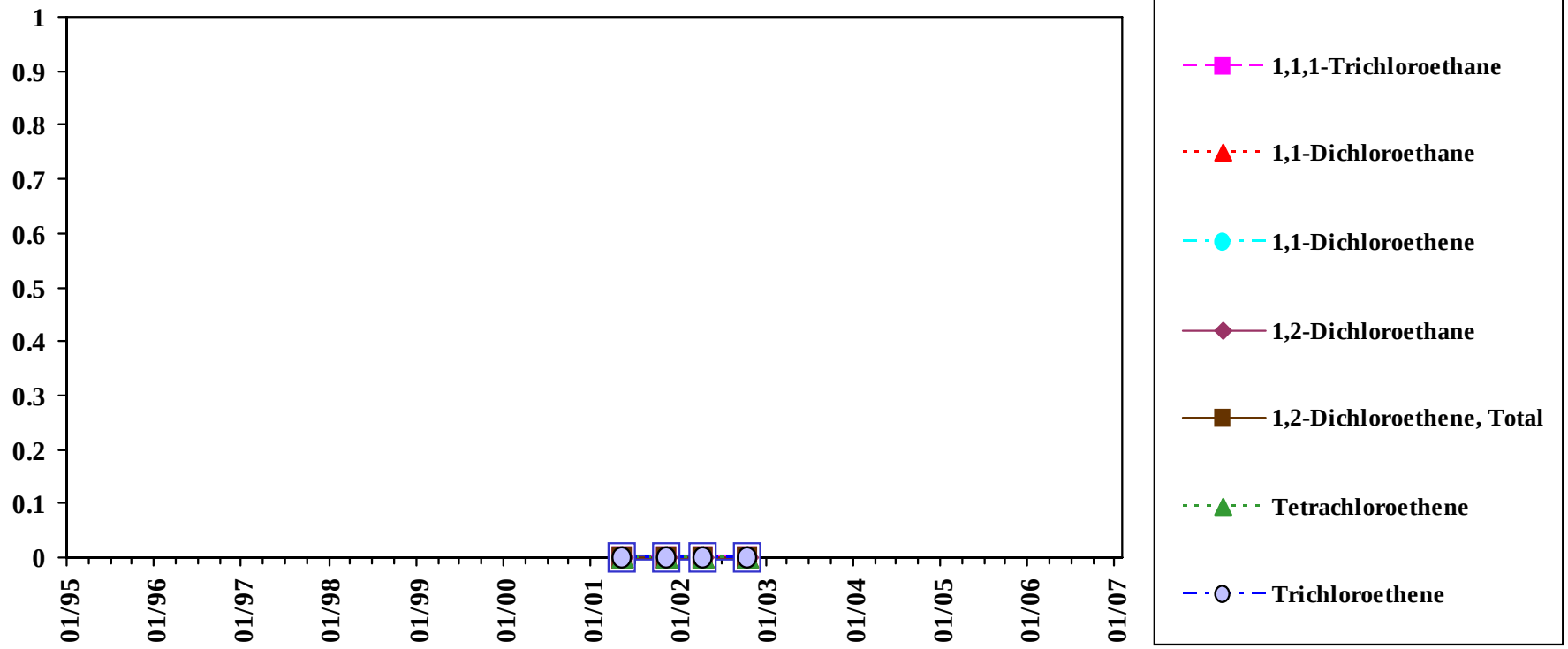
Sample Location:

MW-231B

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

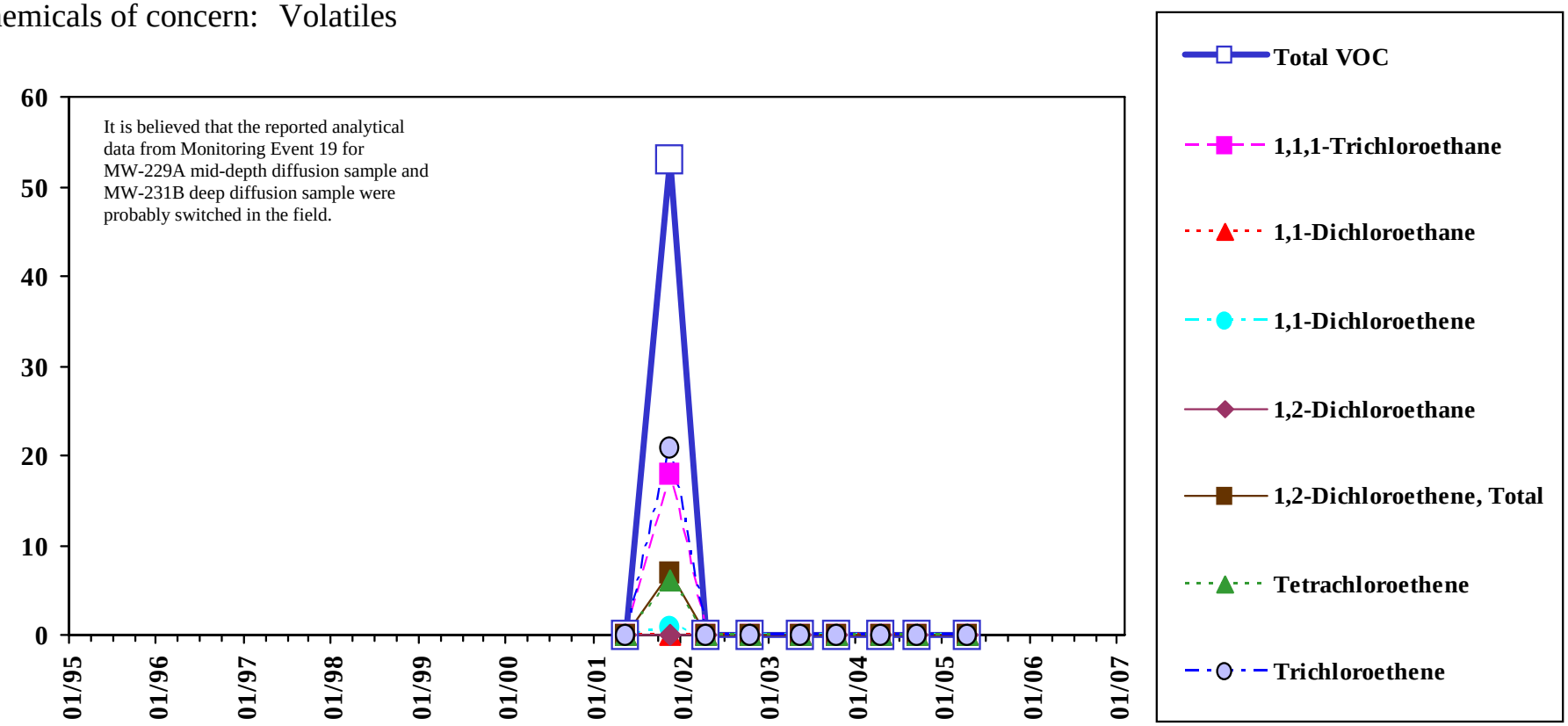
Sample Location:

MW-231B

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

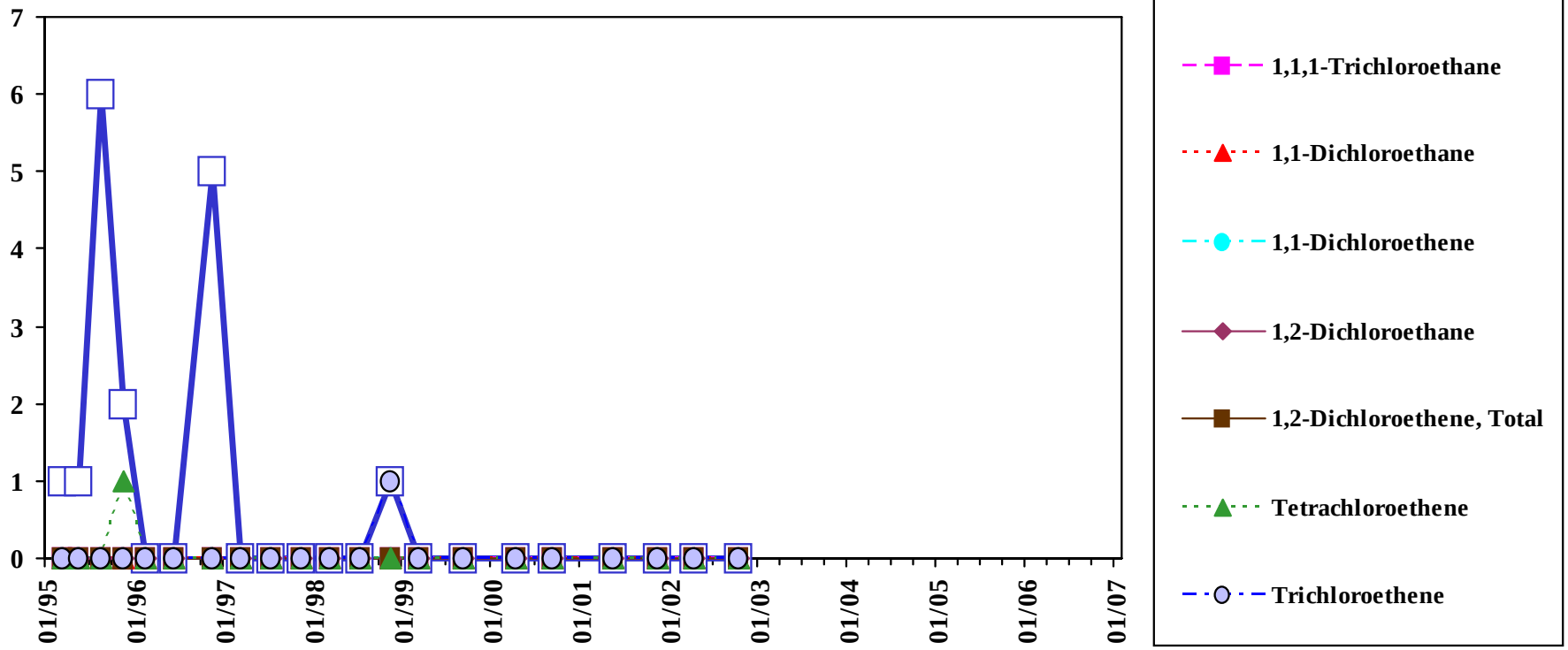
Sample Location:

MW-303

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

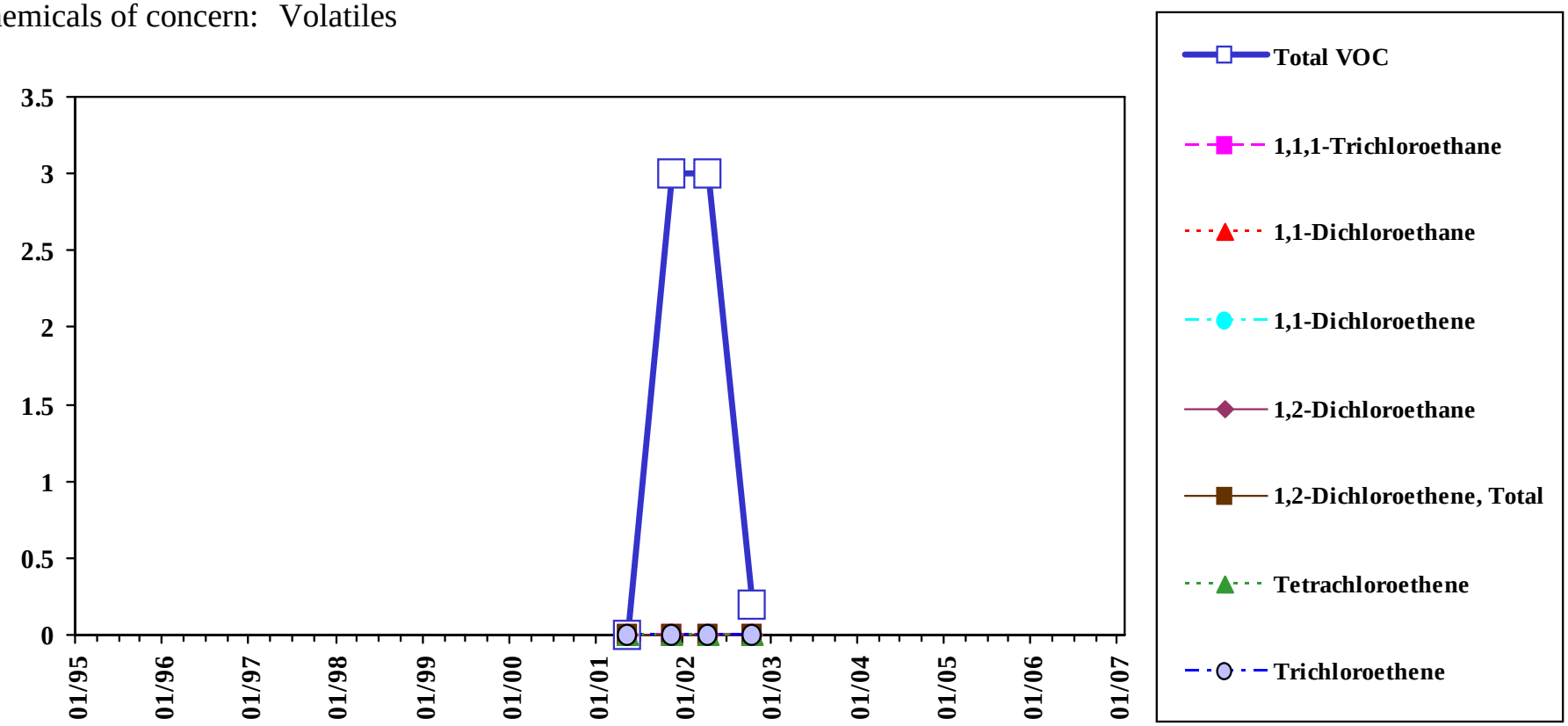
Sample Location:

MW-303

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

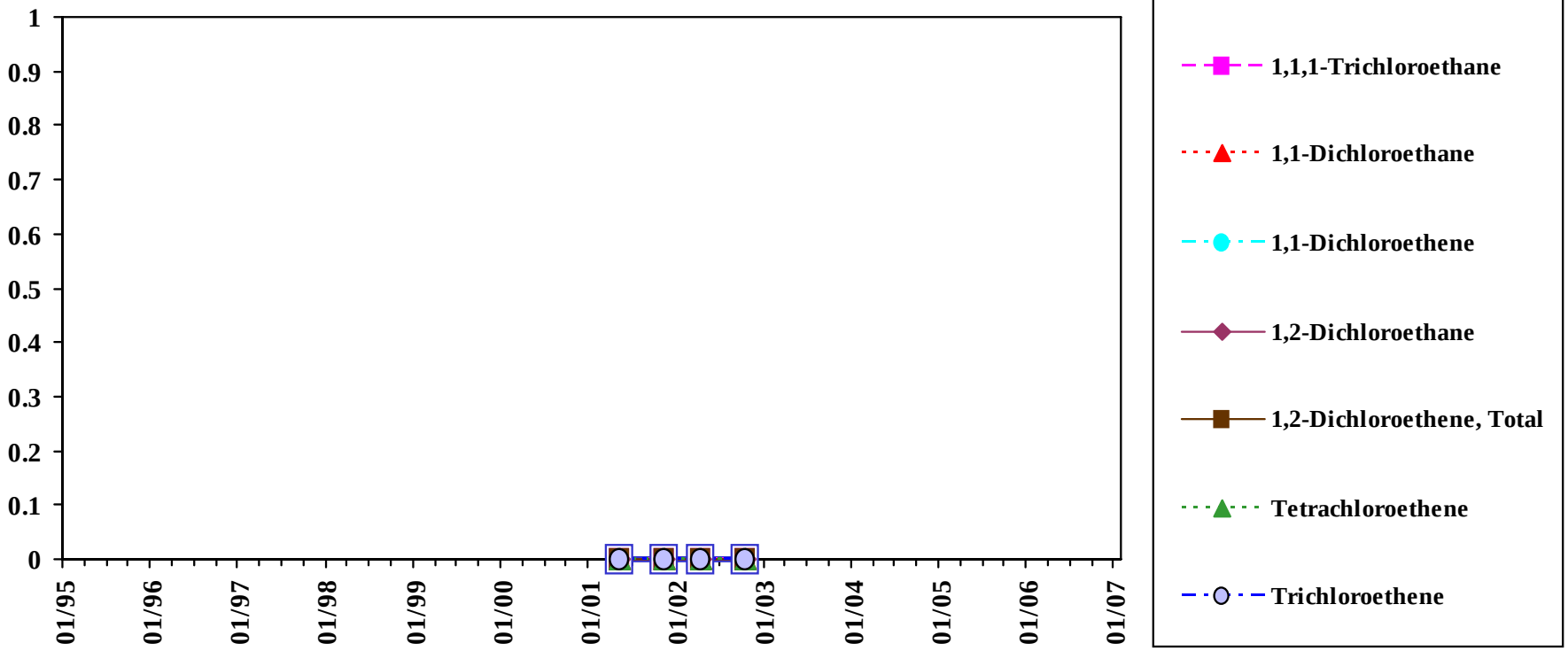
Sample Location:

MW-303

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

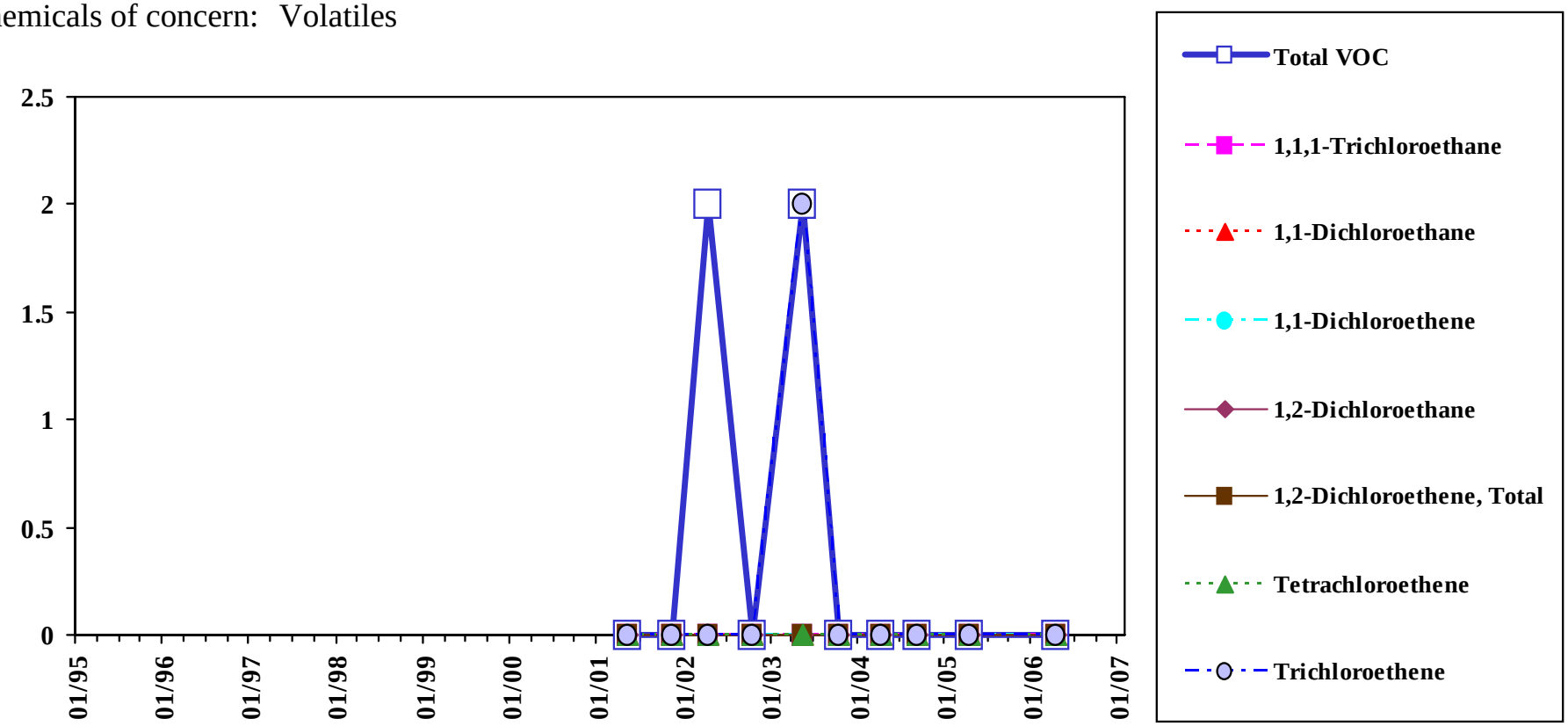
Sample Location:

MW-303

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

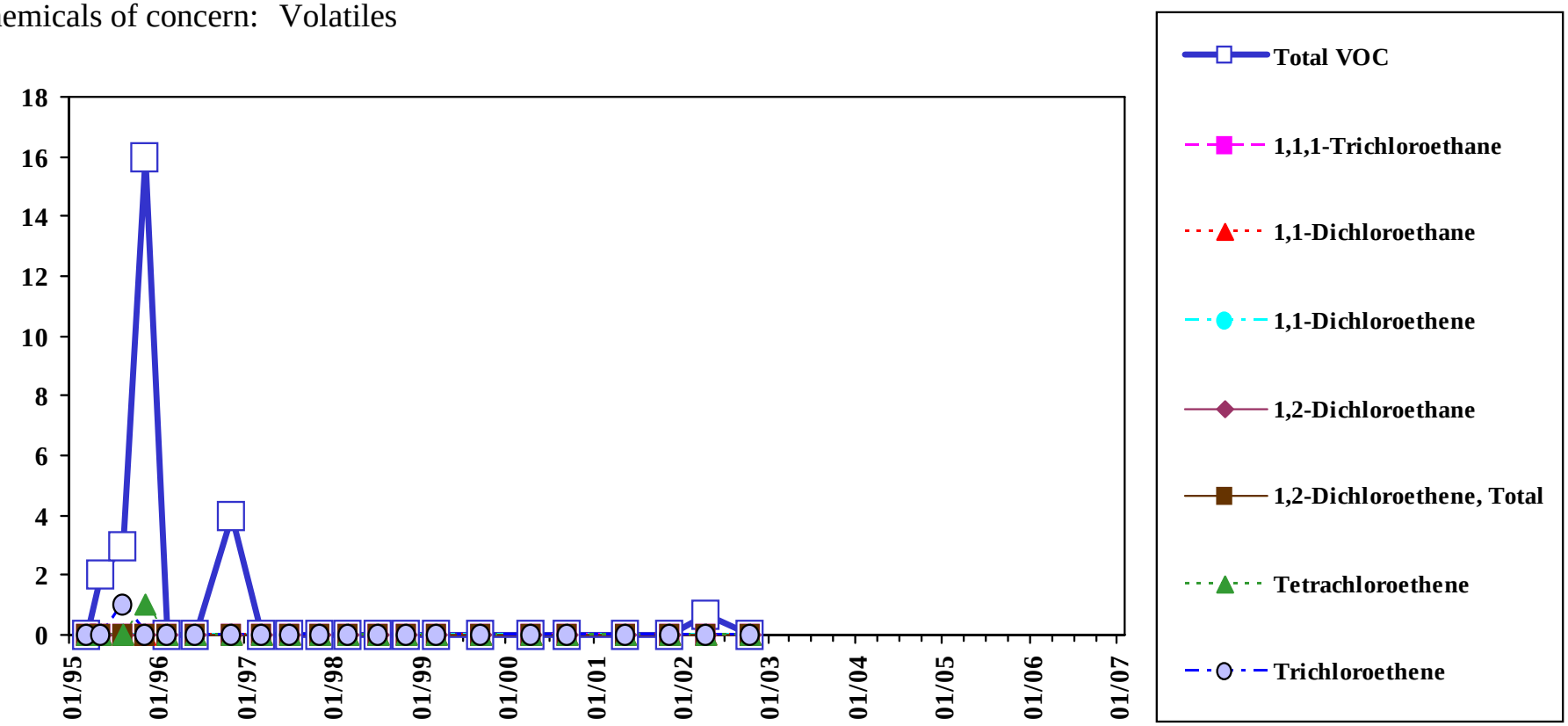
Sample Location:

MW-305

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

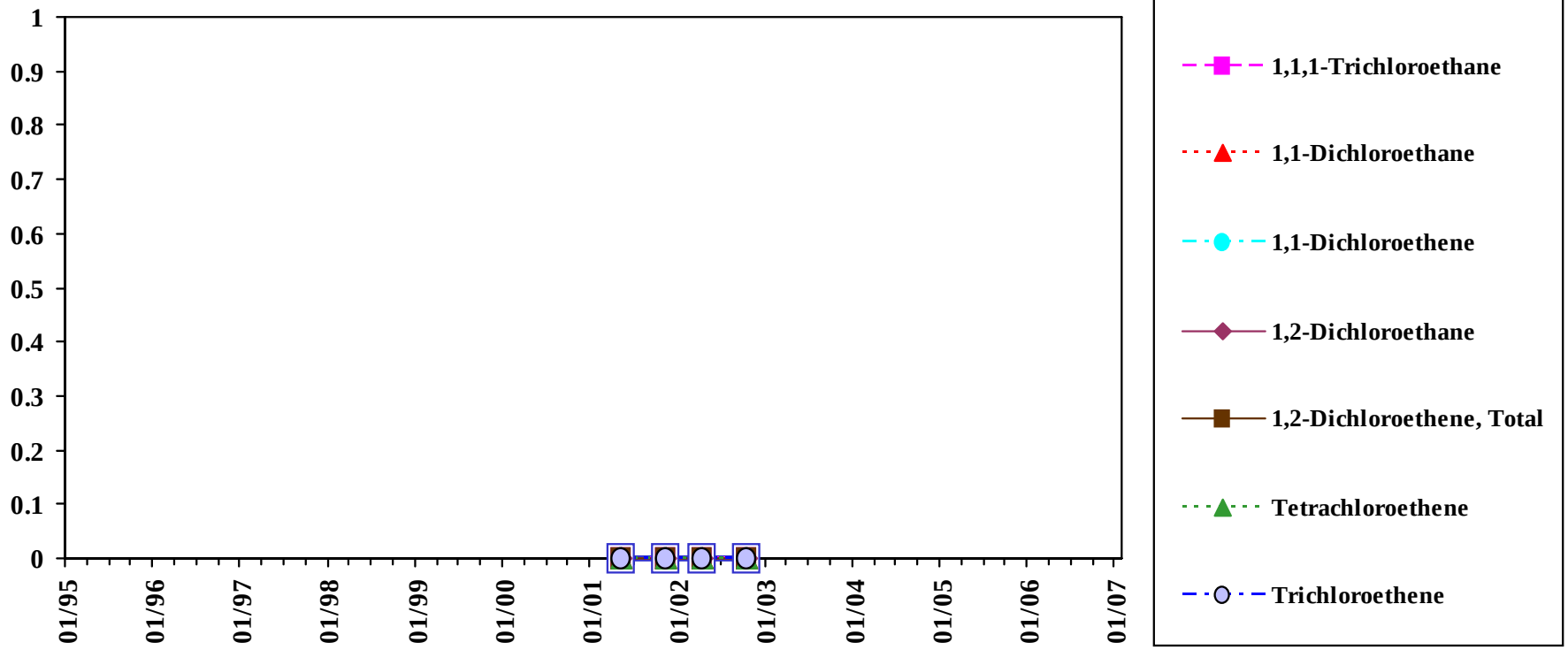
Sample Location:

MW-305

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

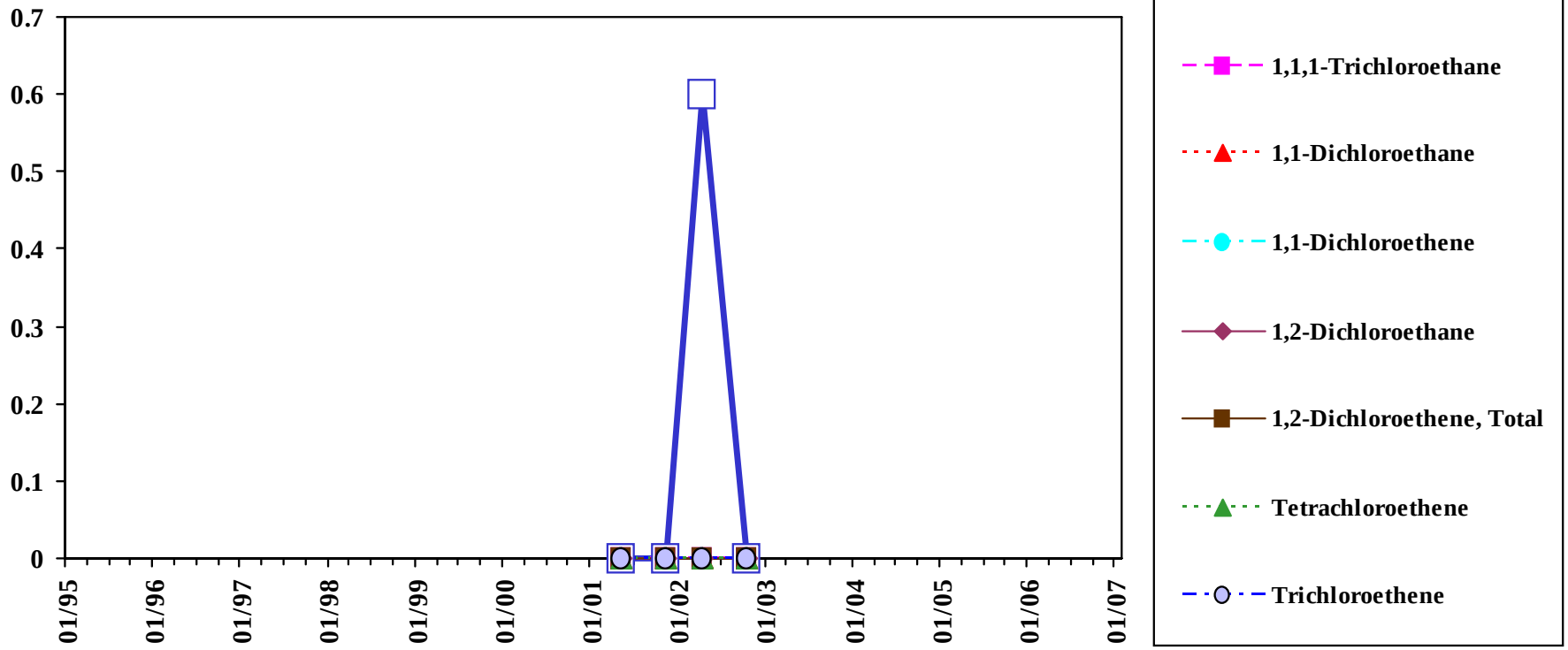
Sample Location:

MW-305

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

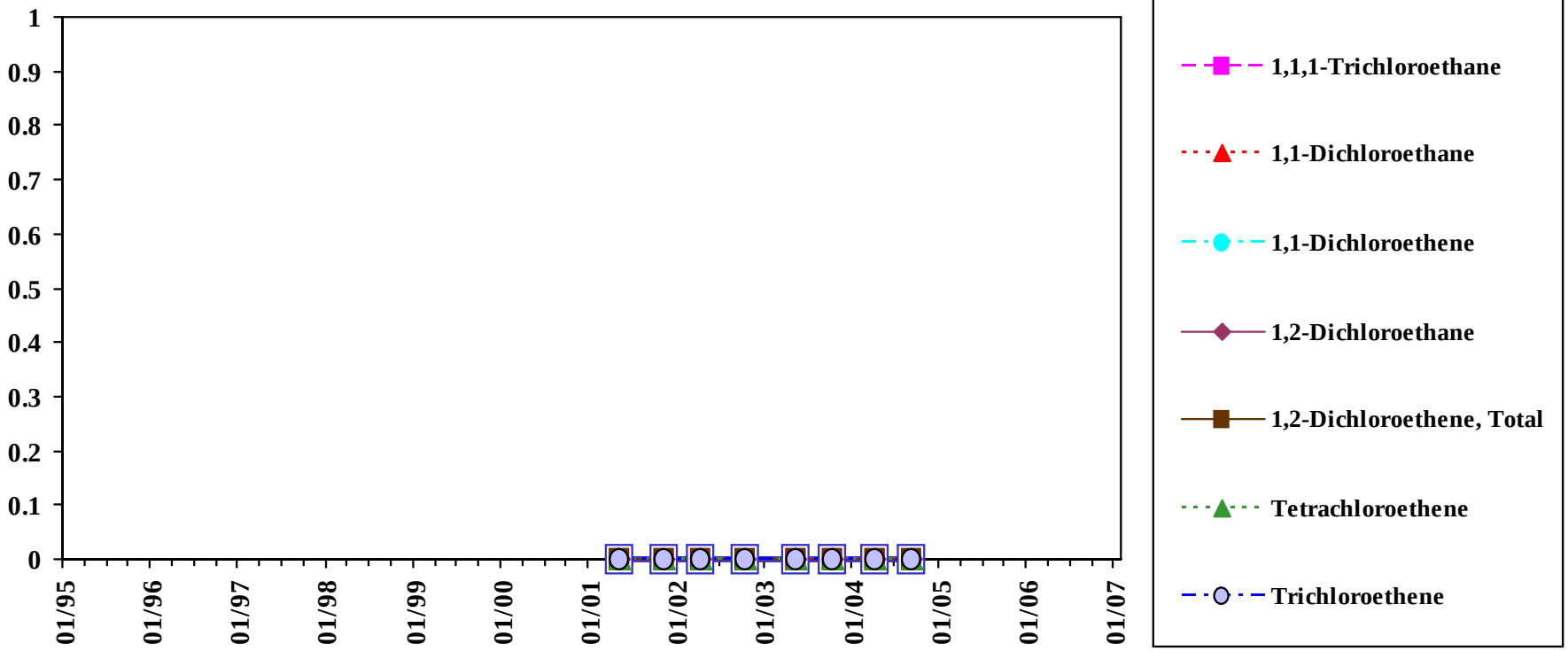
Sample Location:

MW-305

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

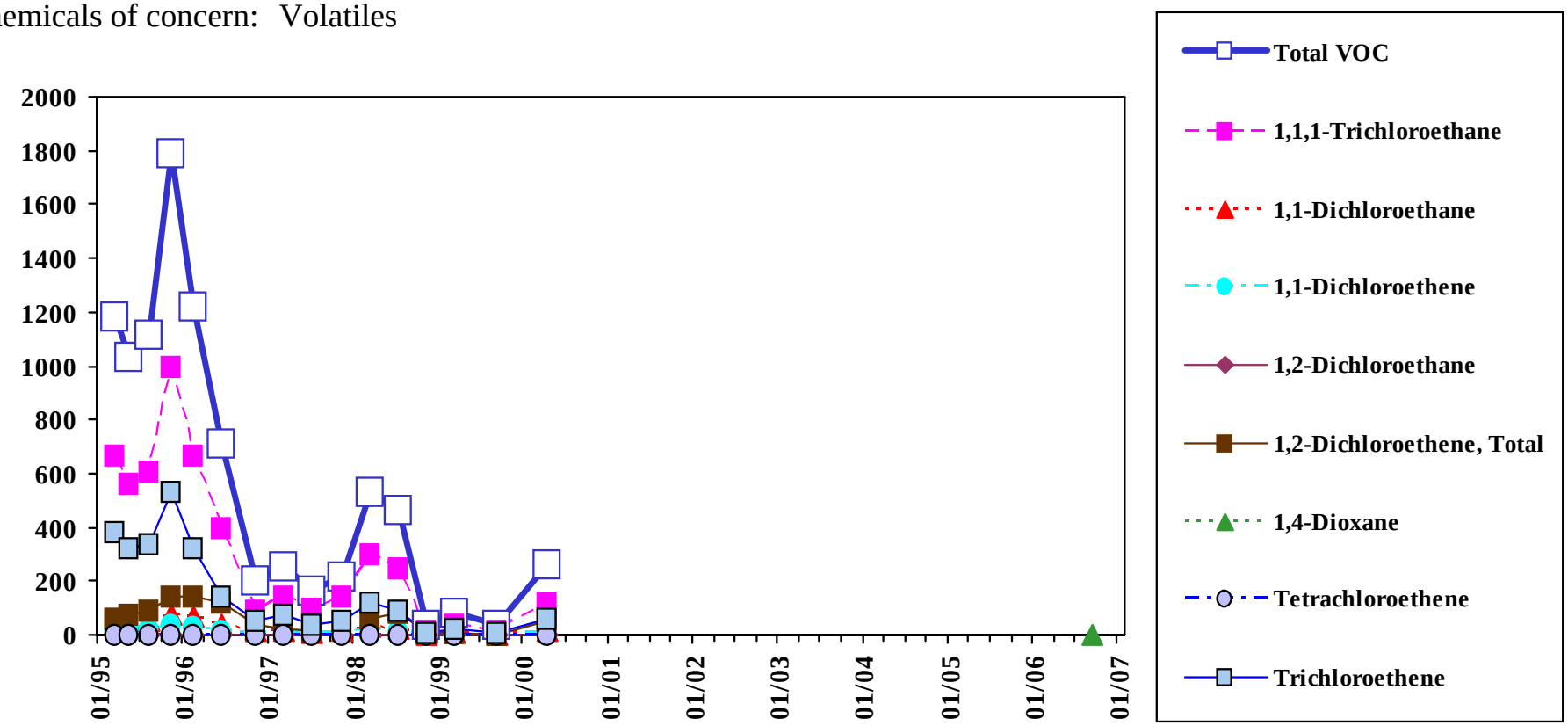
Sample Location:

MW-306

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

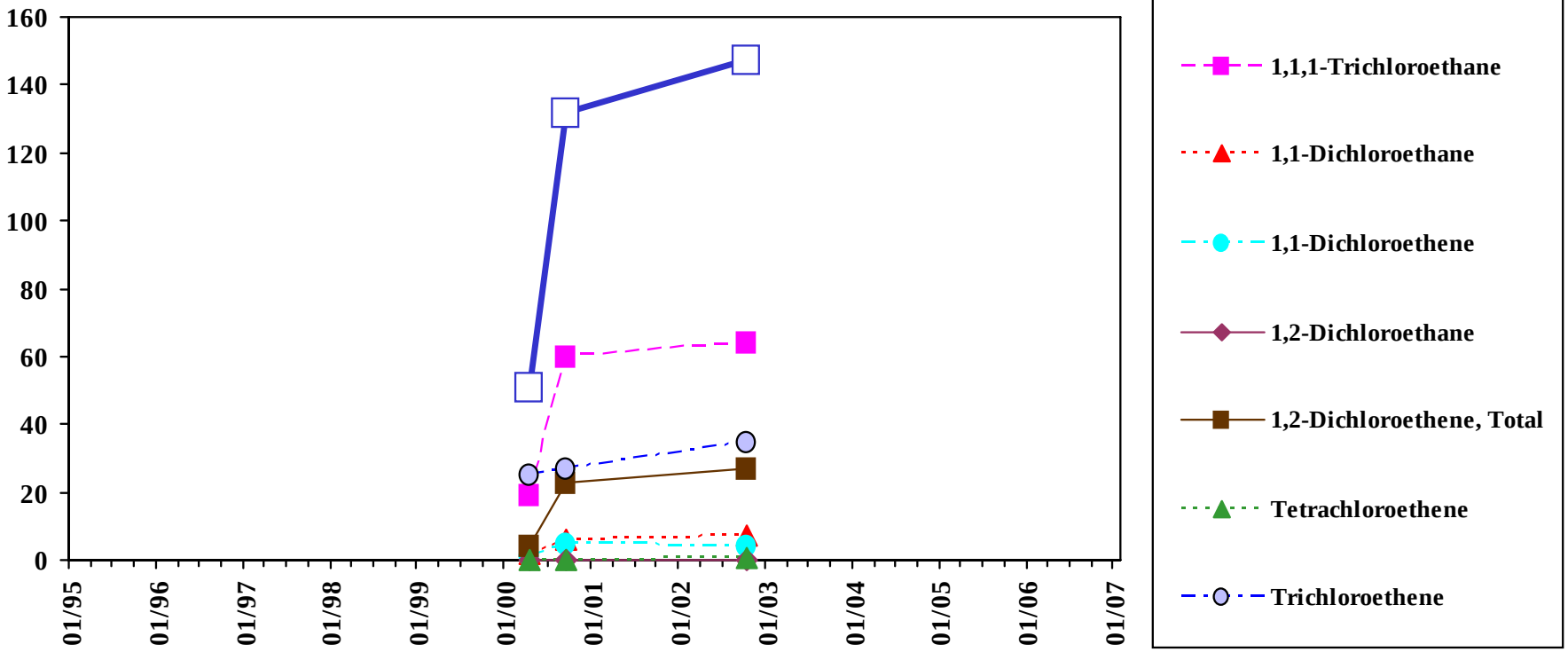
Sample Location:

MW-306

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

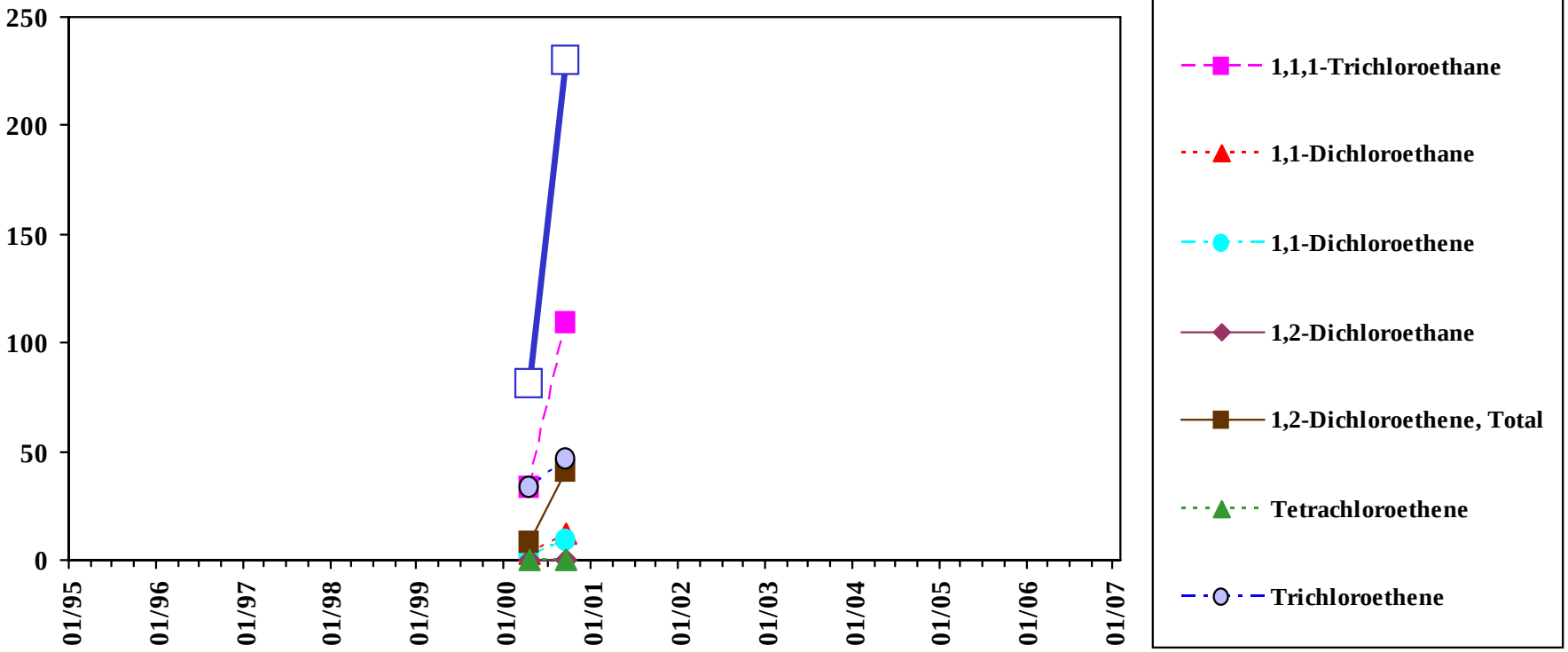
Sample Location:

MW-306

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

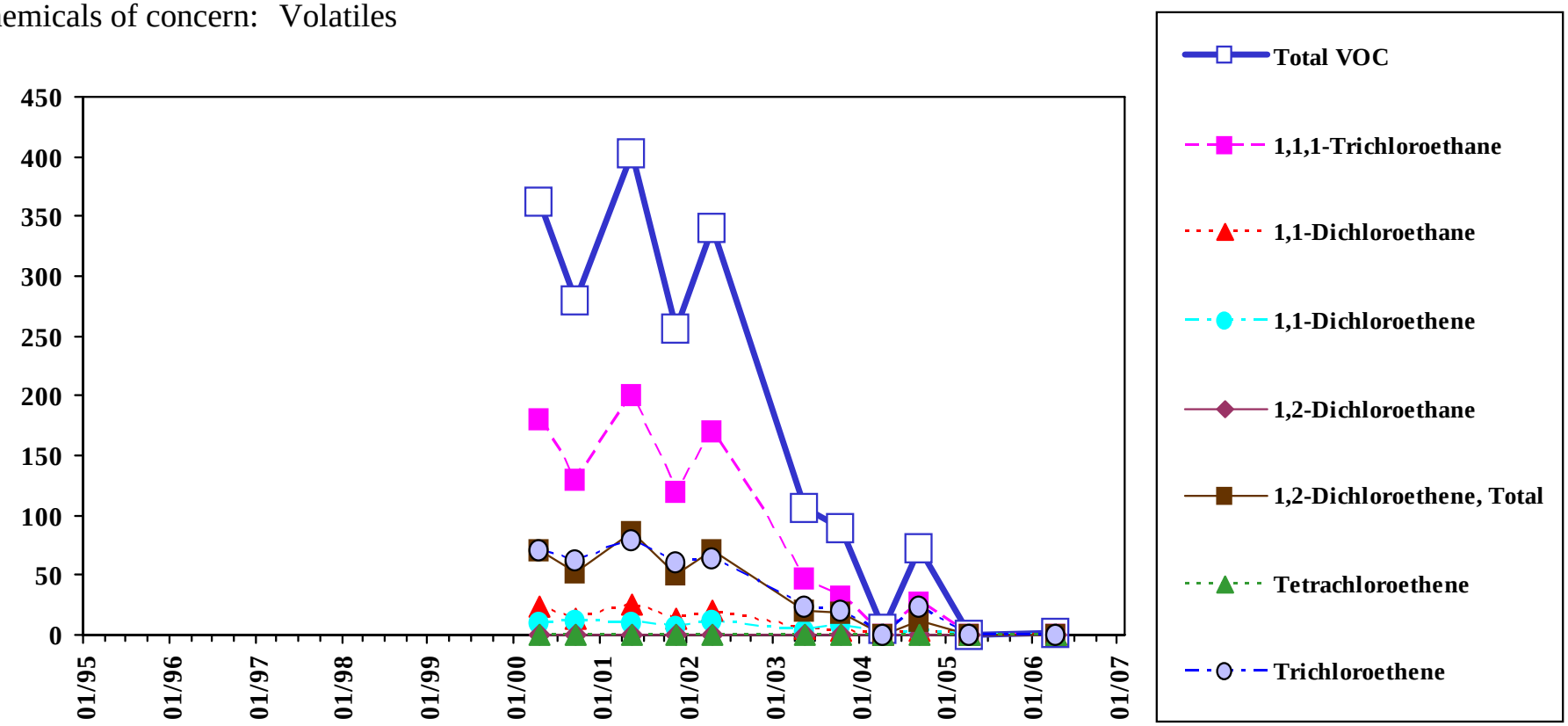
Sample Location:

MW-306

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

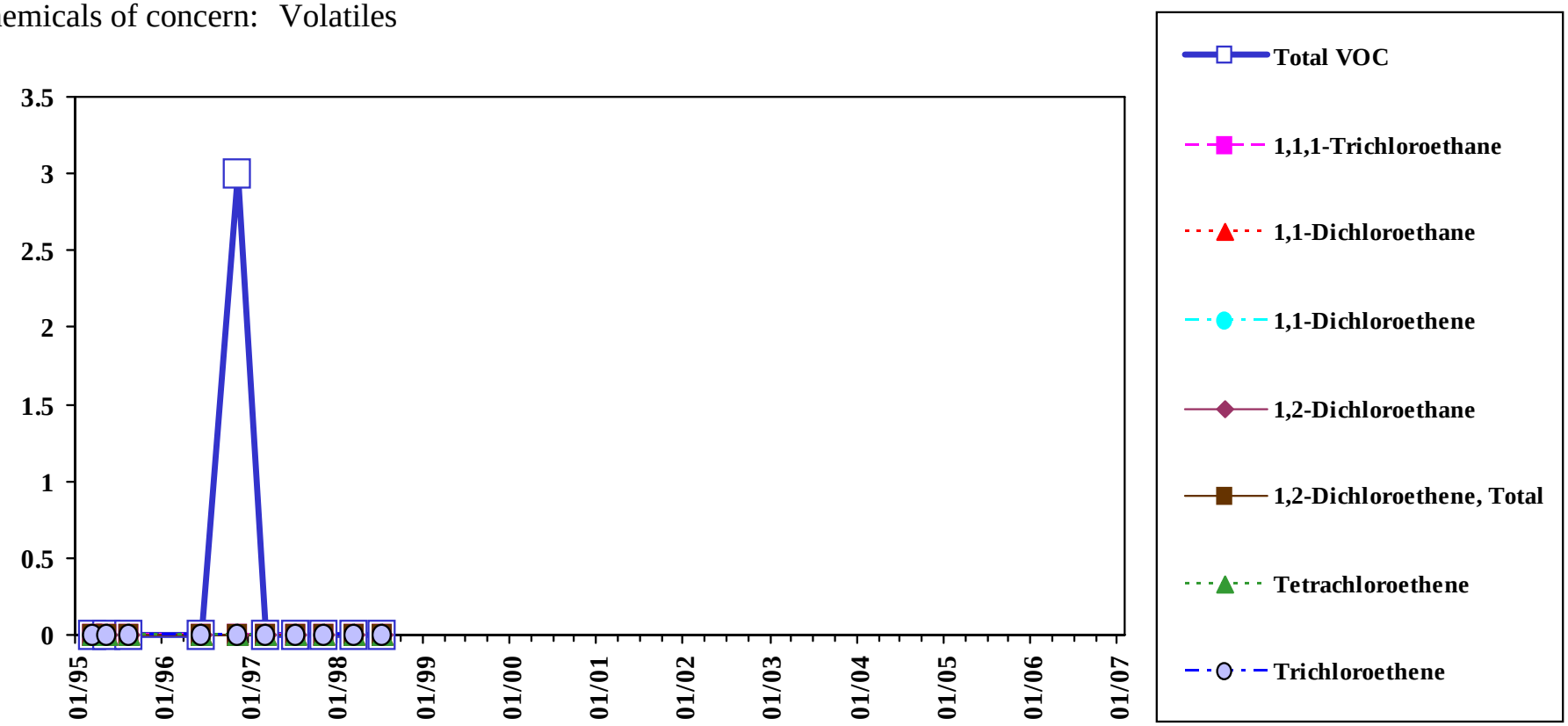
Sample Location:

MW-307

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

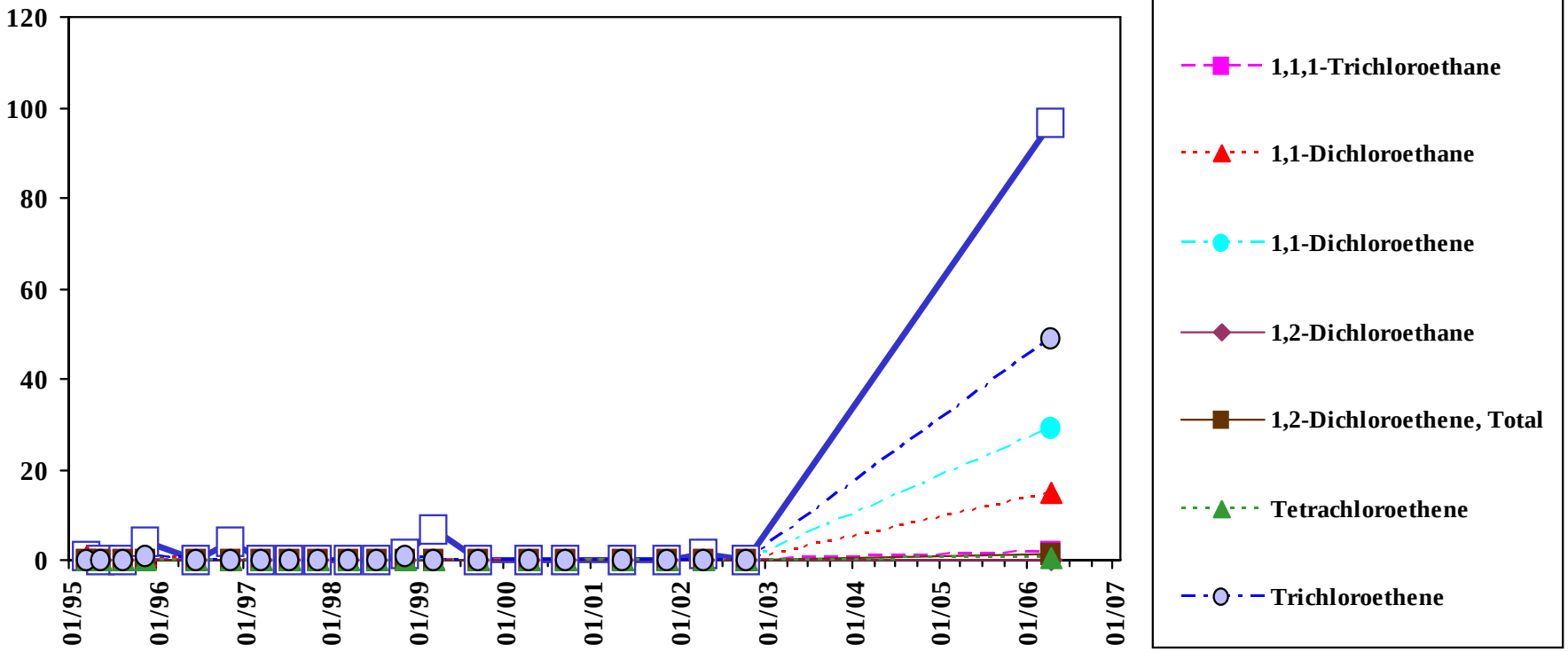
Sample Location:

MW-308

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

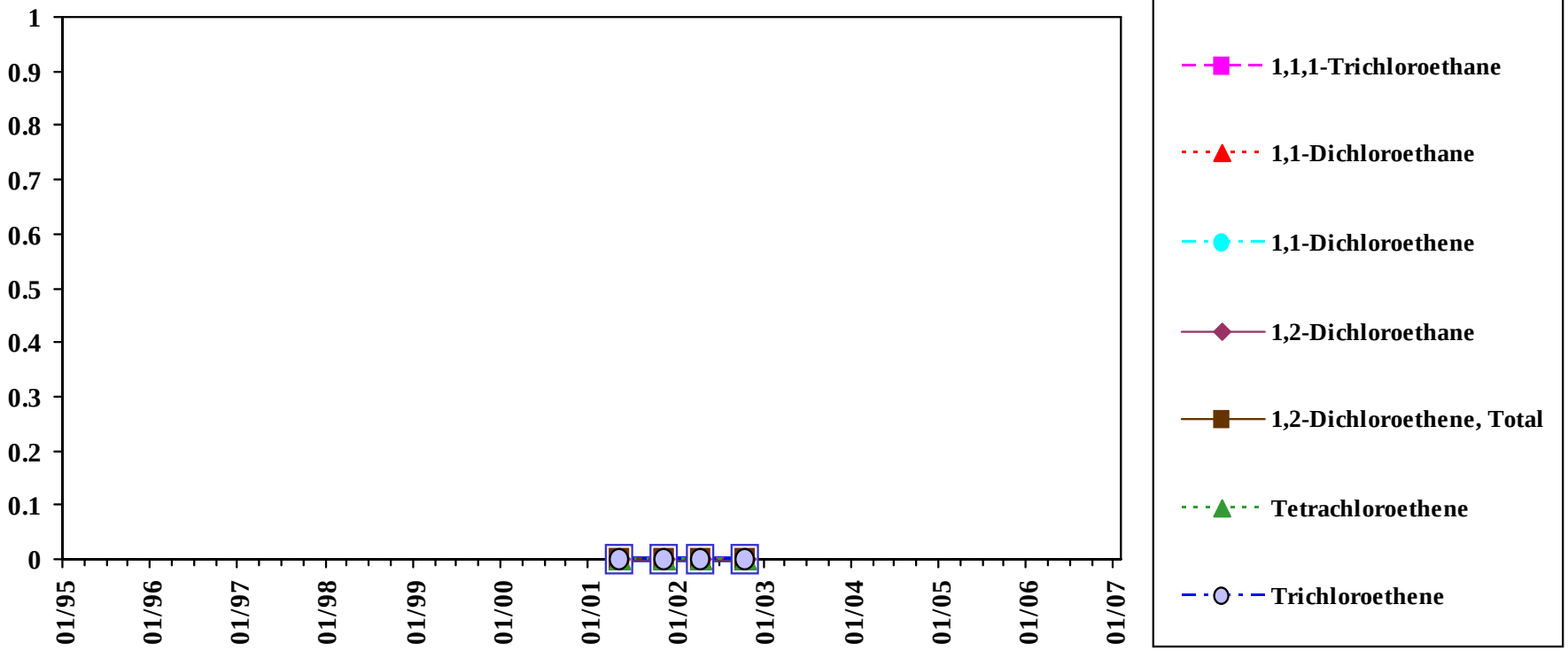
Sample Location:

MW-308

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

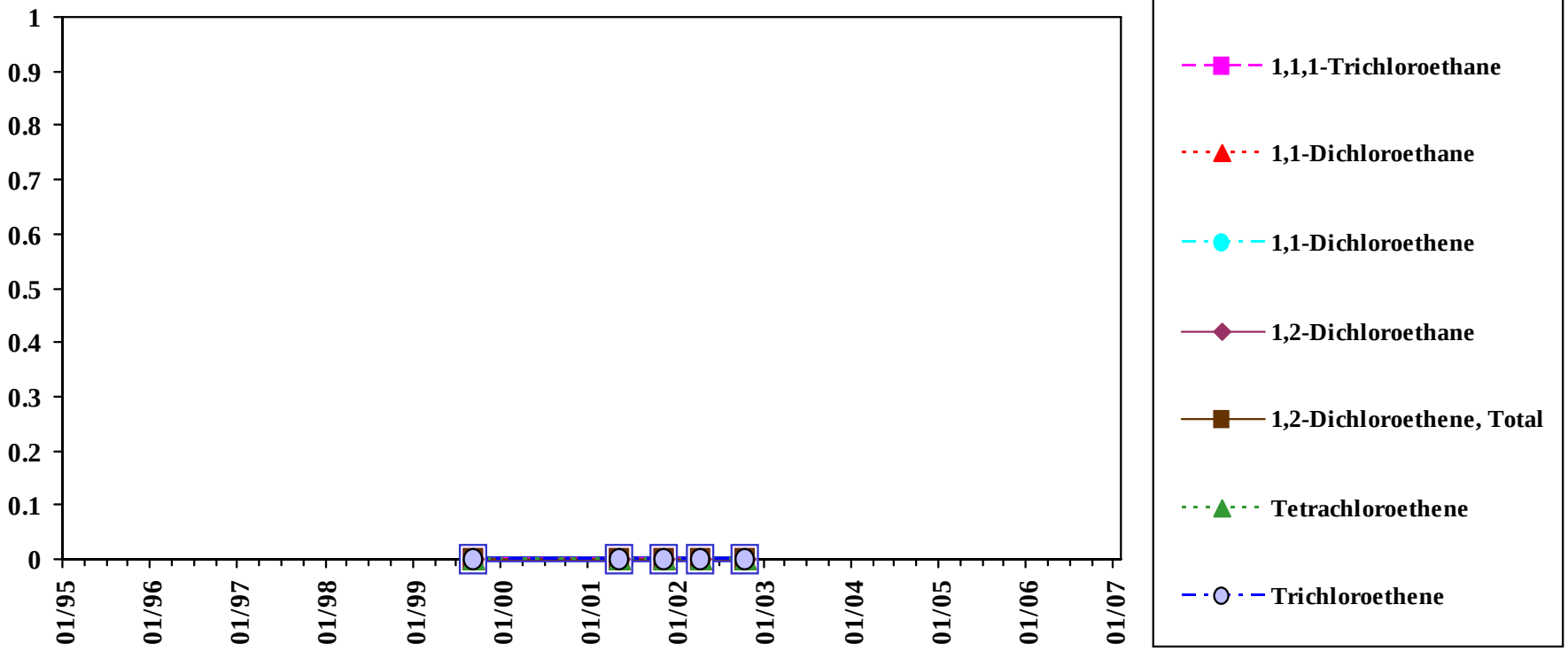
Sample Location:

MW-308

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

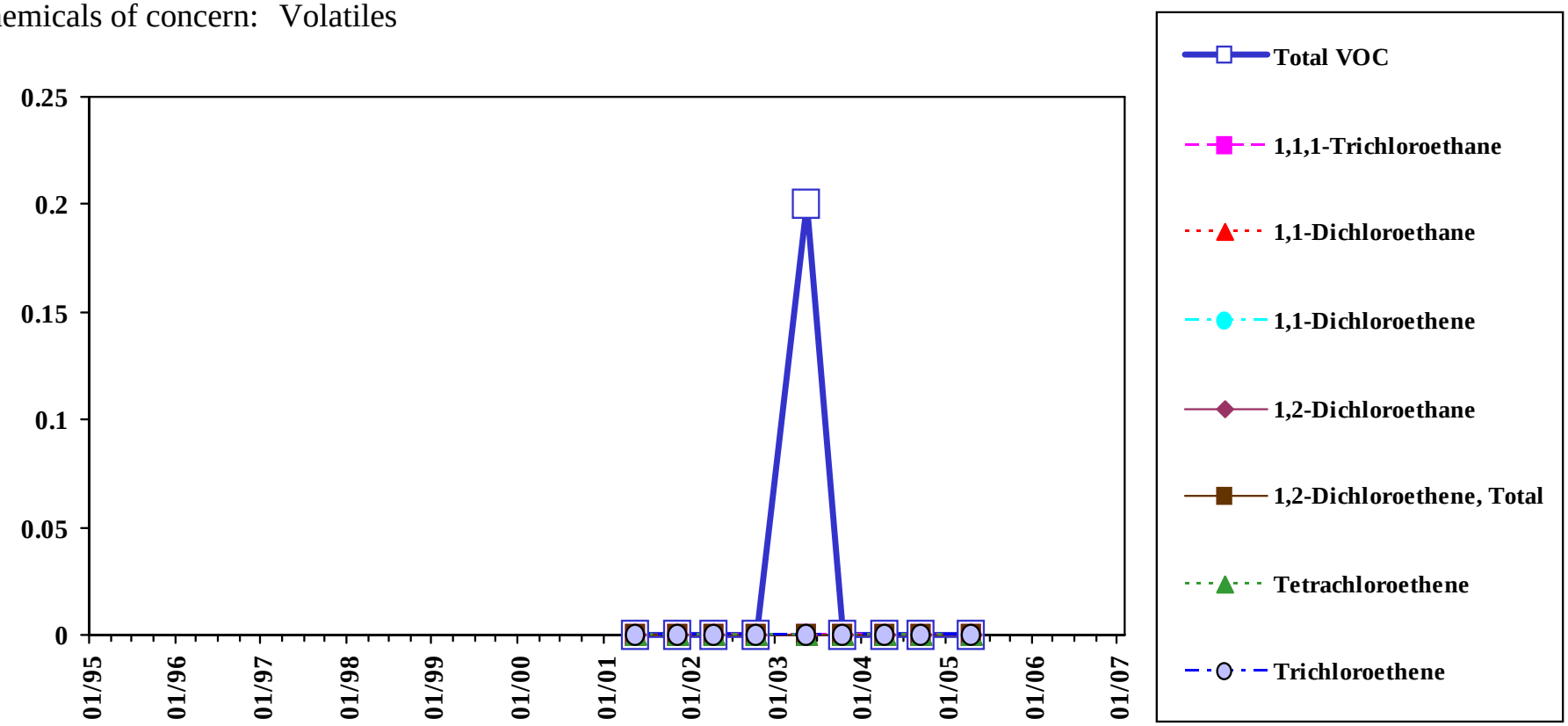
Sample Location:

MW-308

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

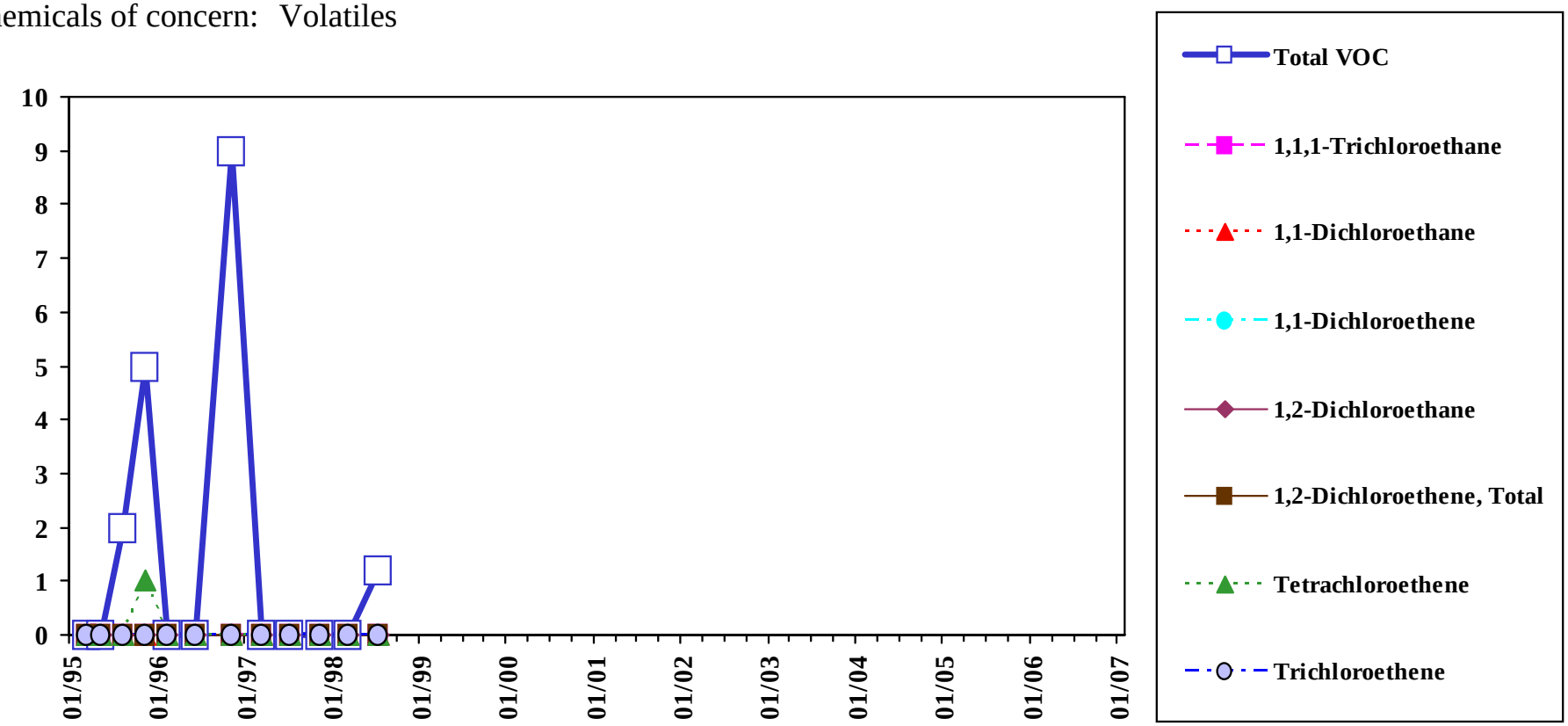
Sample Location:

MW-309A

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

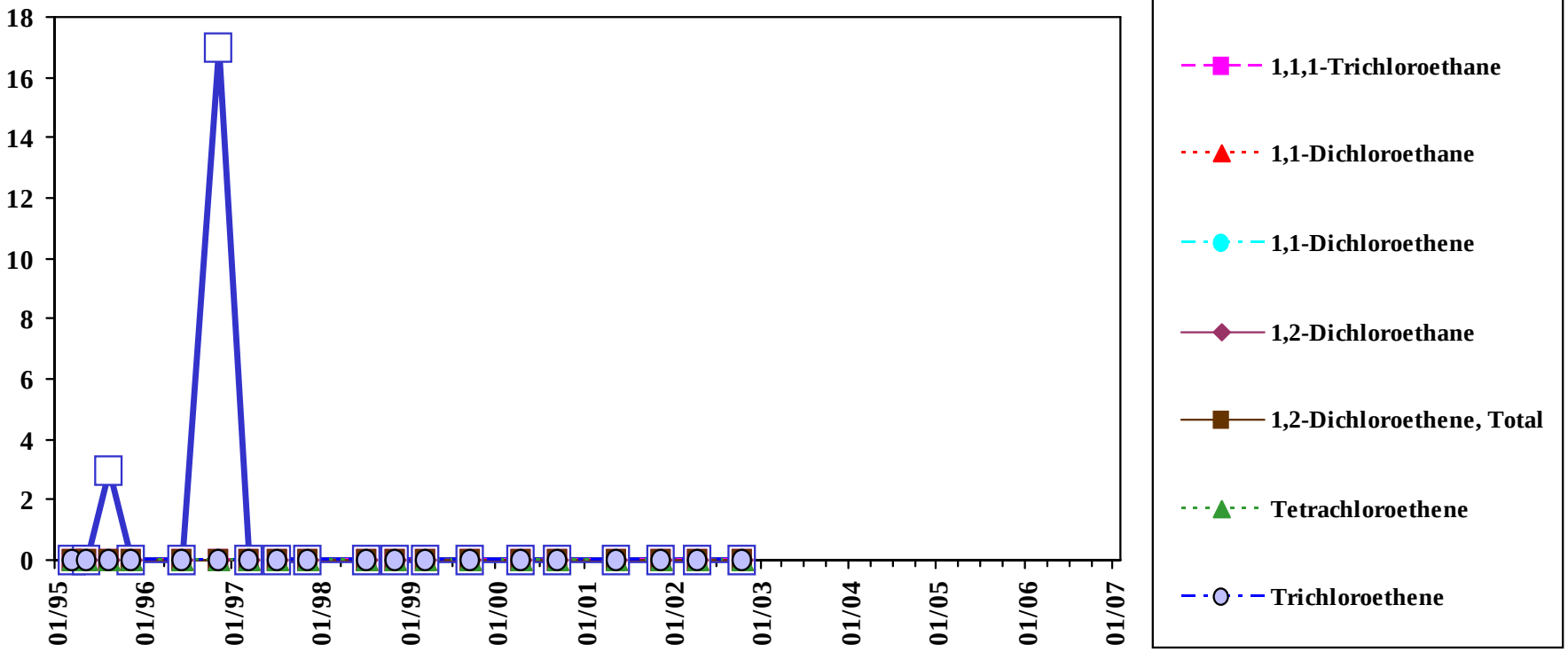
Sample Location:

MW-309B

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

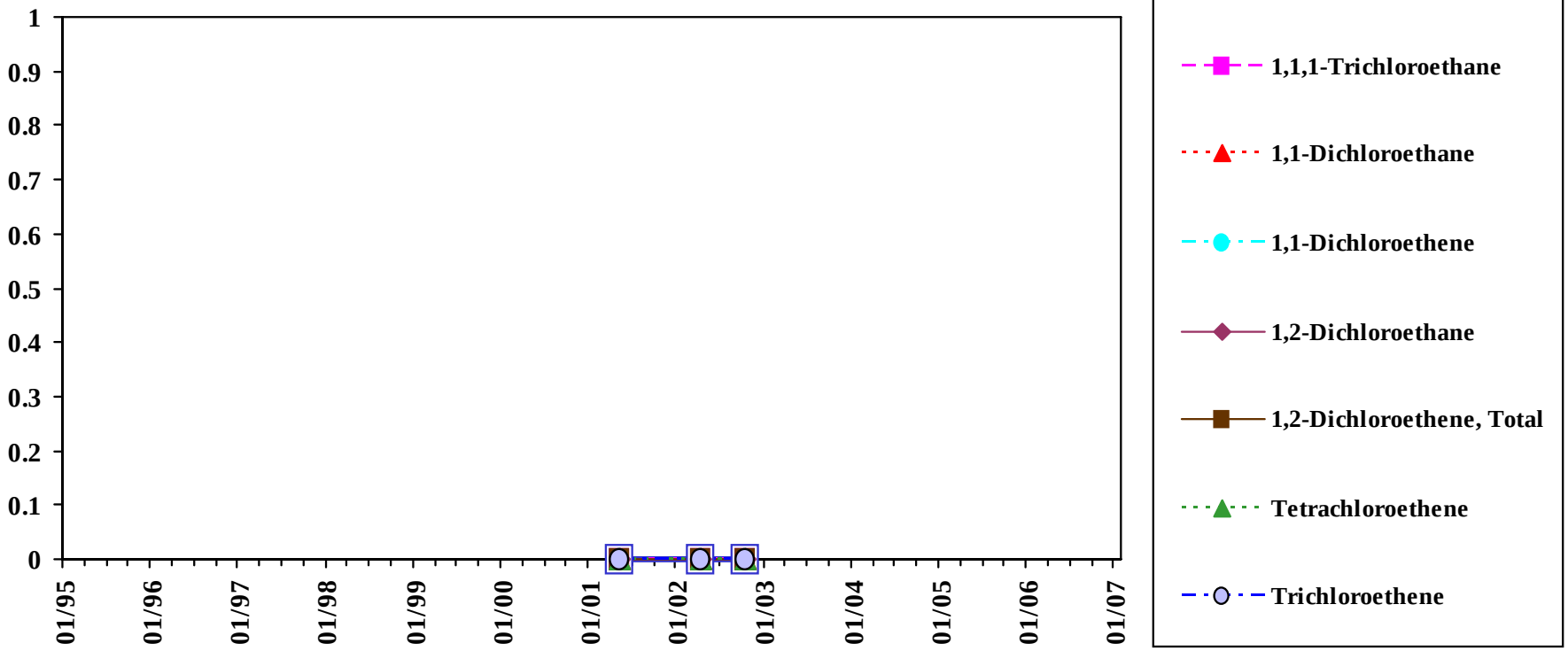
Sample Location:

MW-309B

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

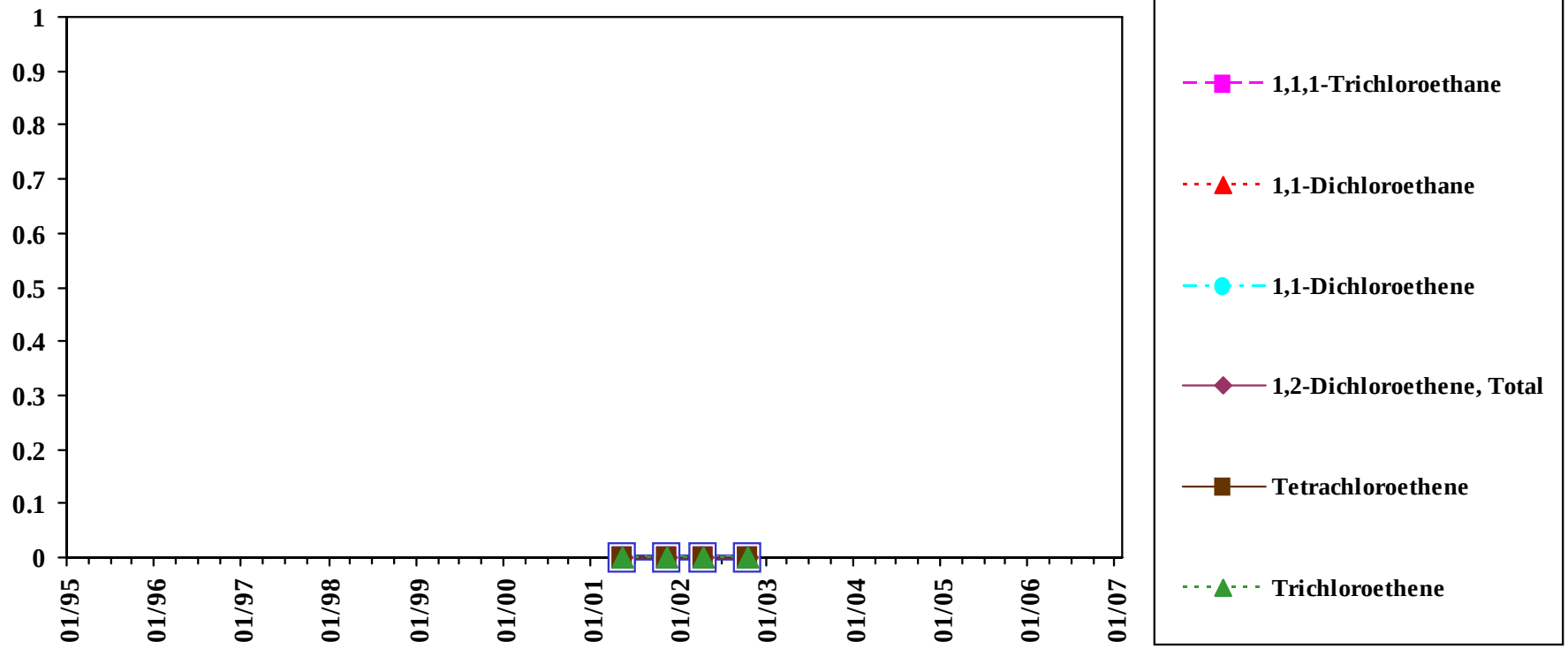
Sample Location:

MW-309B

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

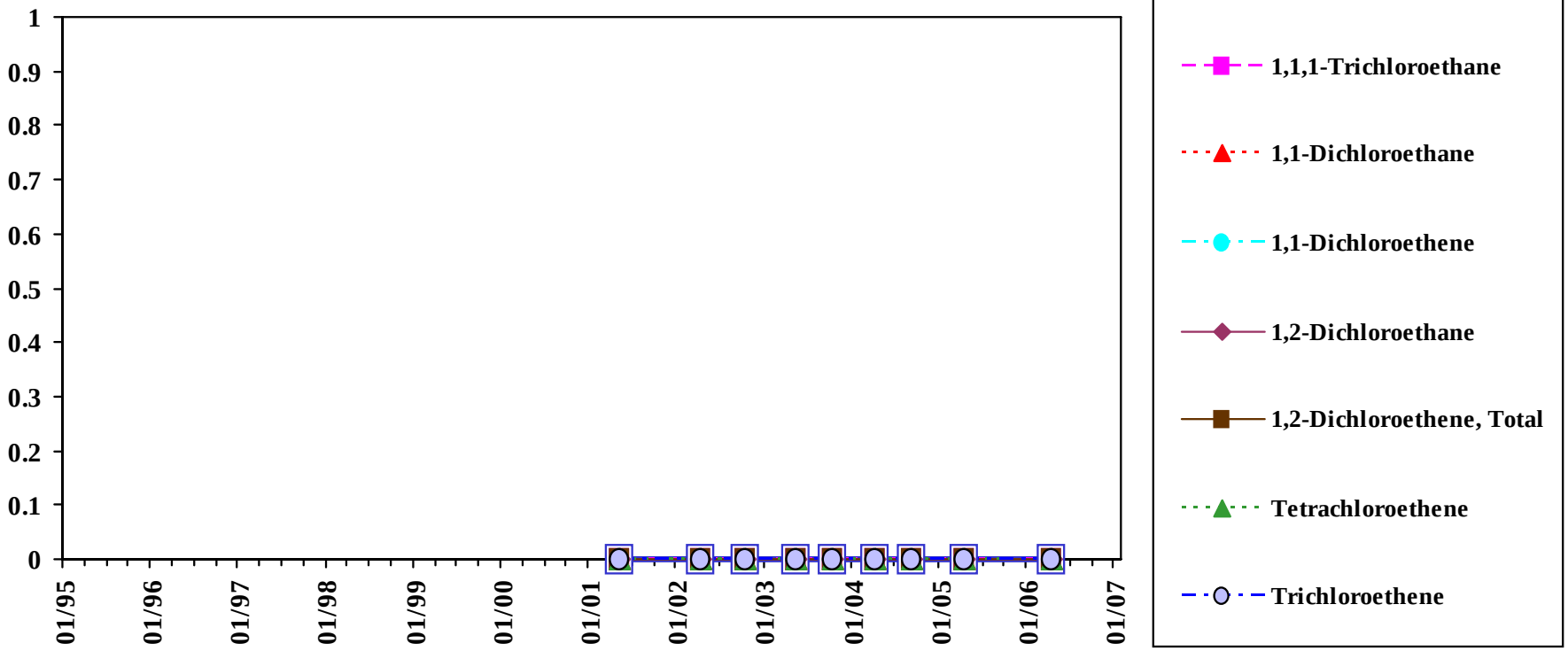
Sample Location:

MW-309B

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

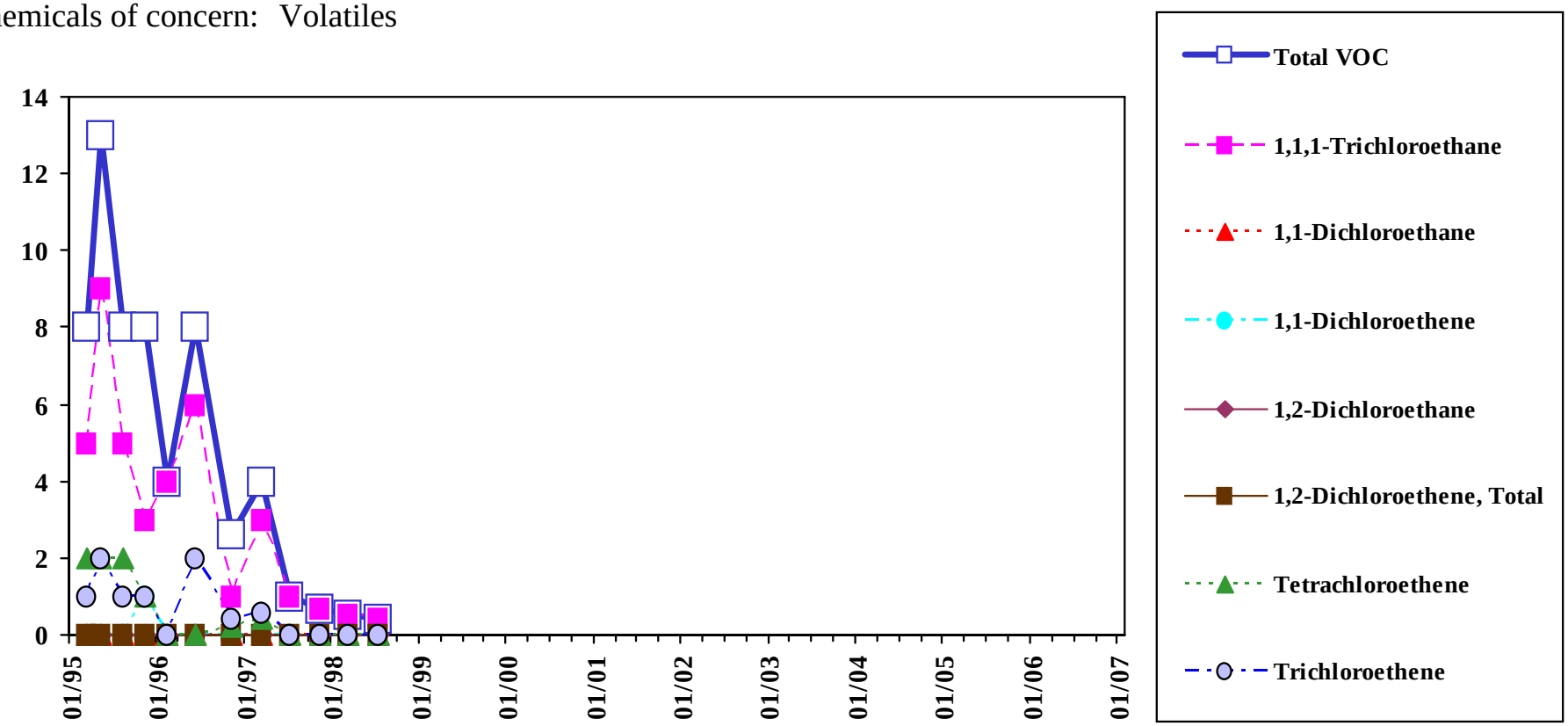
Sample Location:

MW-310

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

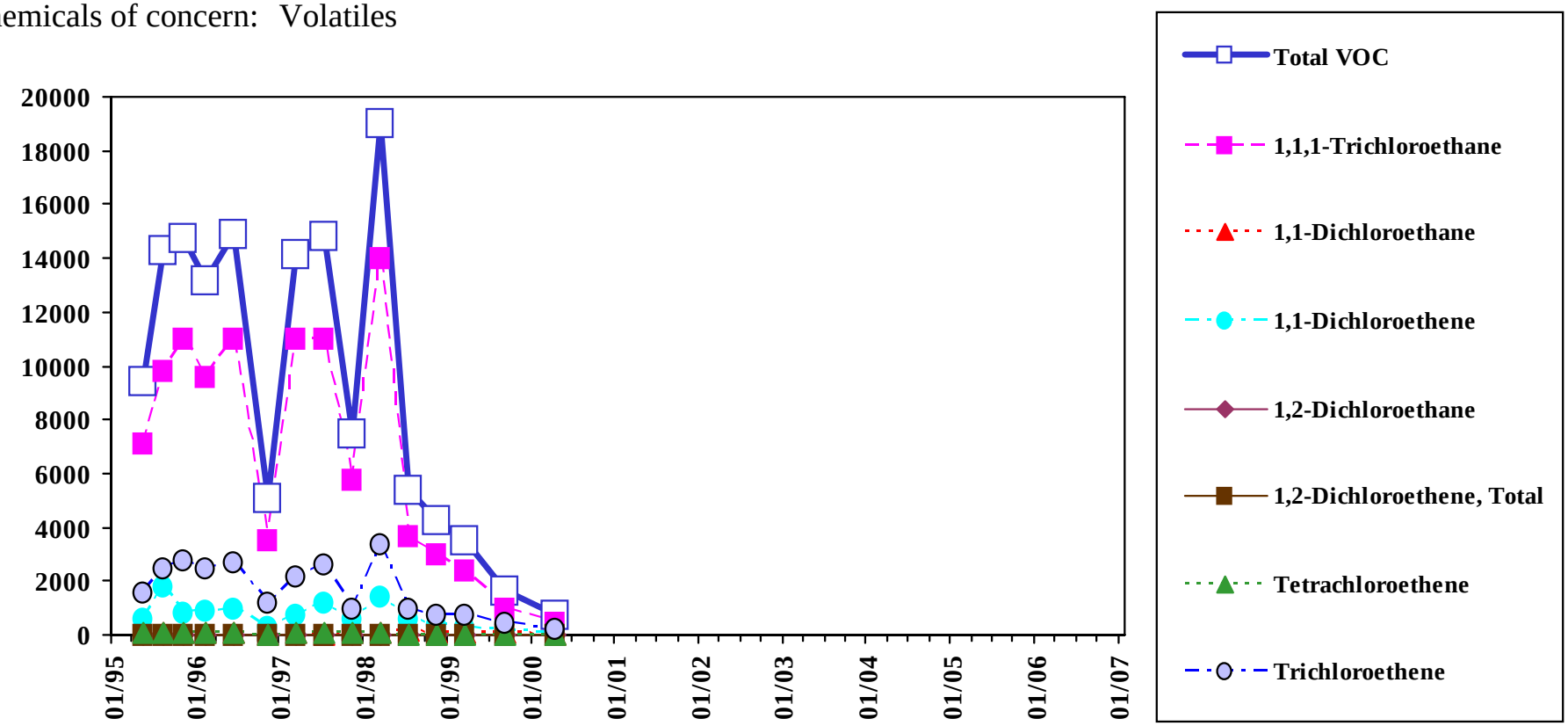
Sample Location:

MW-311

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

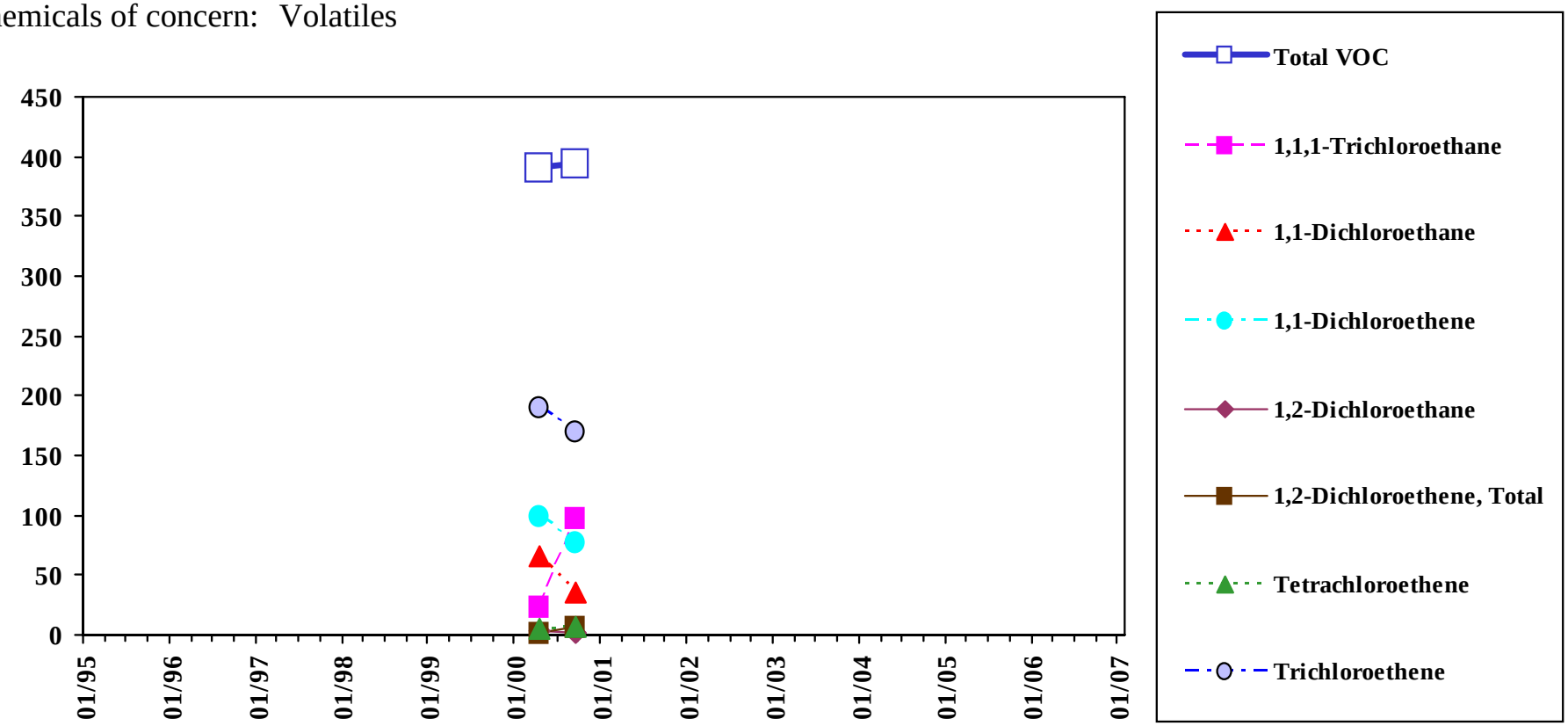
Sample Location:

MW-311

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

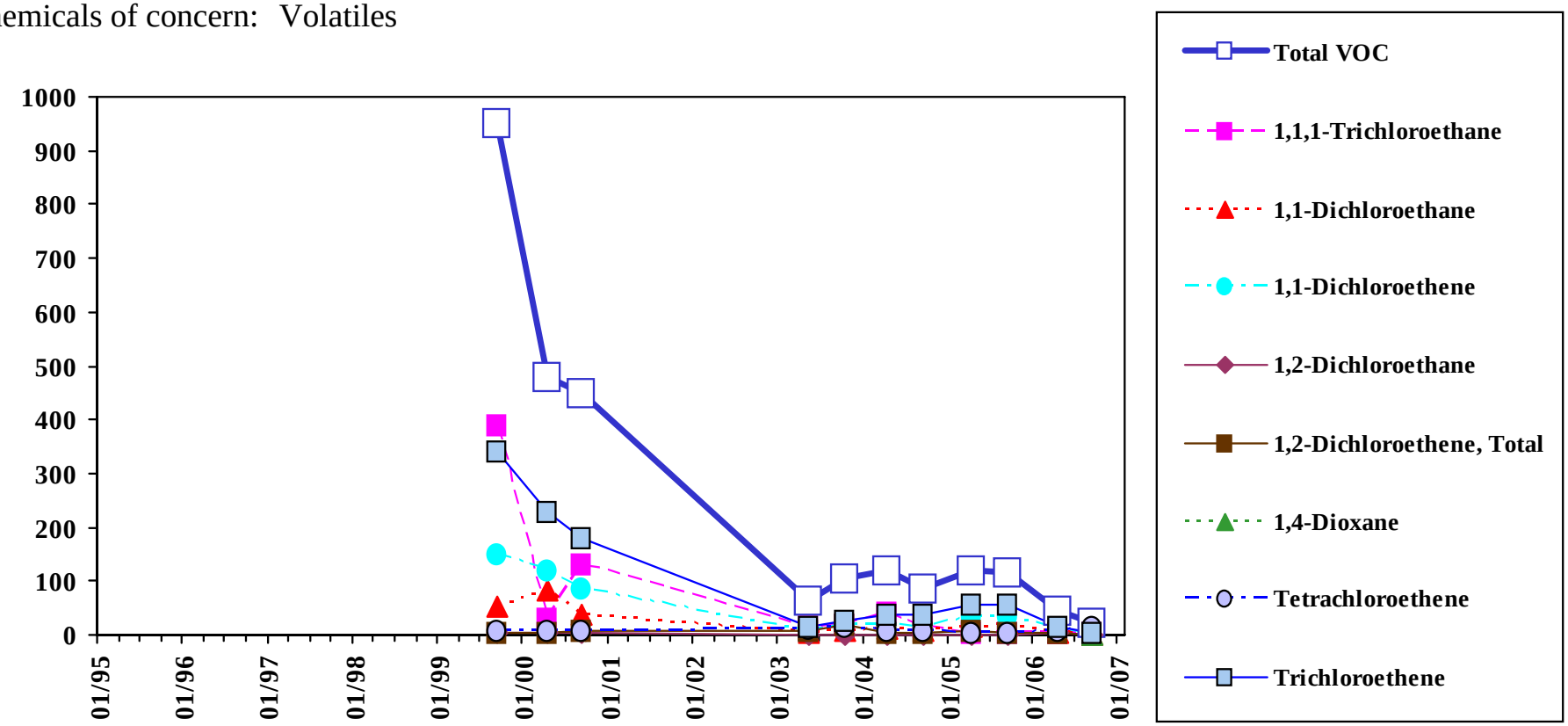
Sample Location:

MW-311

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

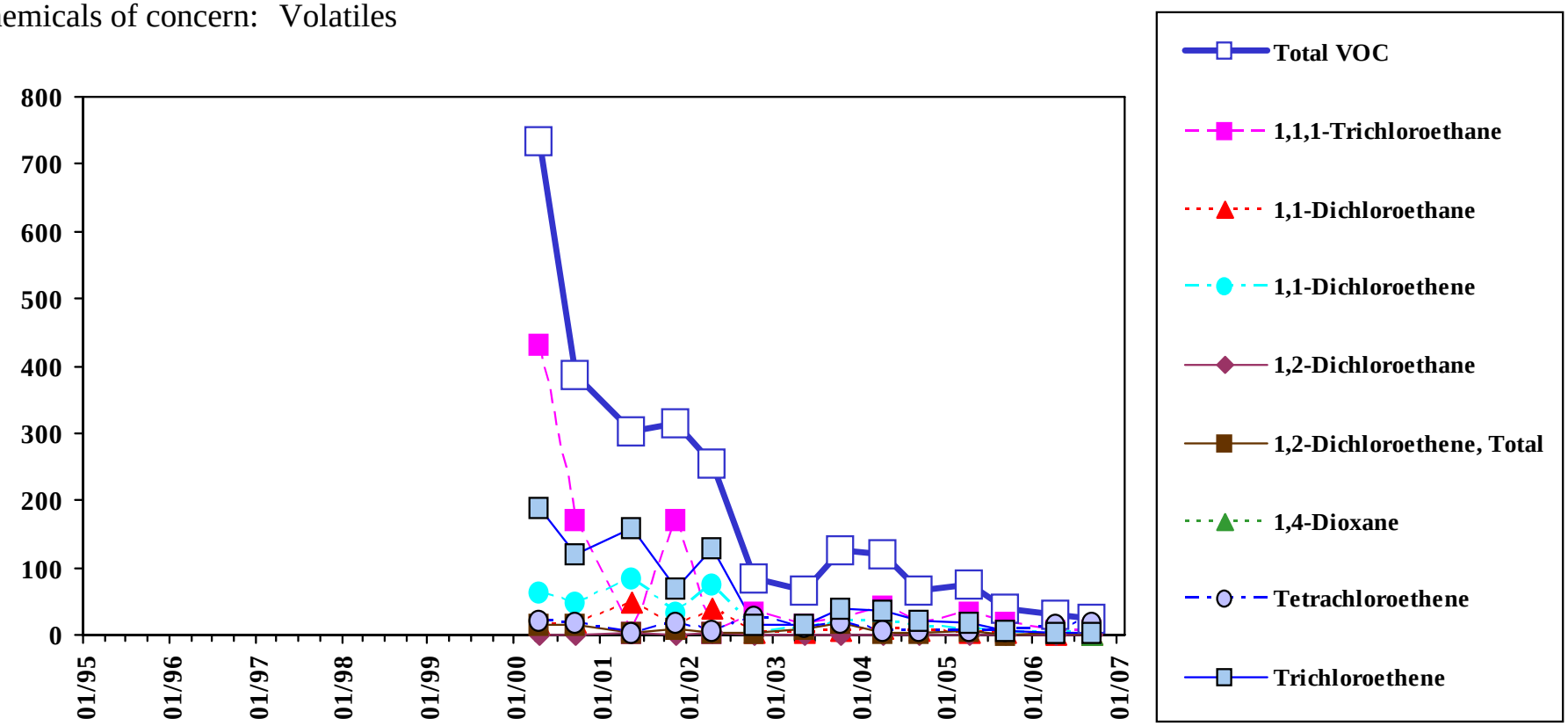
Sample Location:

MW-311

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

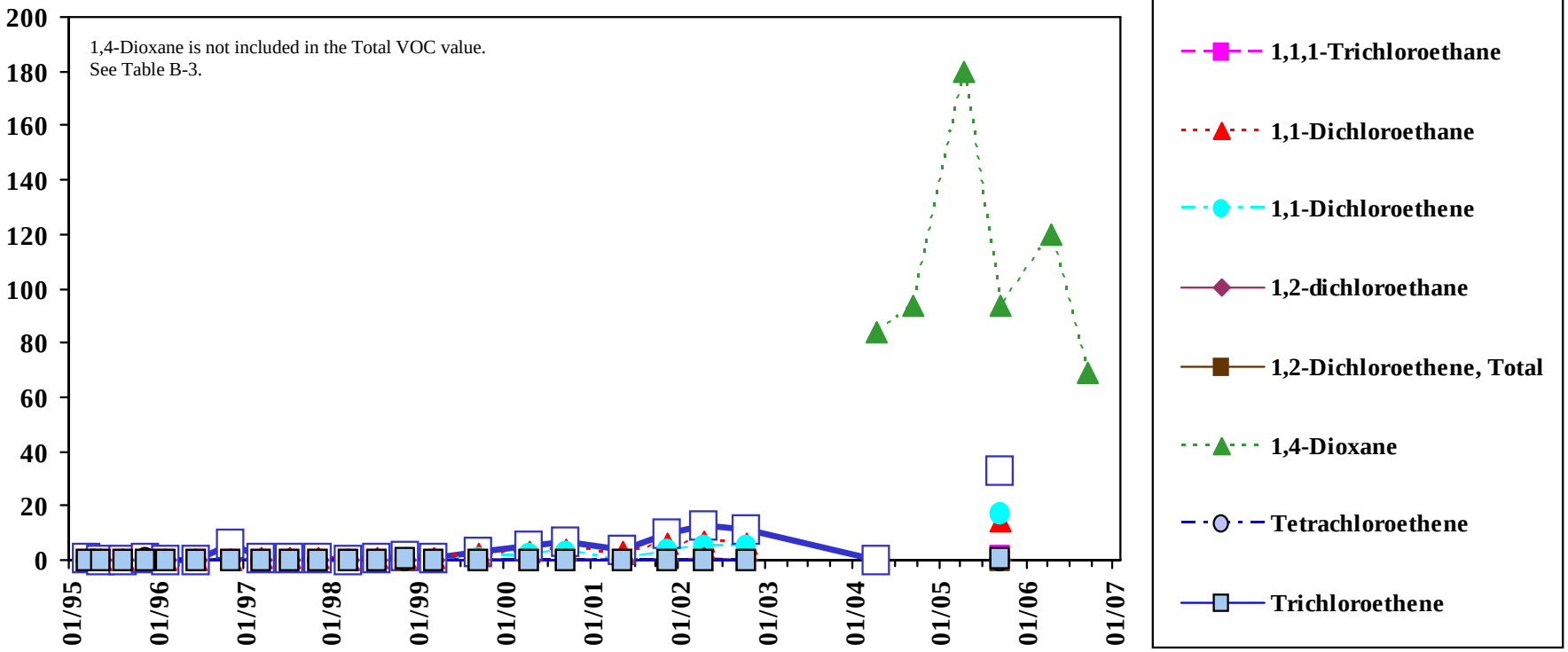
Sample Location:

MW-313

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

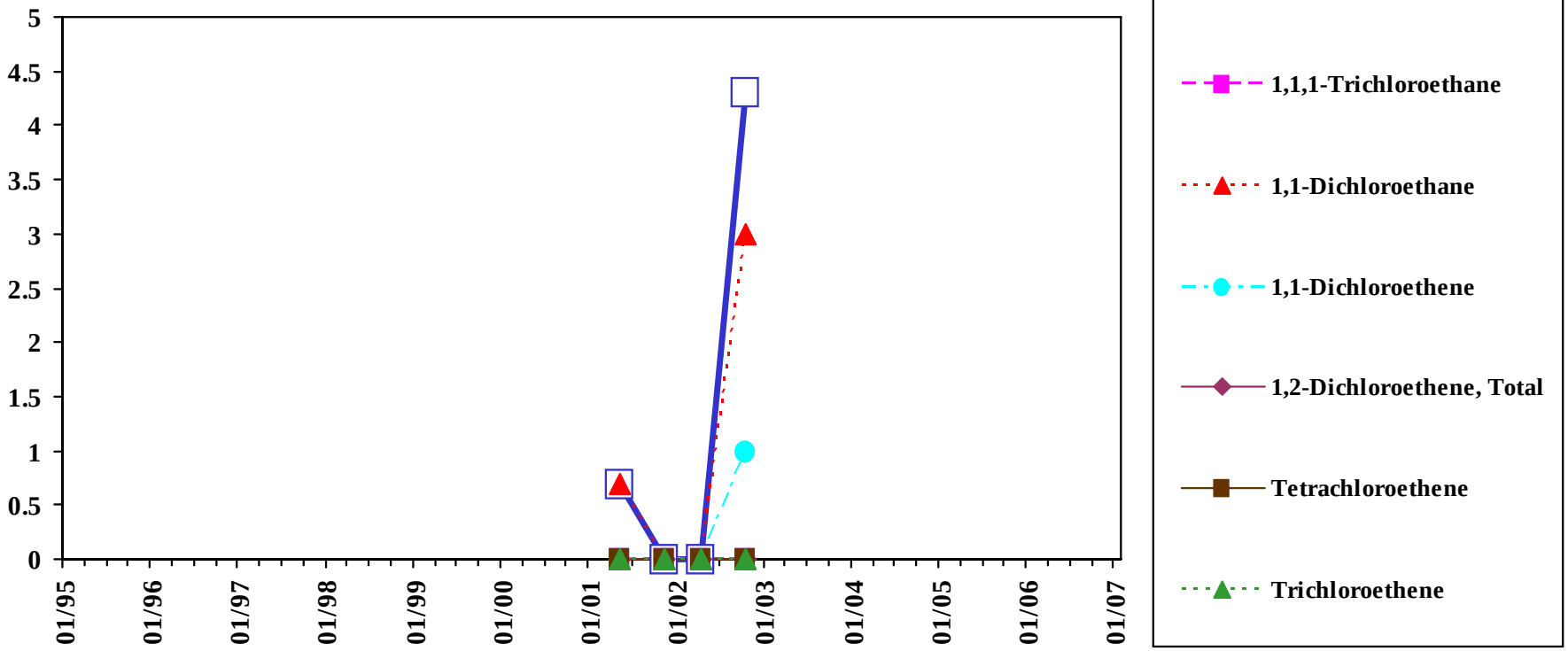
Sample Location:

MW-313

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

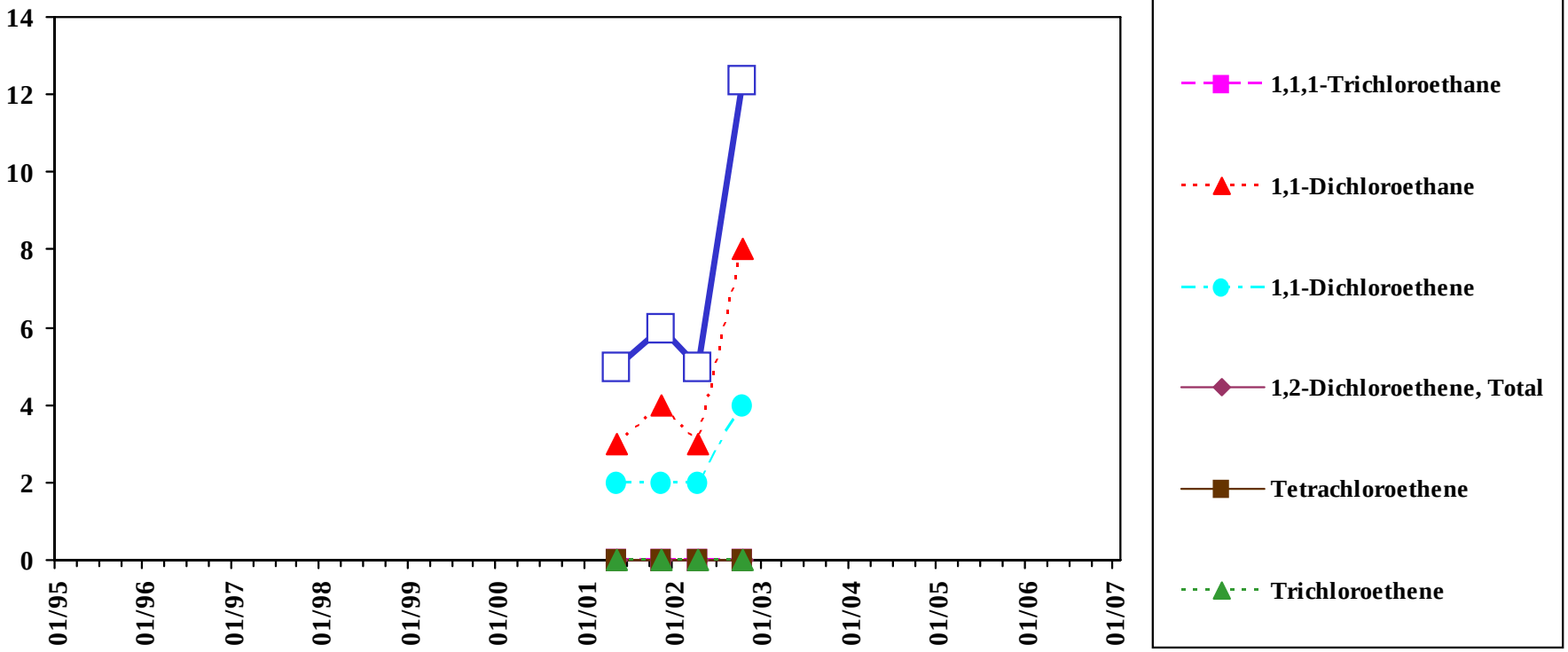
Sample Location:

MW-313

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

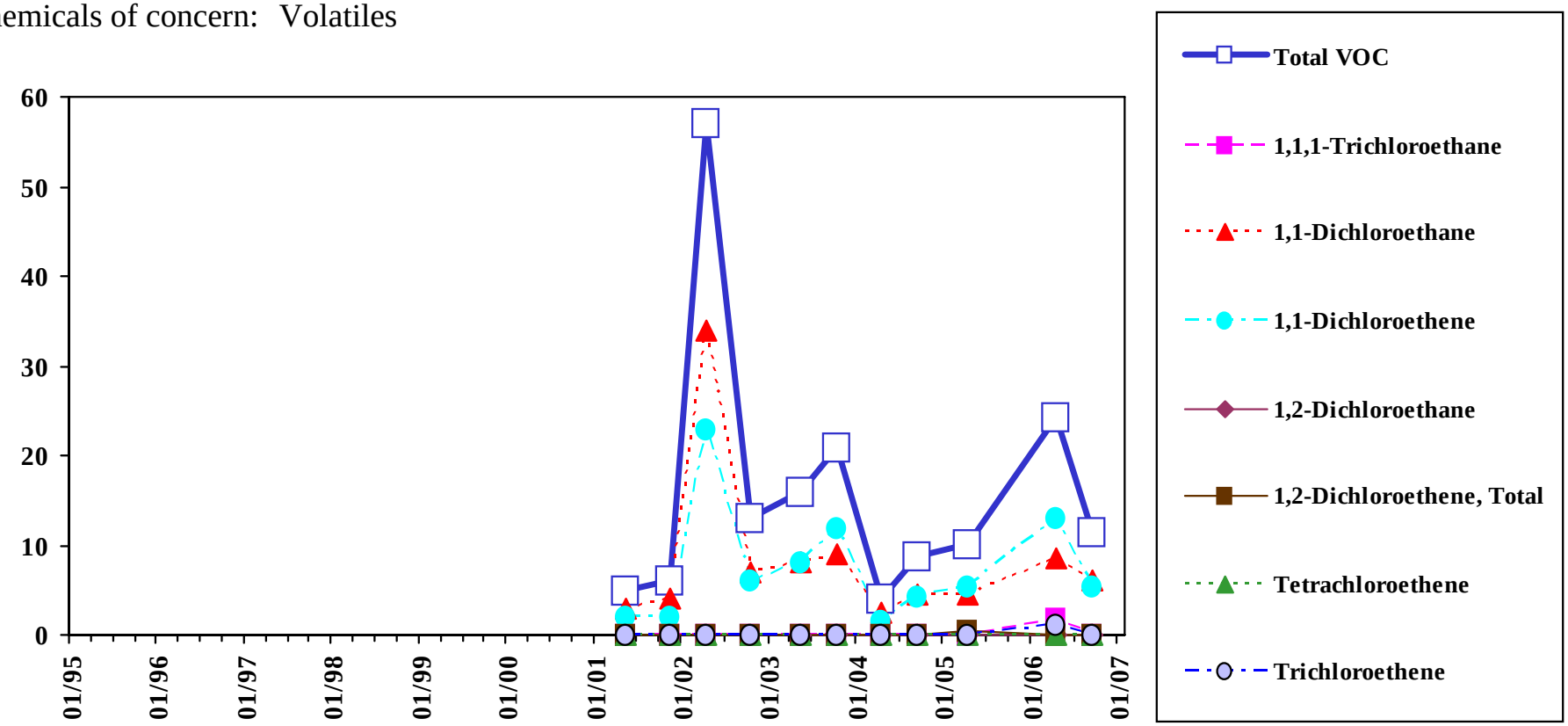
Sample Location:

MW-313

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

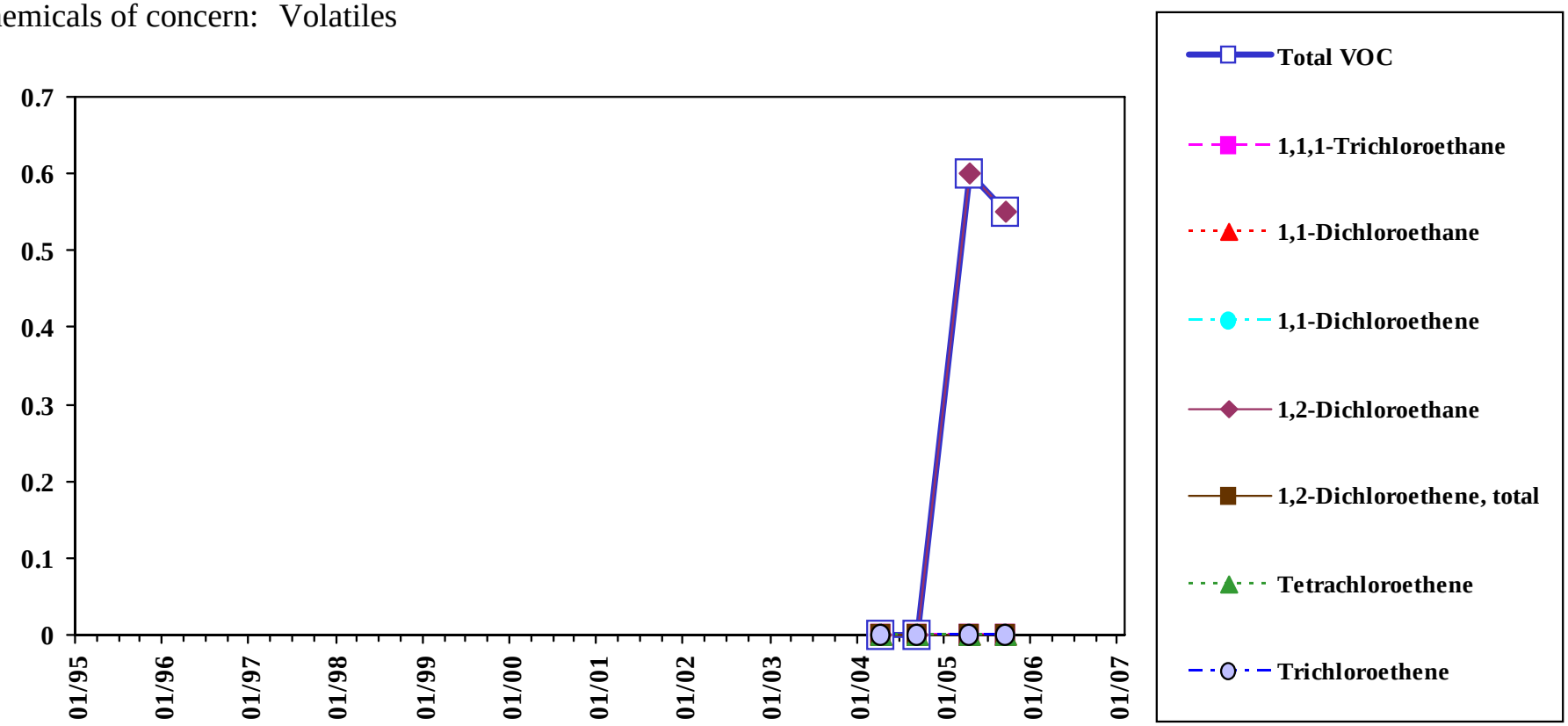
Sample Location:

MW-315A

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

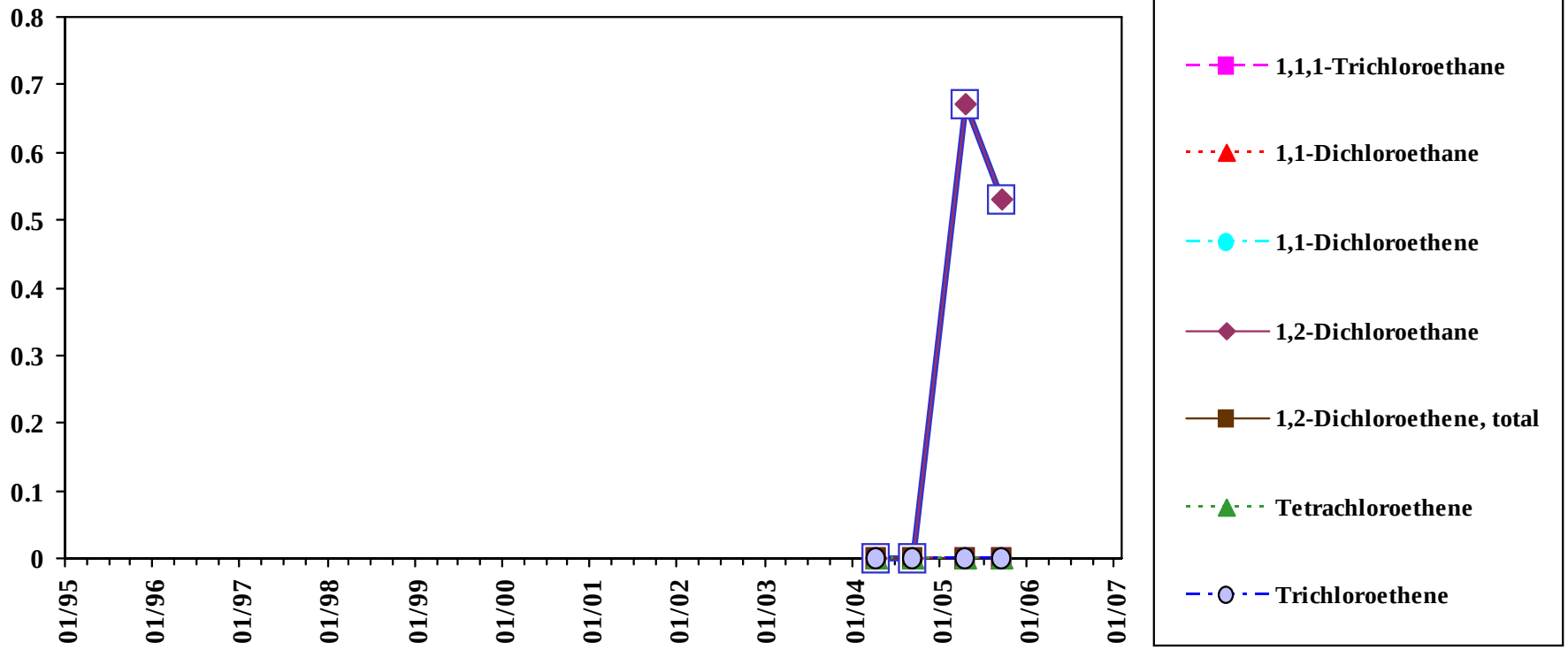
Sample Location:

MW-315A

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

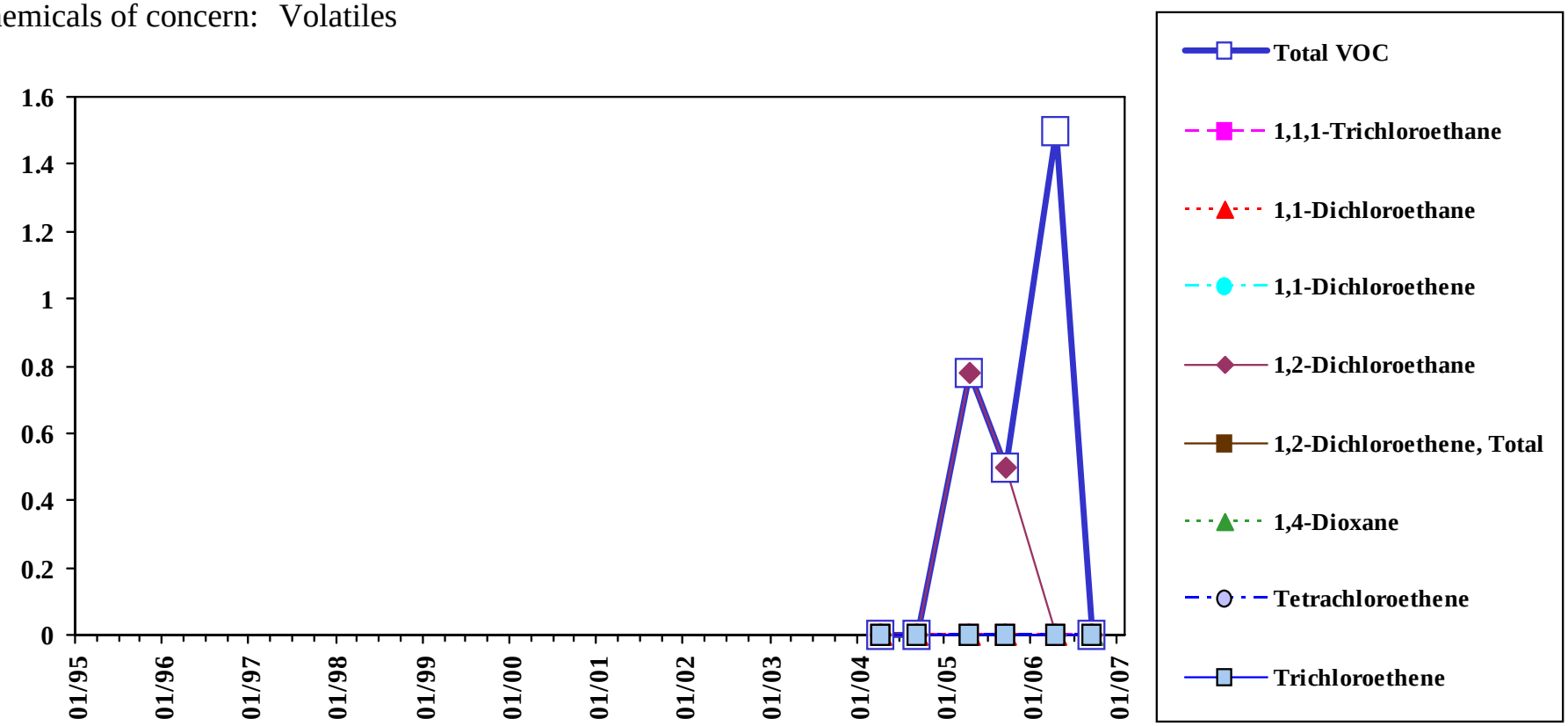
Sample Location:

MW-315A

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

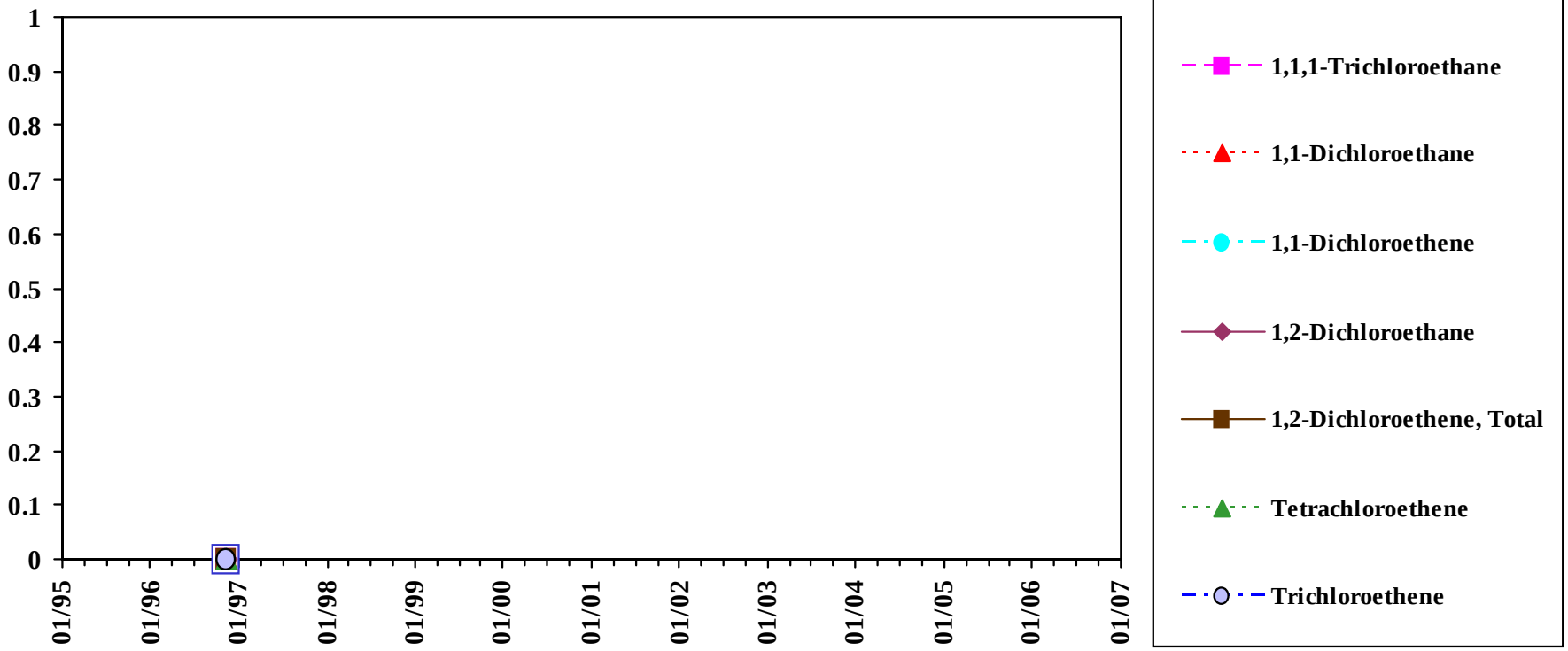
Sample Location:

MW-316A

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

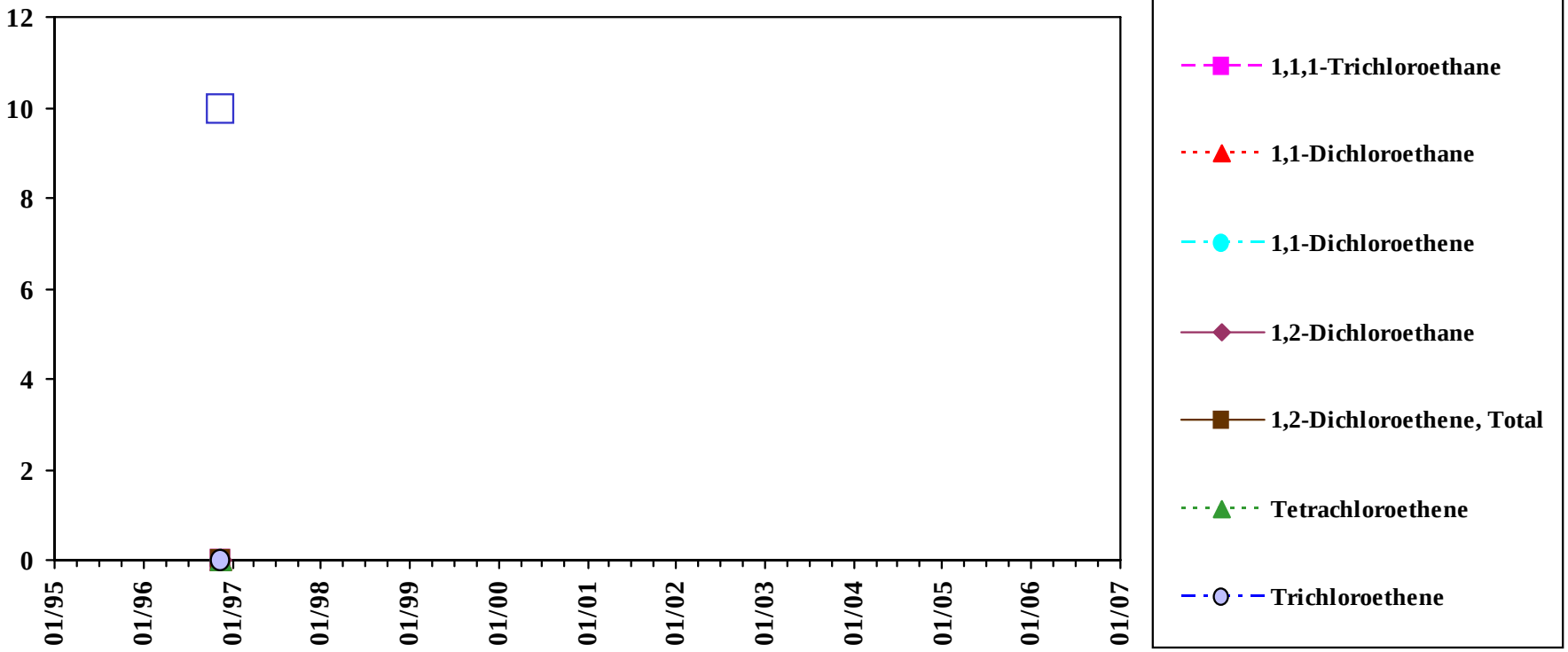
Sample Location:

MW-316B

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

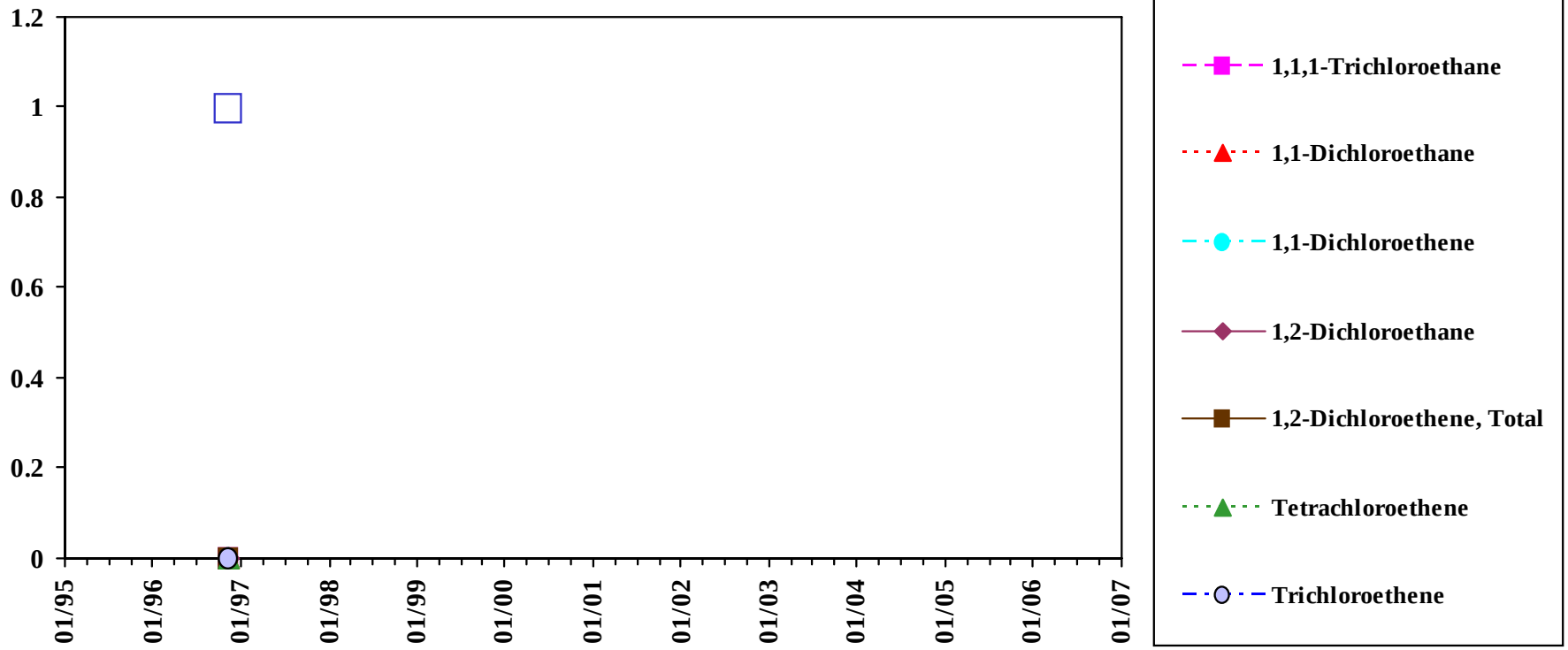
Sample Location:

MW-317A

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

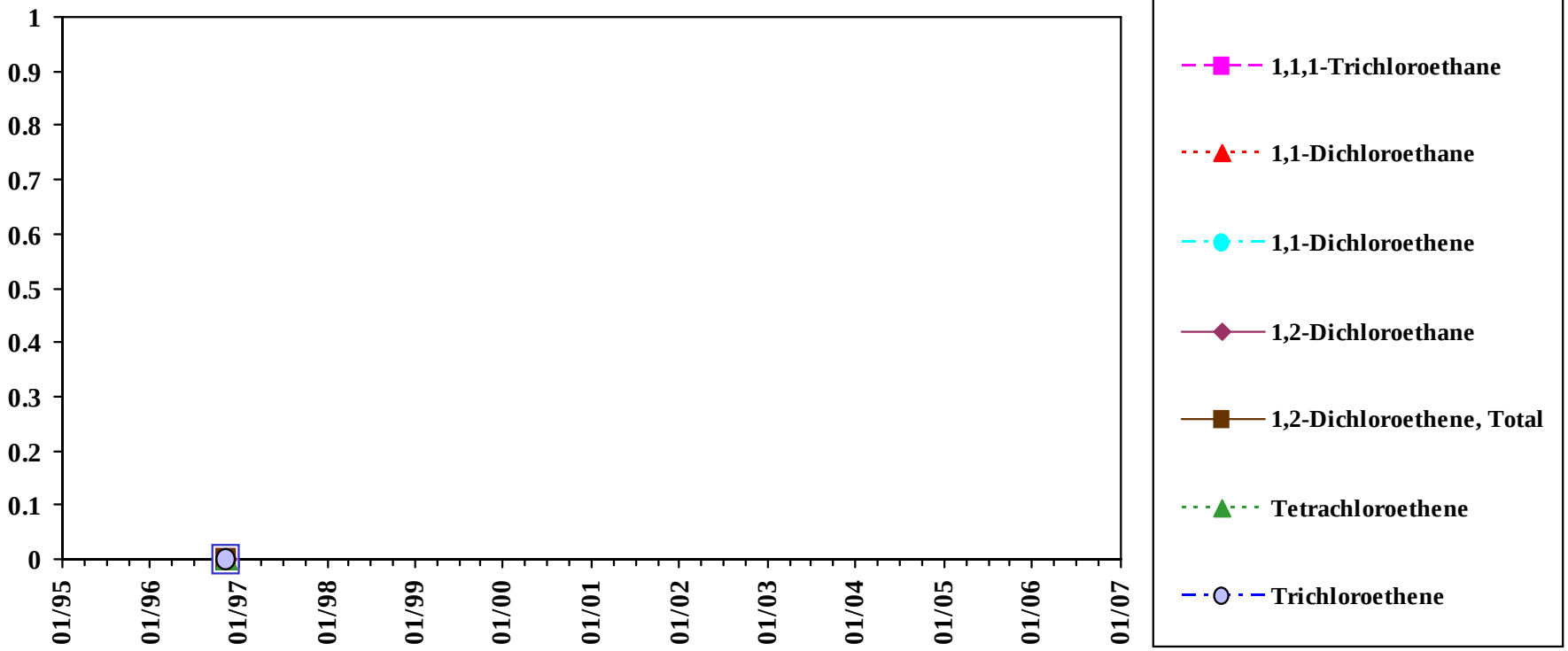
Sample Location:

MW-317B

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

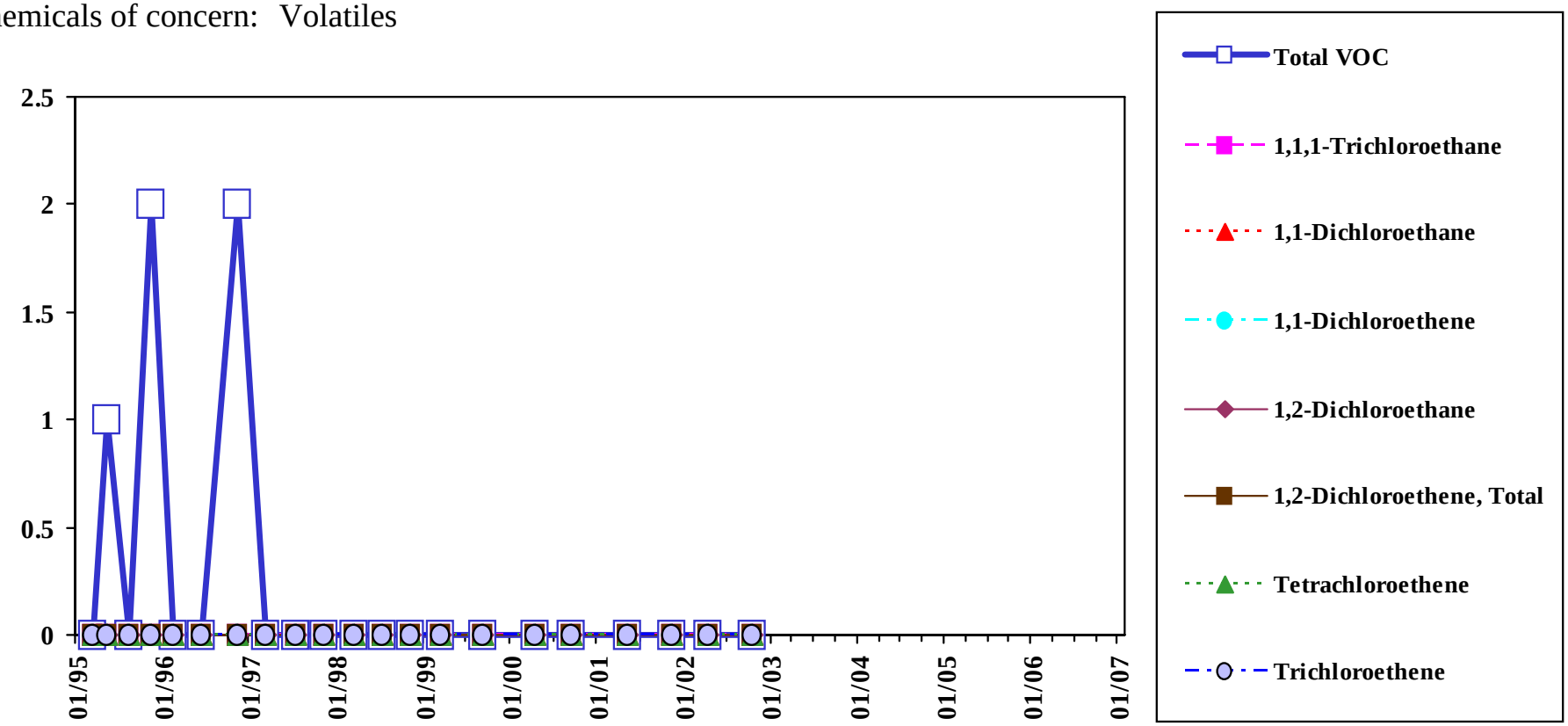
Sample Location:

MW-318

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

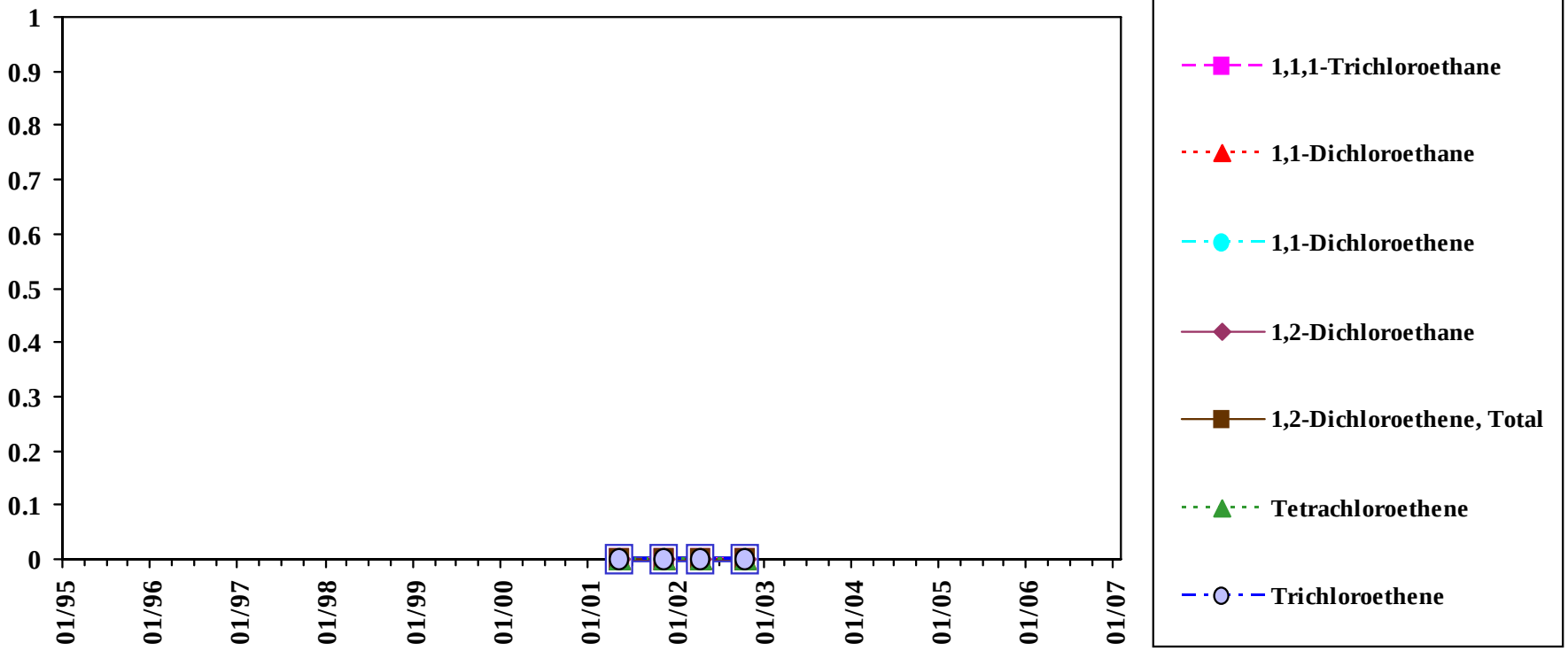
Sample Location:

MW-318

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

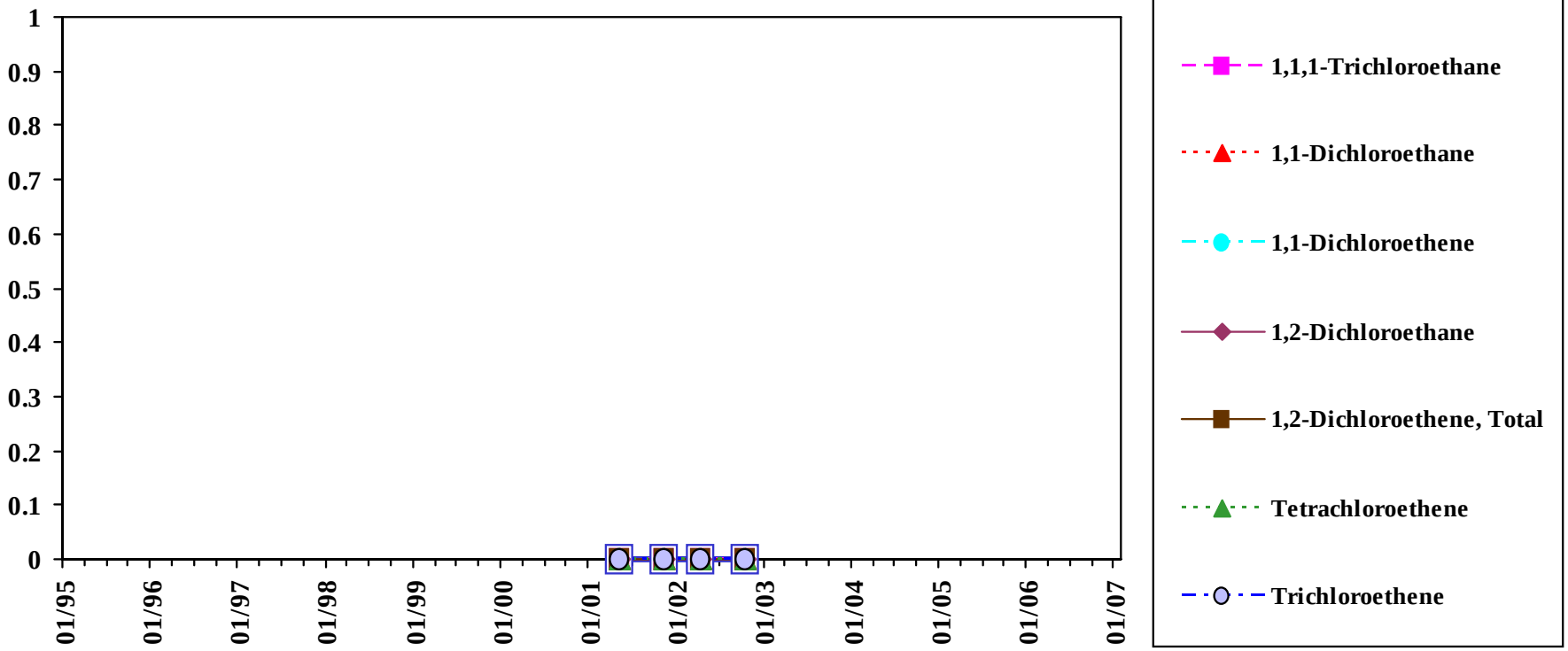
Sample Location:

MW-318

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

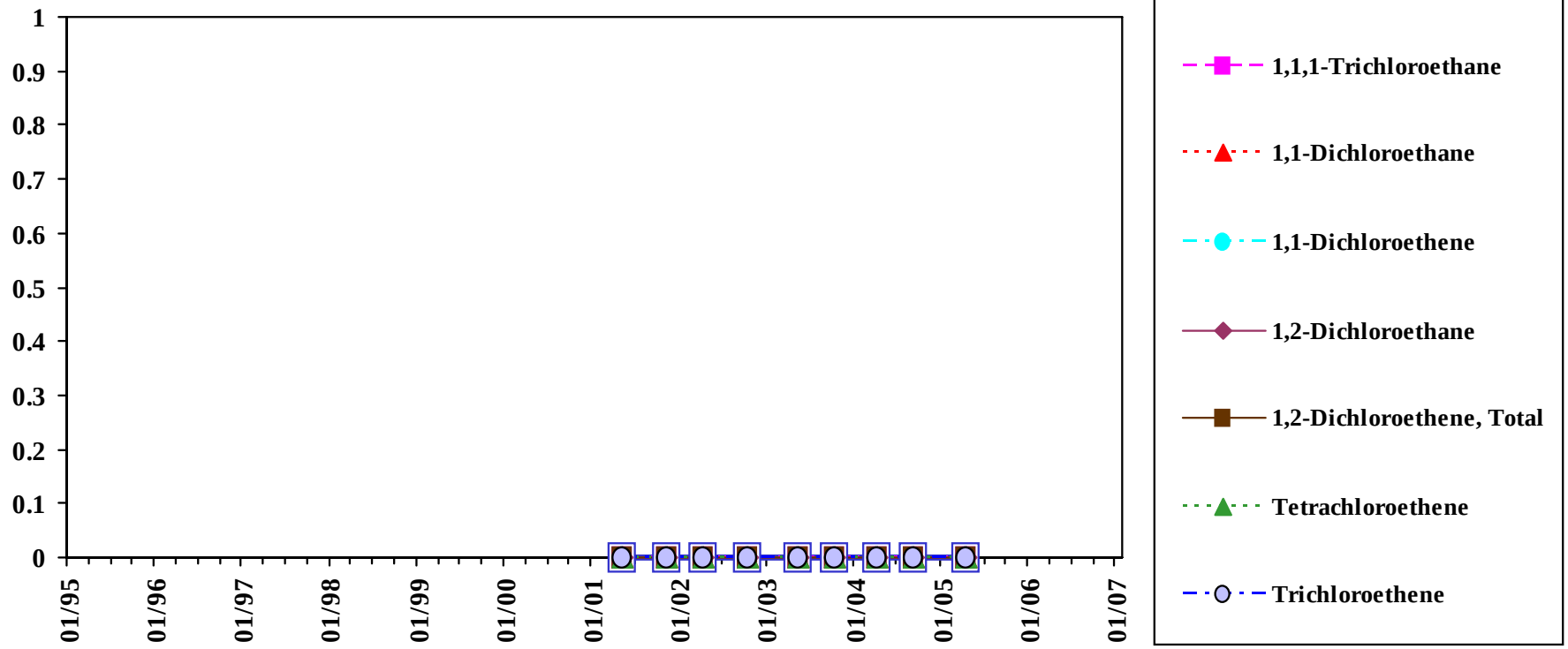
Sample Location:

MW-318

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

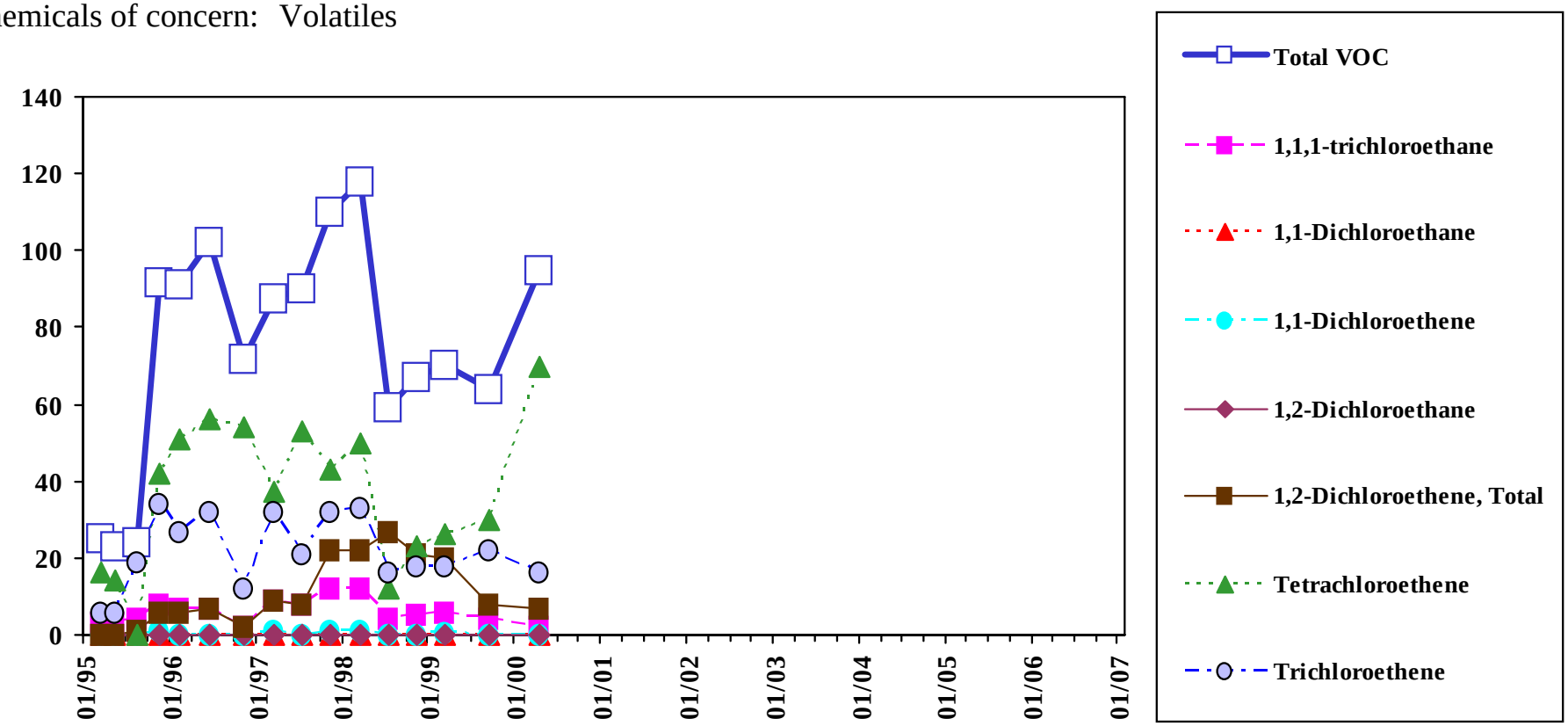
Sample Location:

MW-319

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

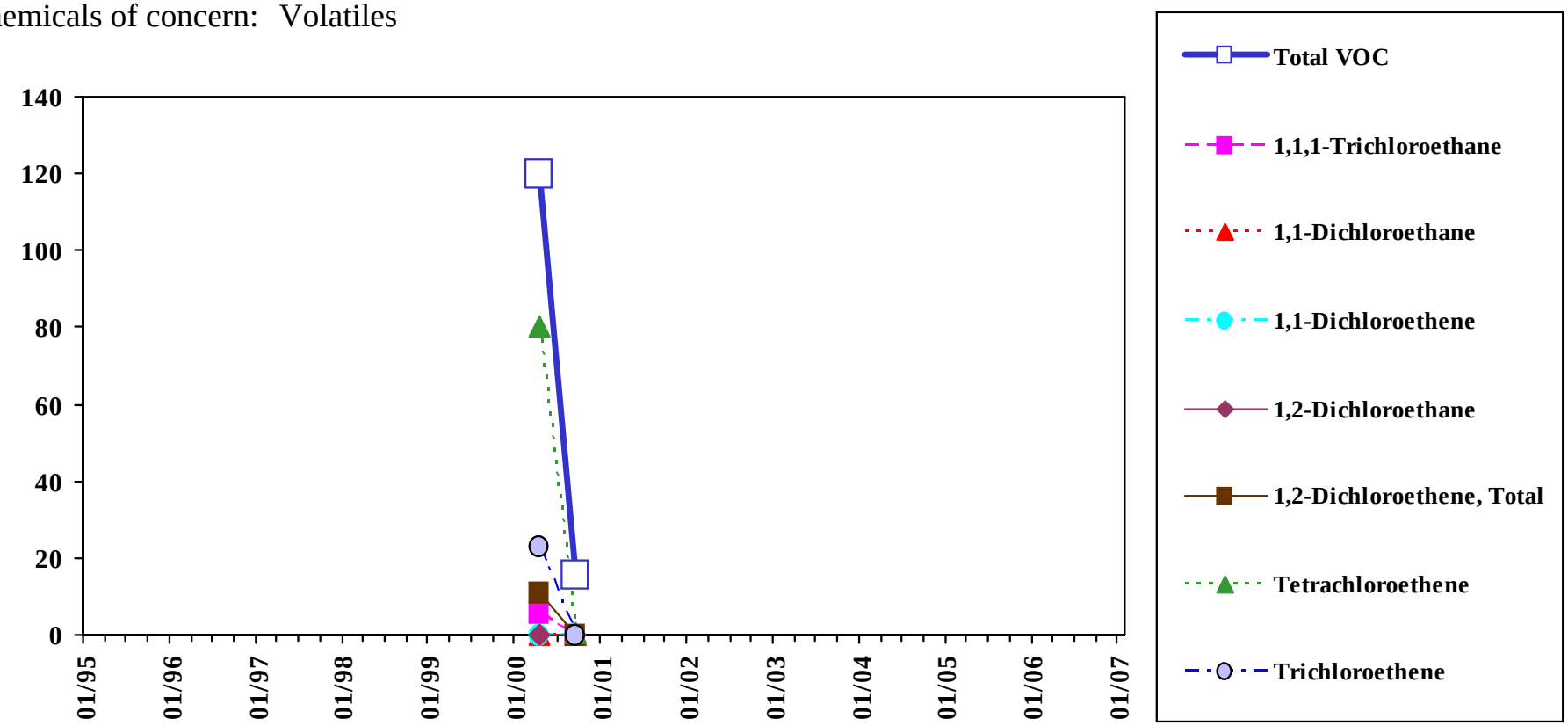
Sample Location:

MW-319

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

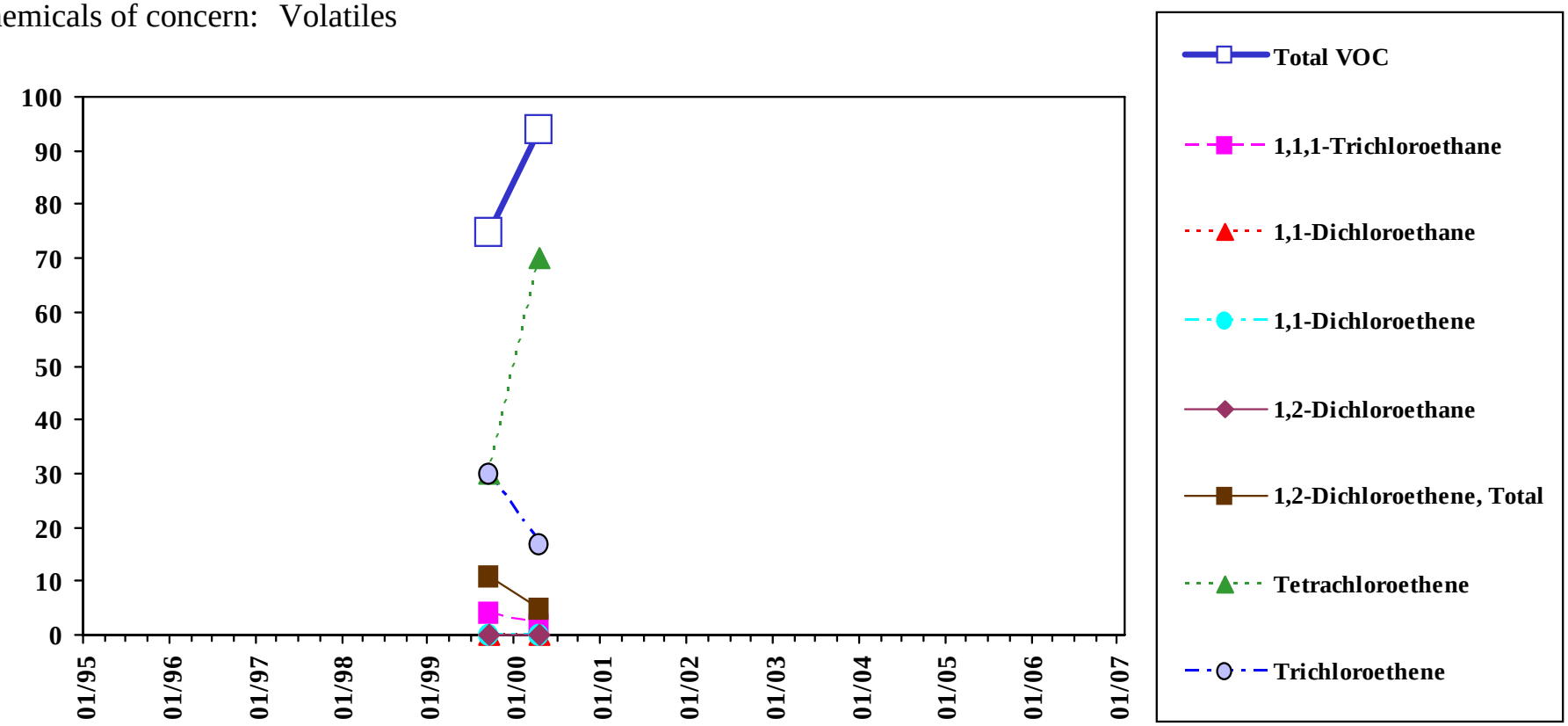
Sample Location:

MW-319

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

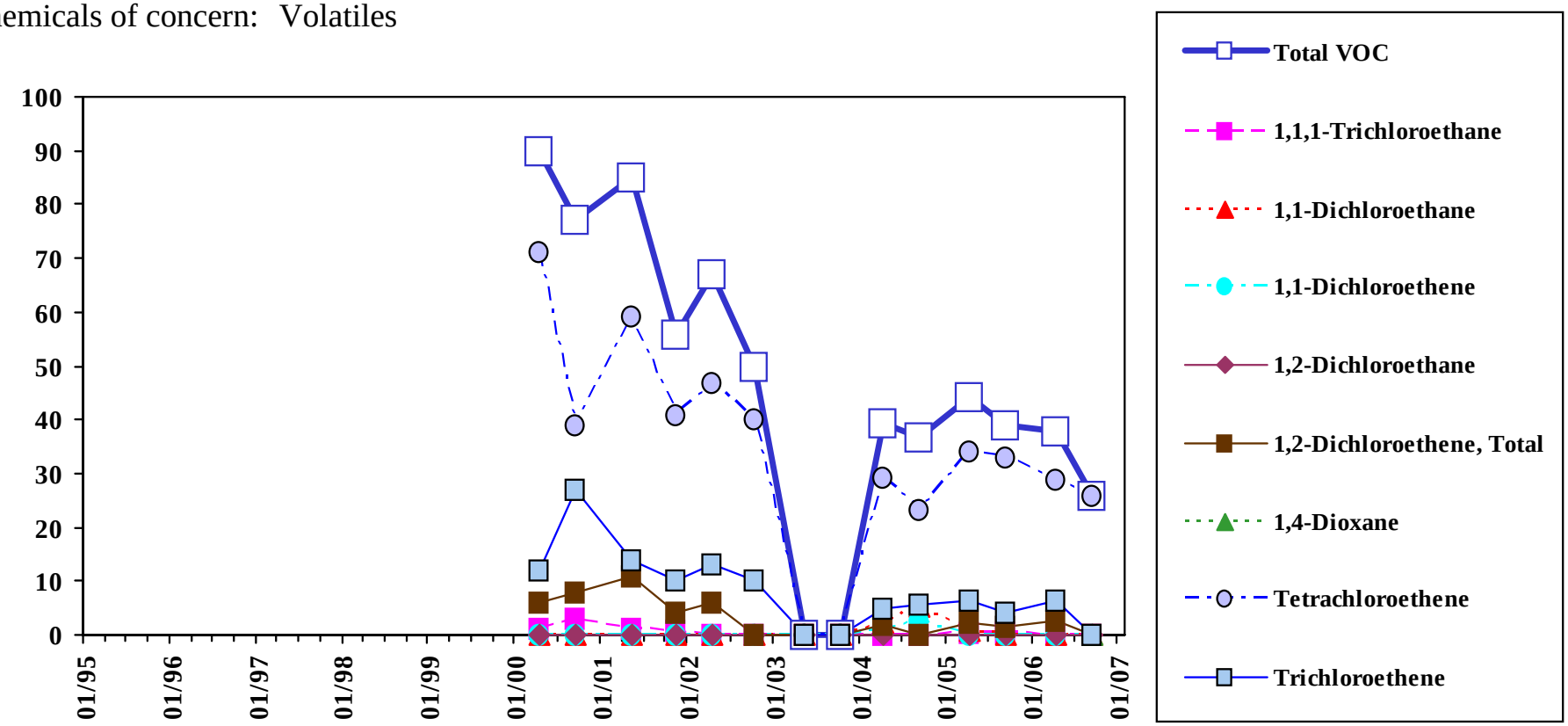
Sample Location:

MW-319

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

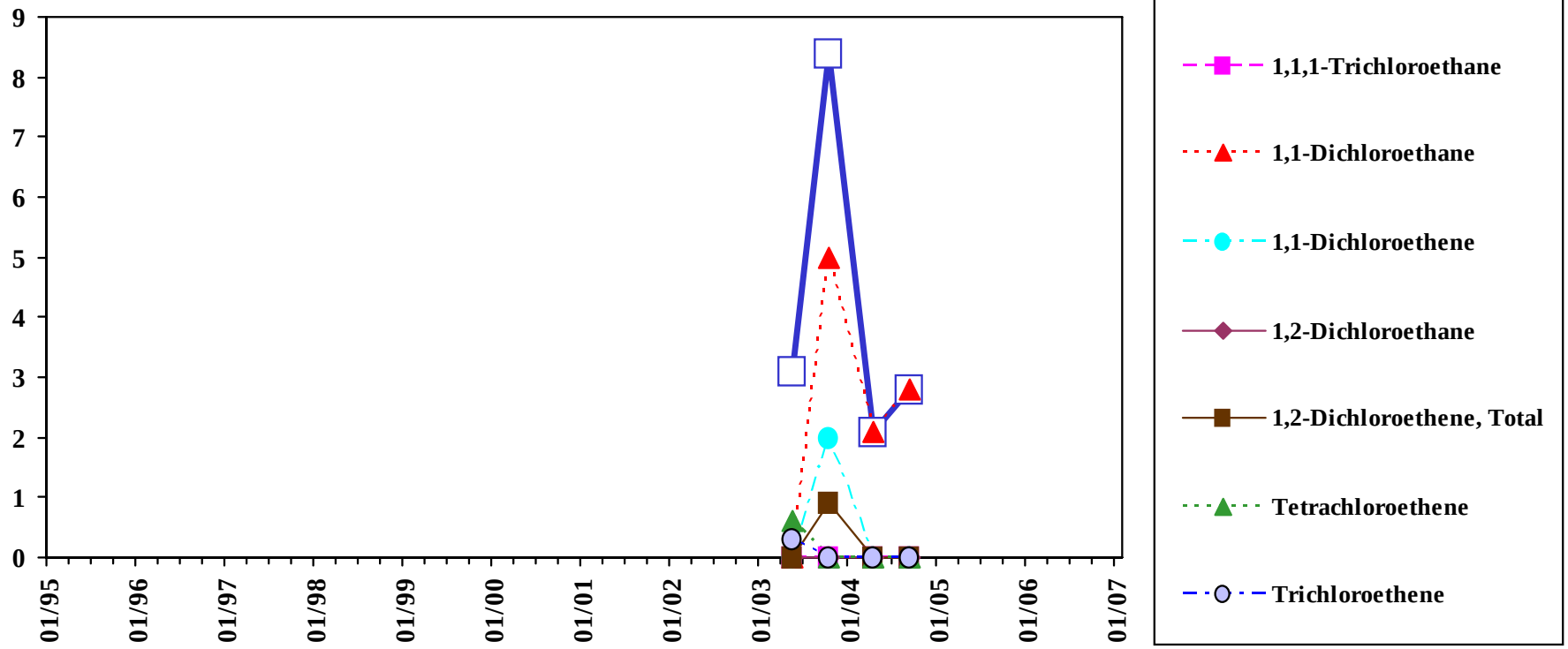
Sample Location:

MW-323

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

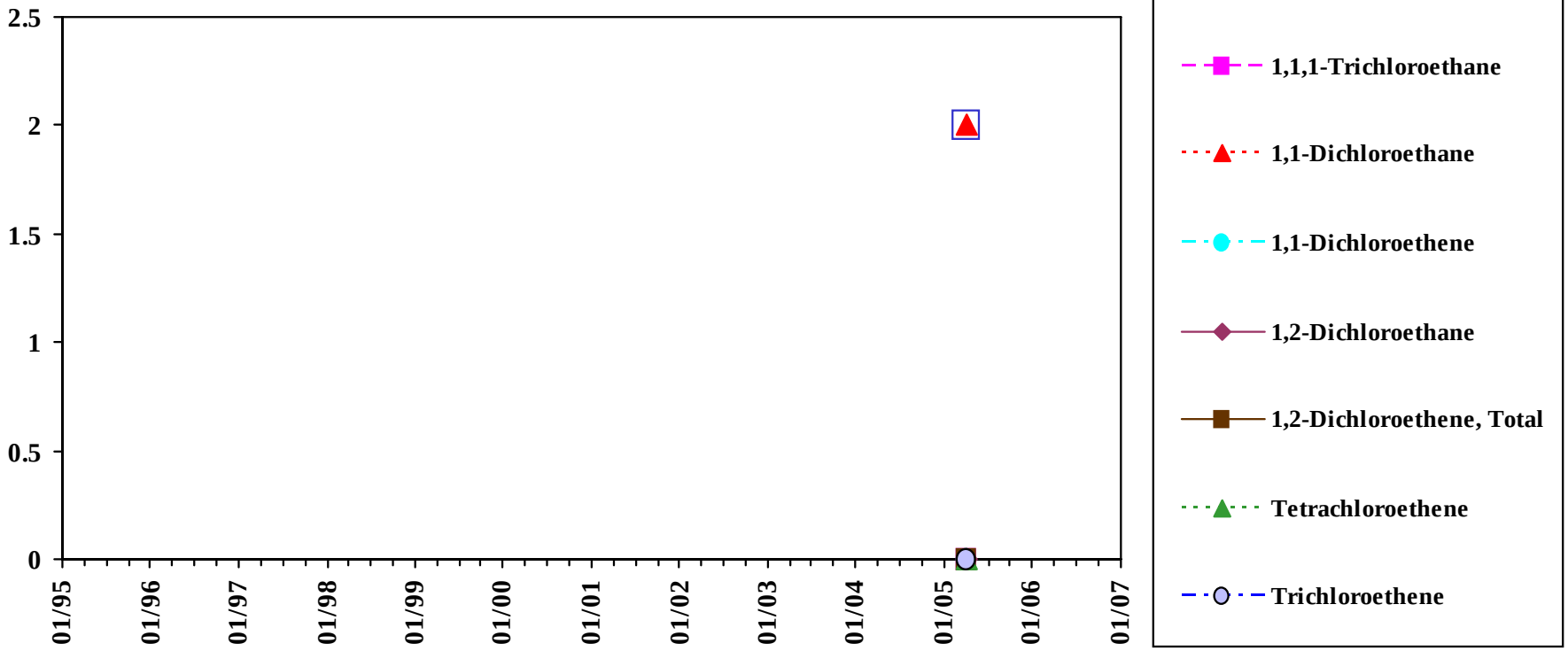
Sample Location:

MW-323

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

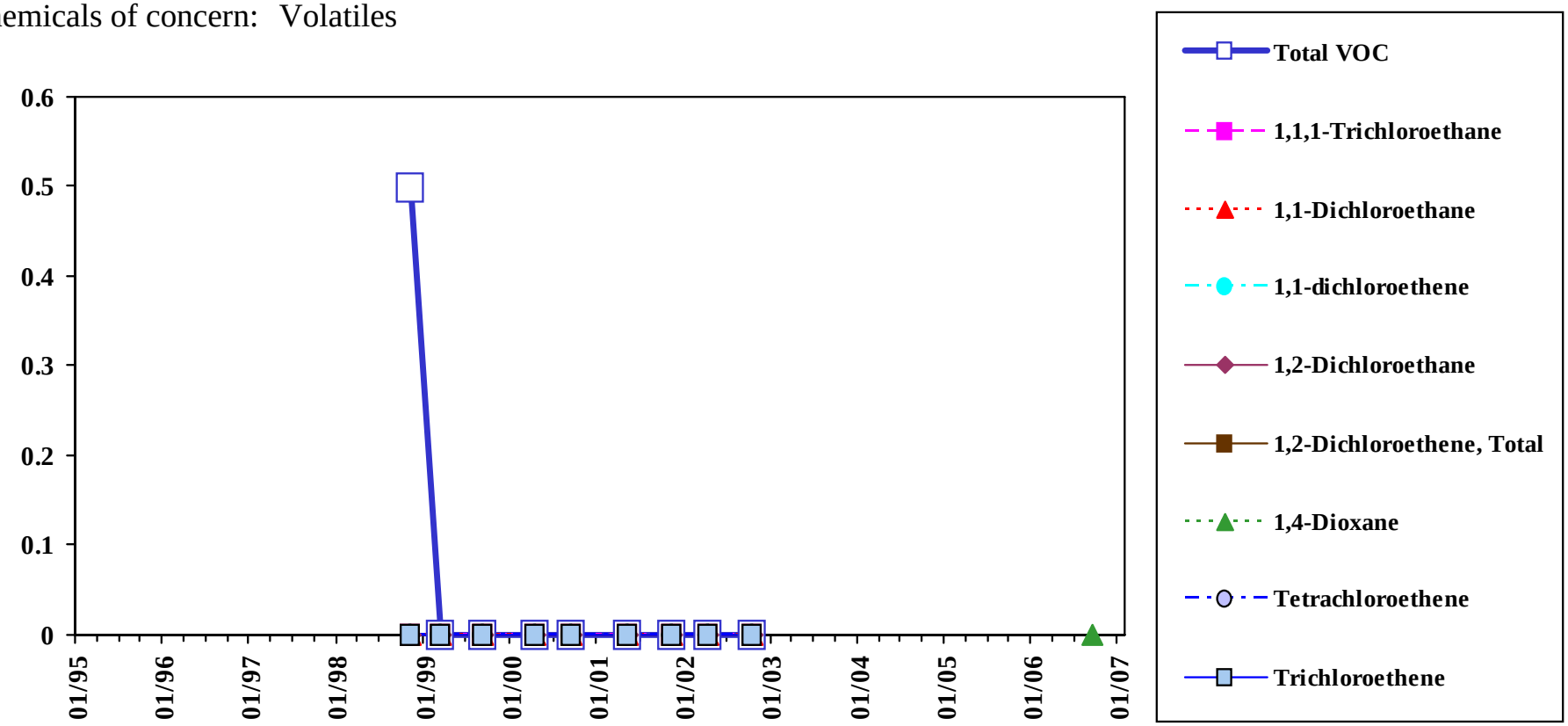
Sample Location:

MW-330

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

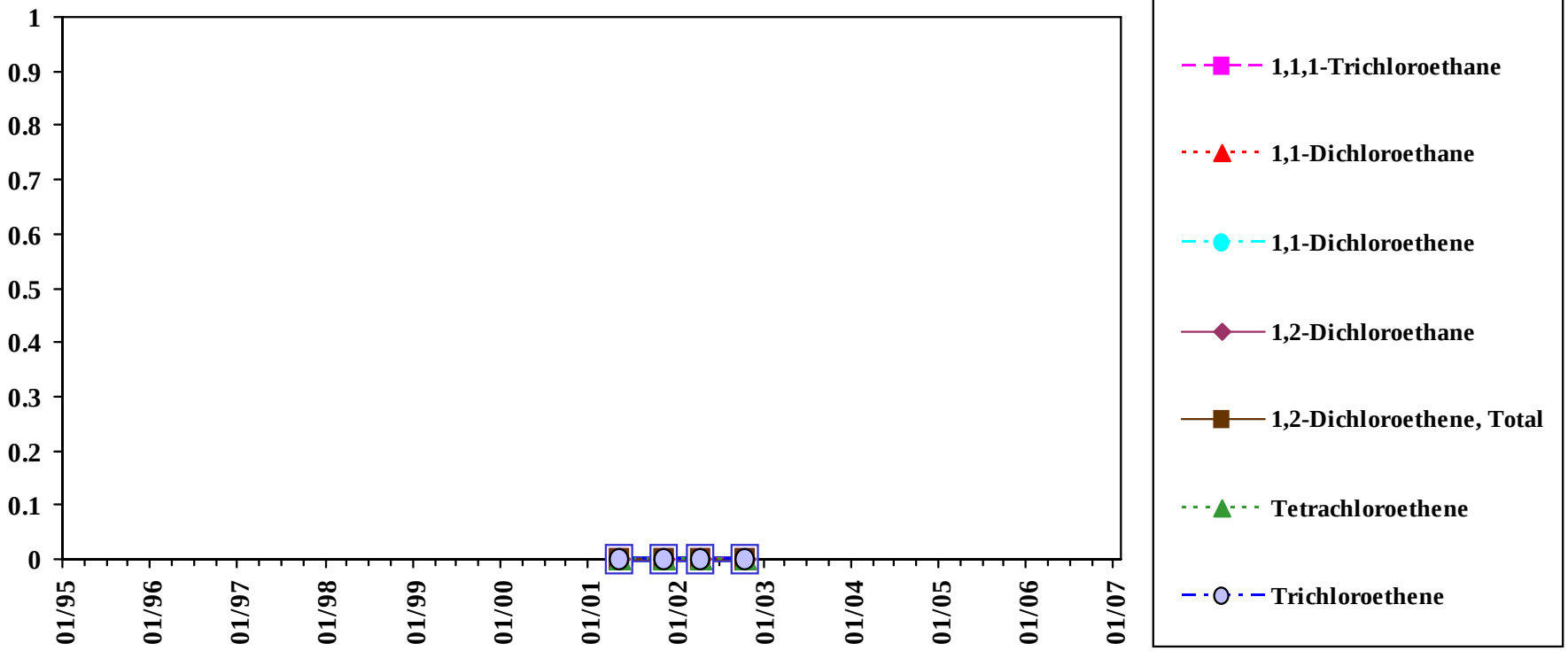
Sample Location:

MW-330

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

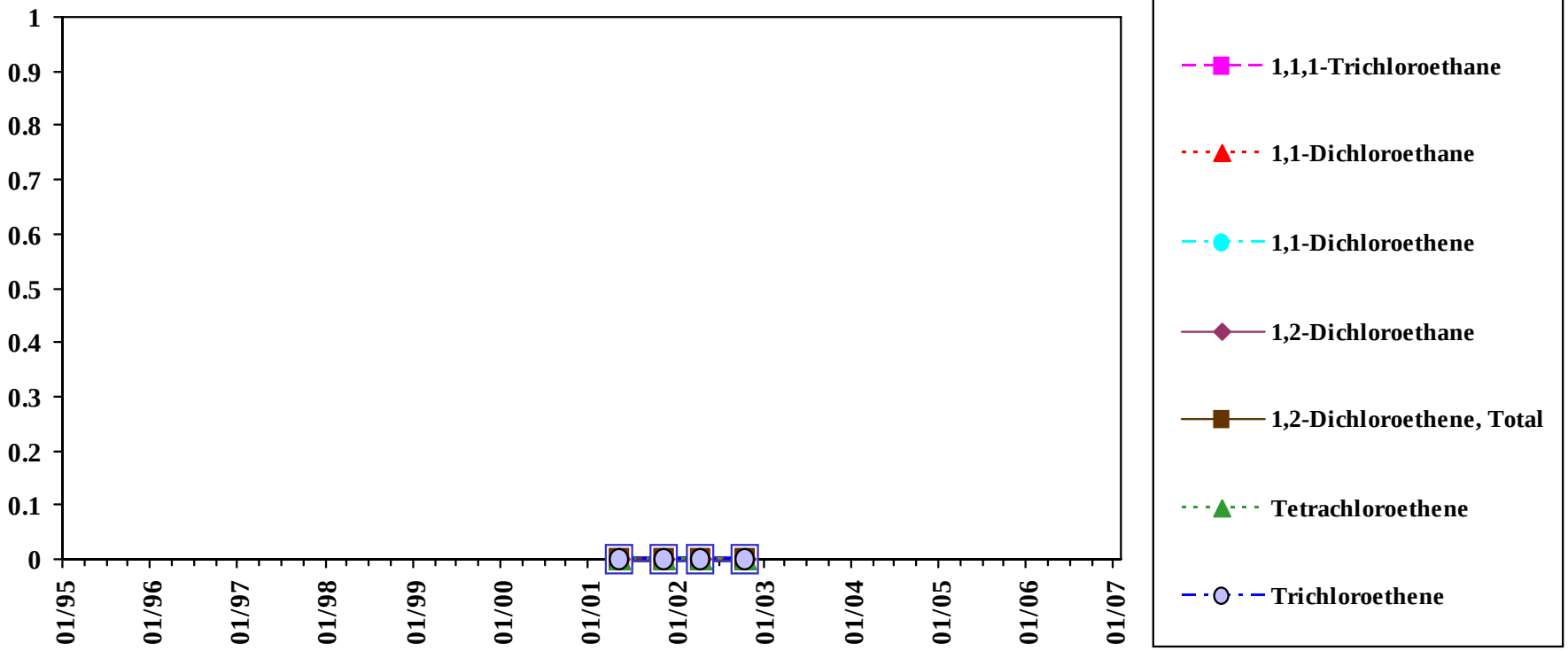
Sample Location:

MW-330

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

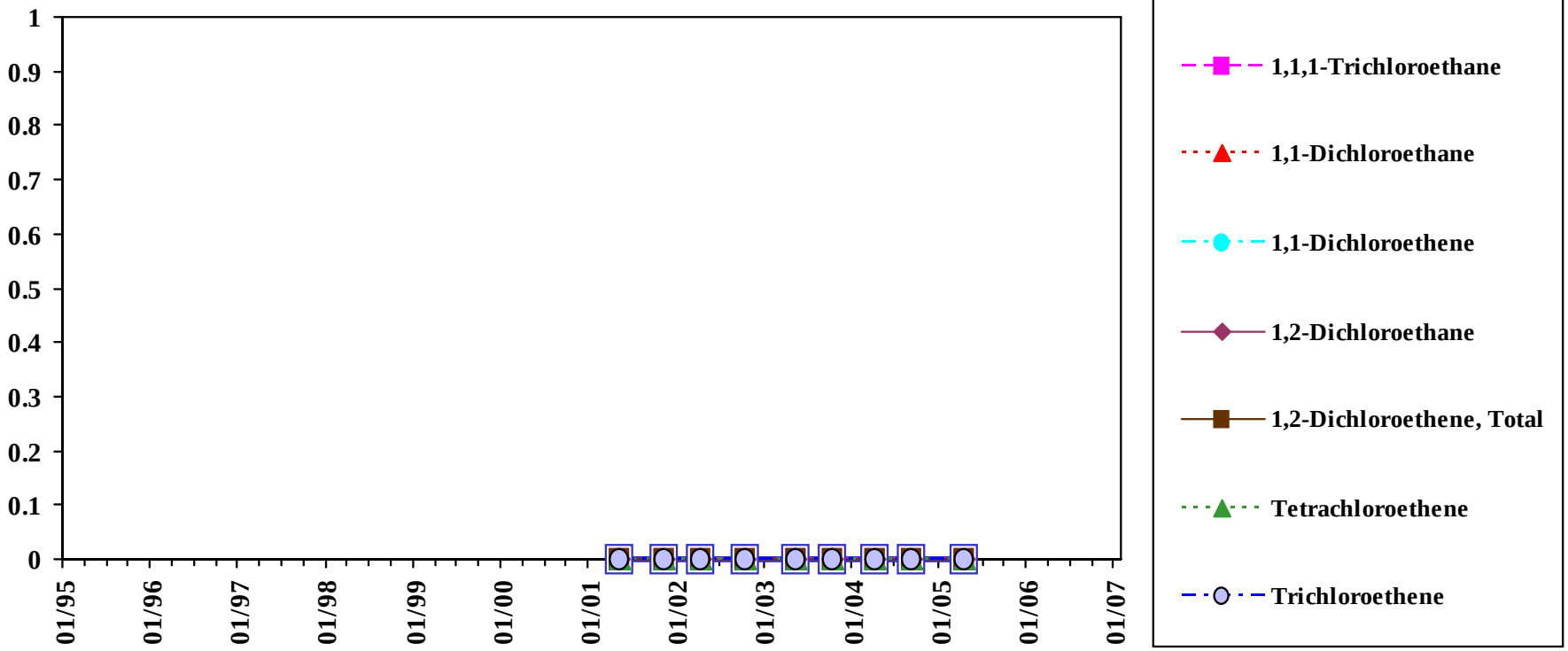
Sample Location:

MW-330

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

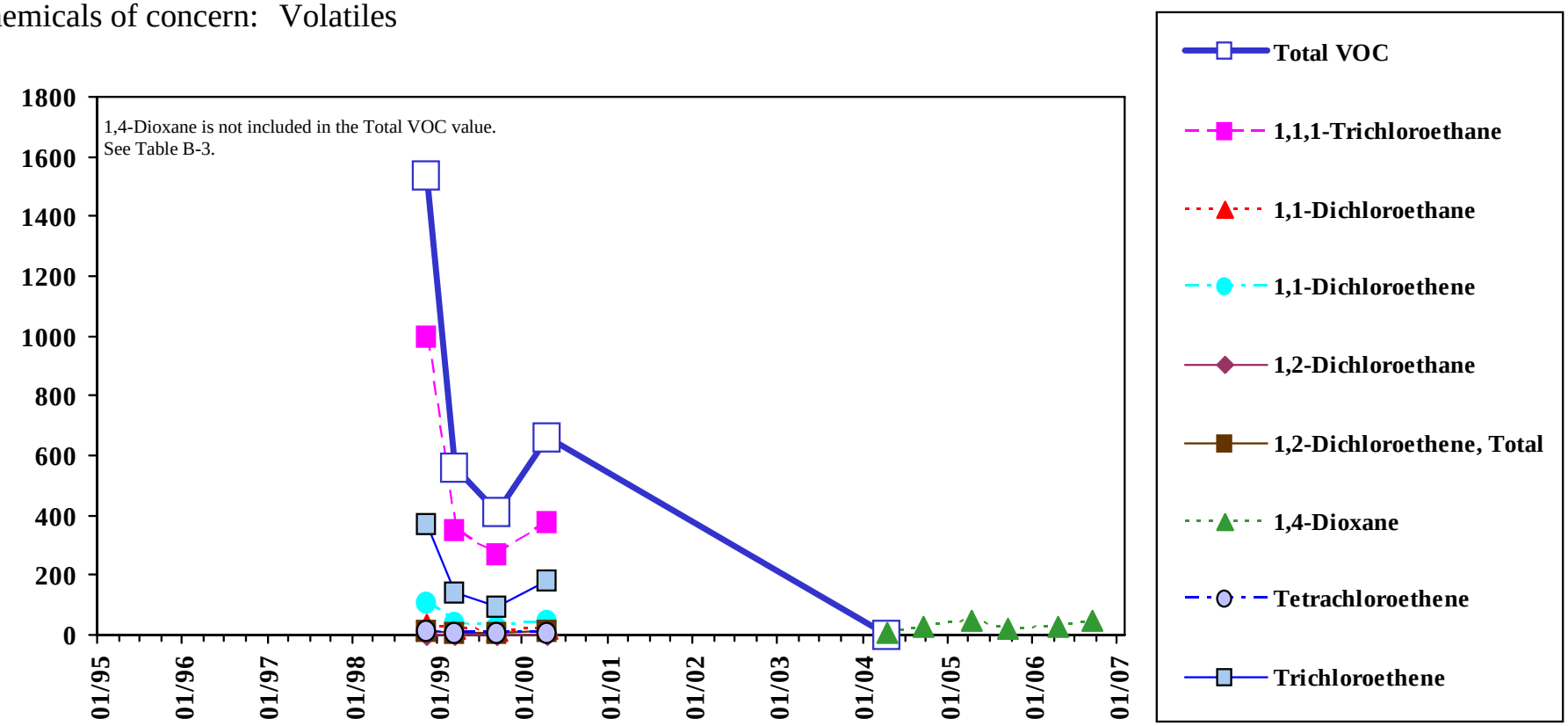
Sample Location:

MW-331

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

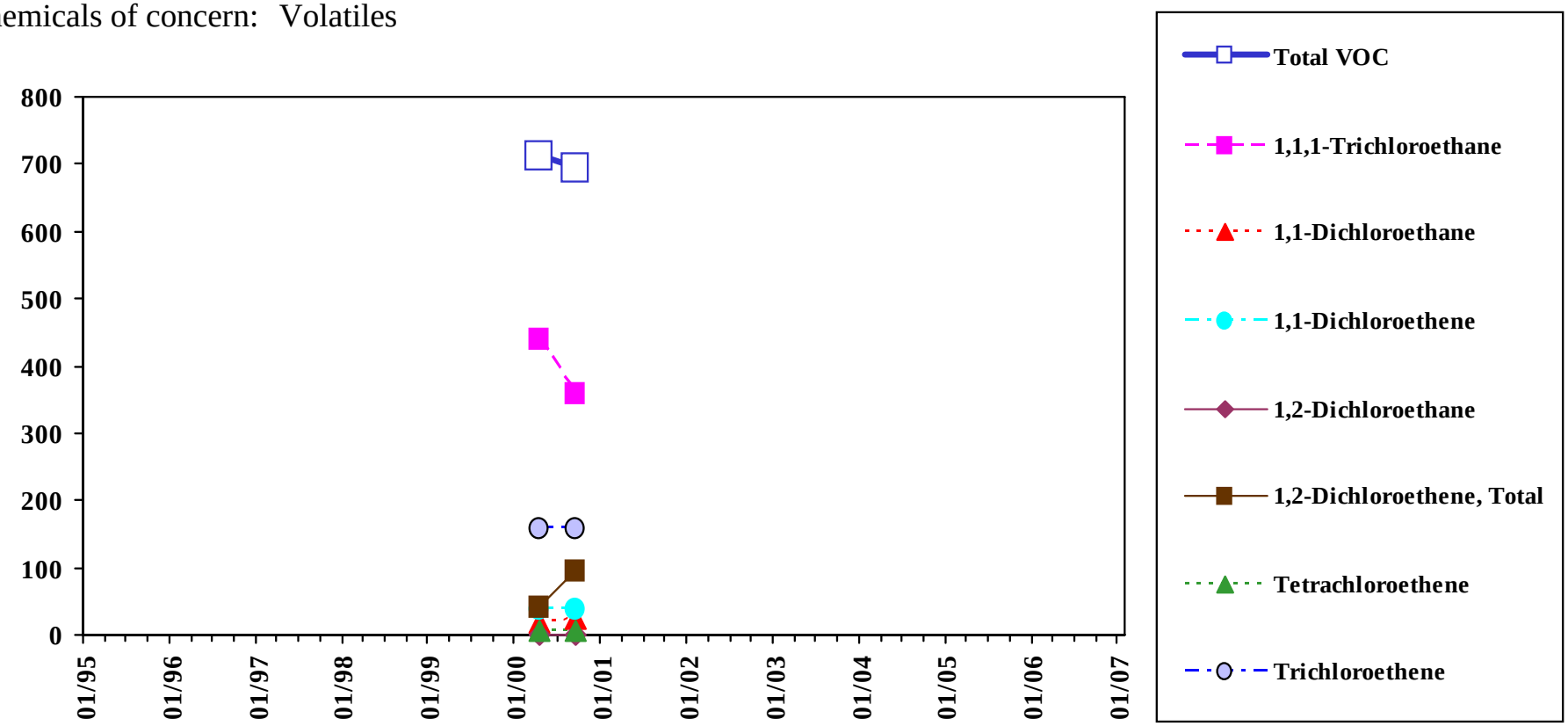
Sample Location:

MW-331

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

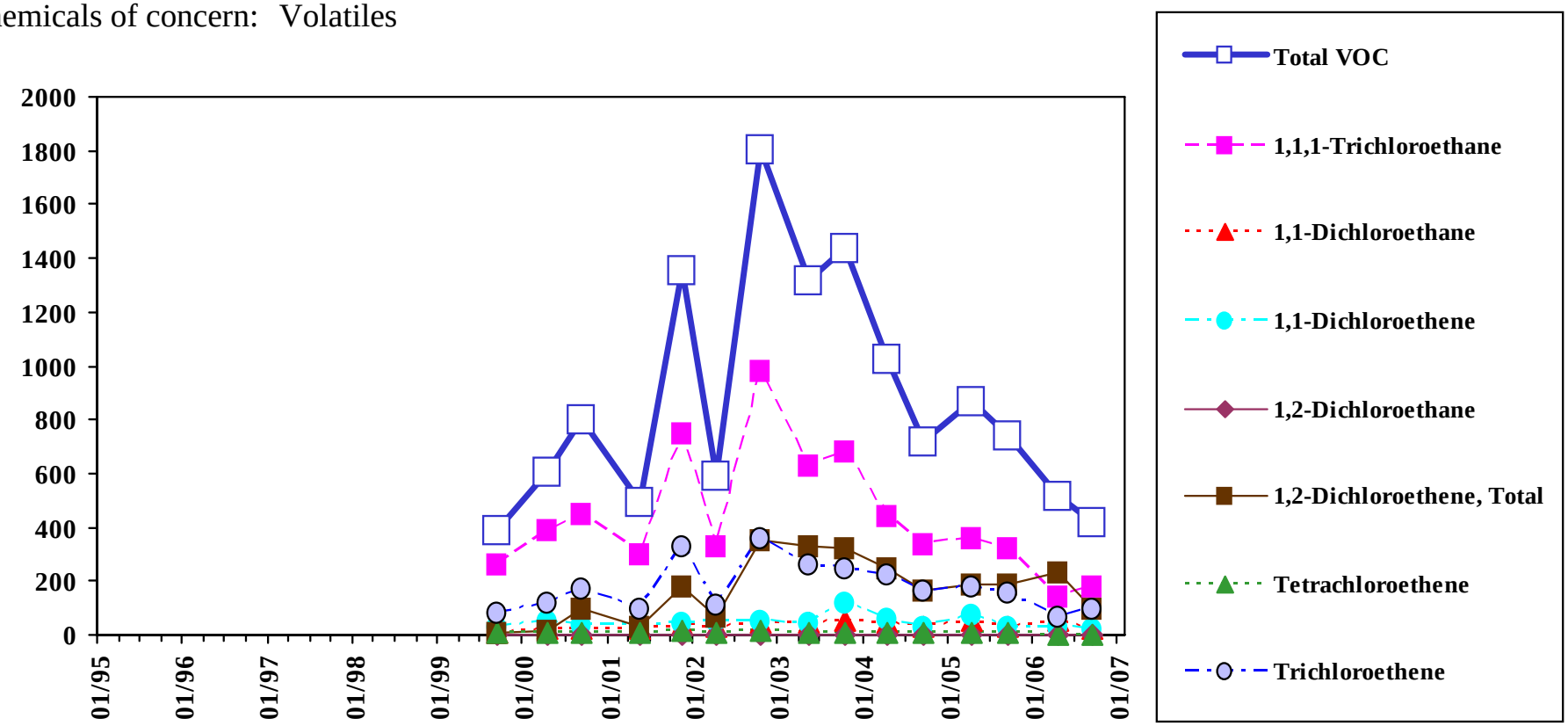
Sample Location:

MW-331

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

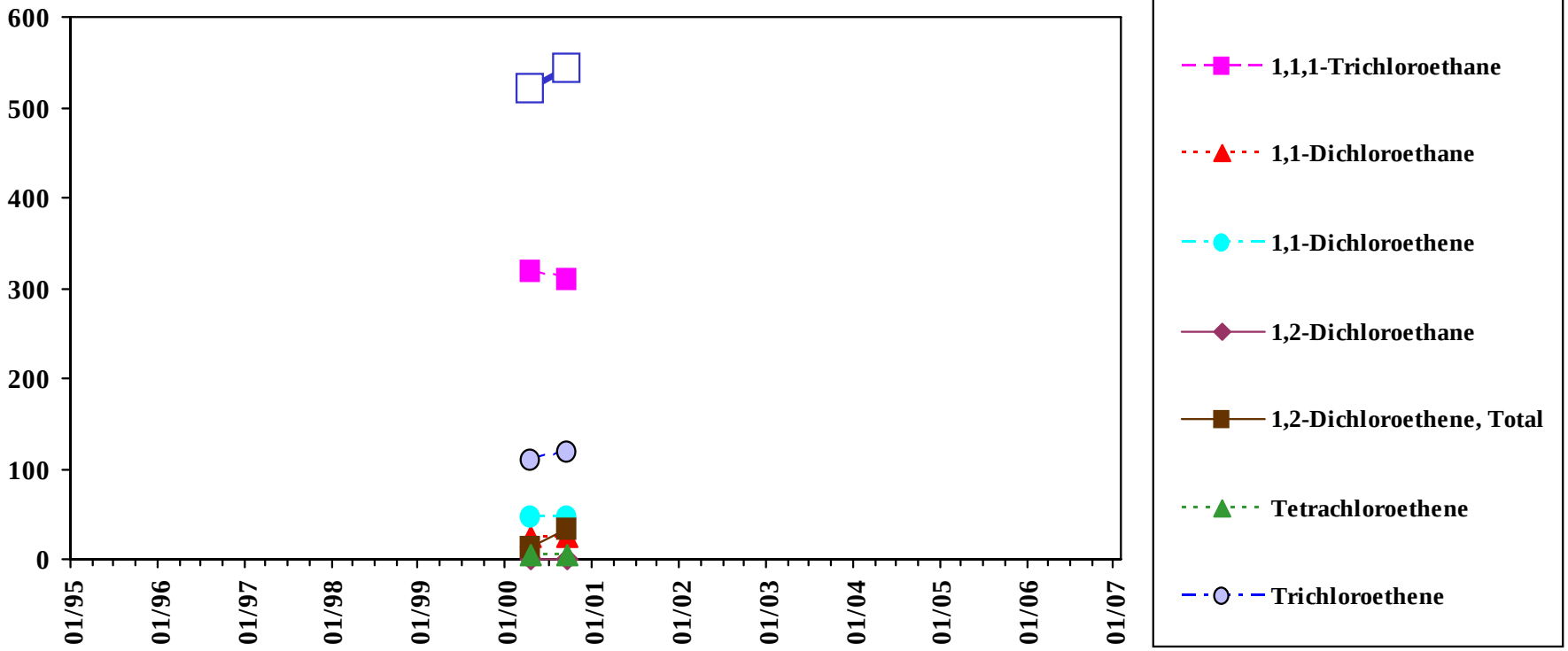
Sample Location:

MW-331

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

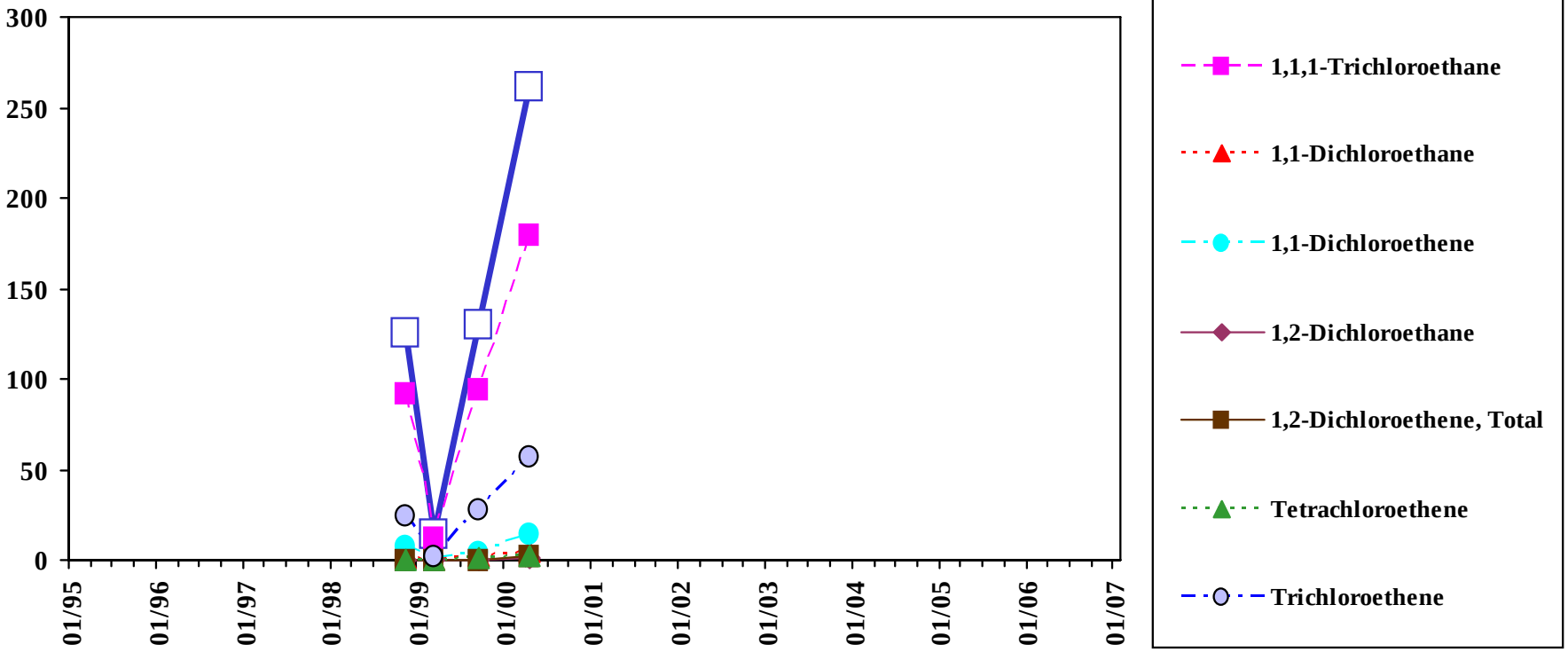
Sample Location:

MW-332

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

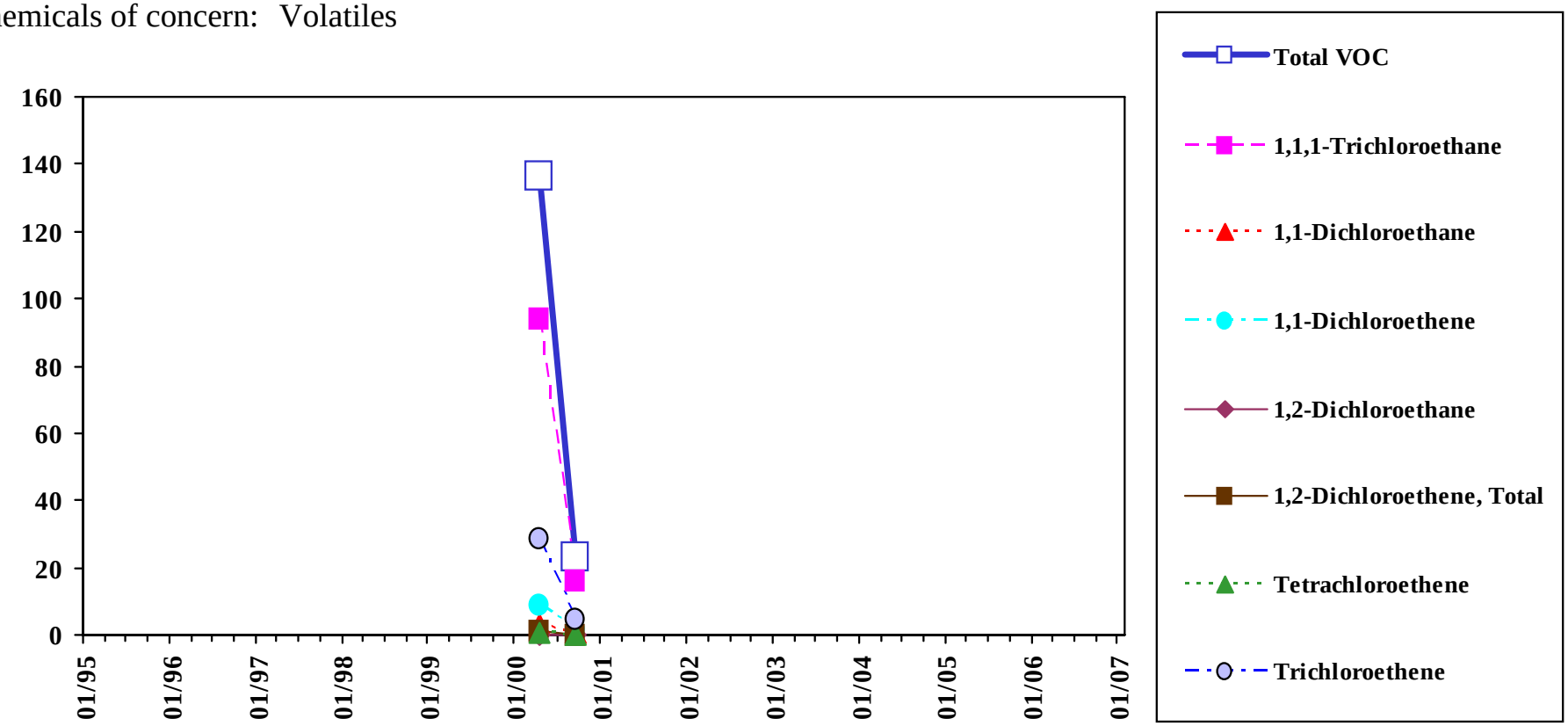
Sample Location:

MW-332

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

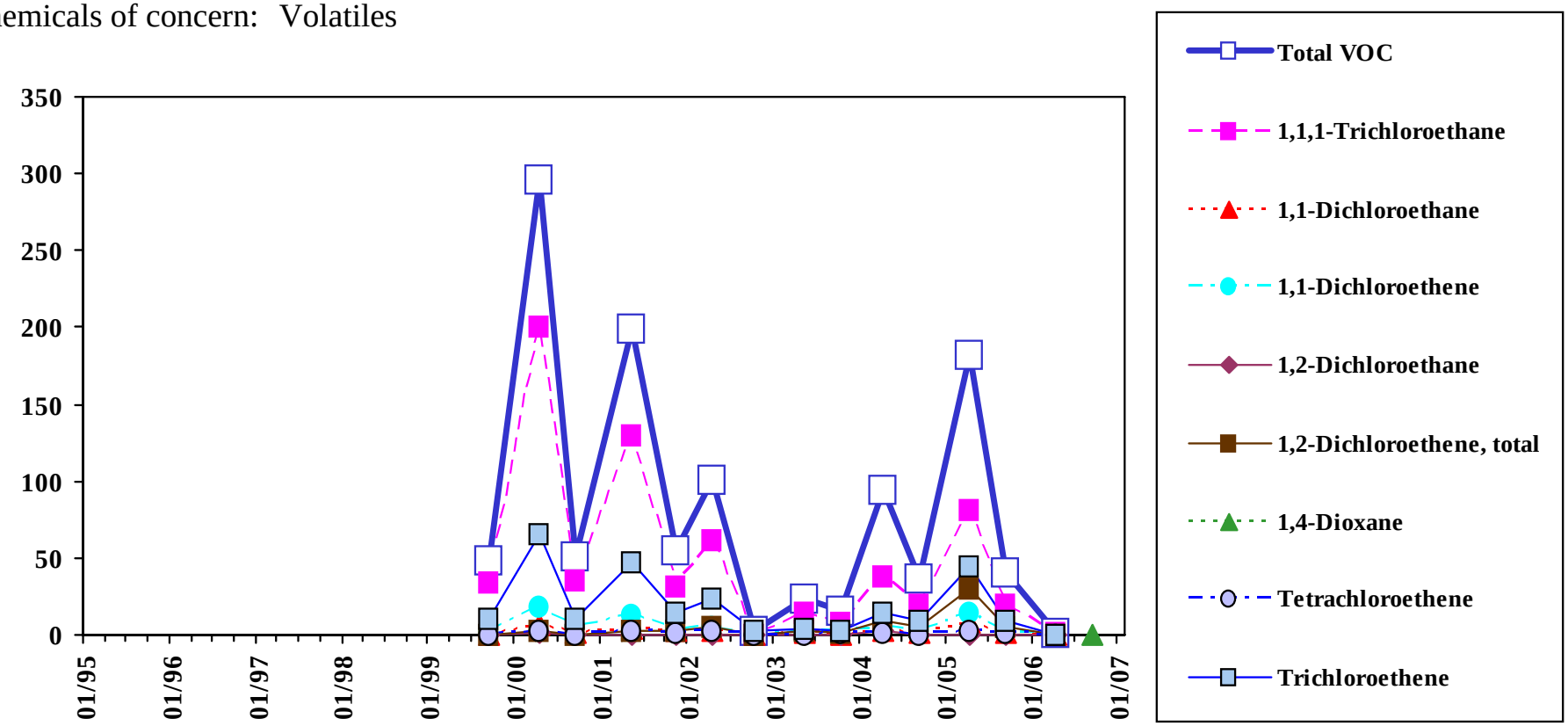
Sample Location:

MW-332

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

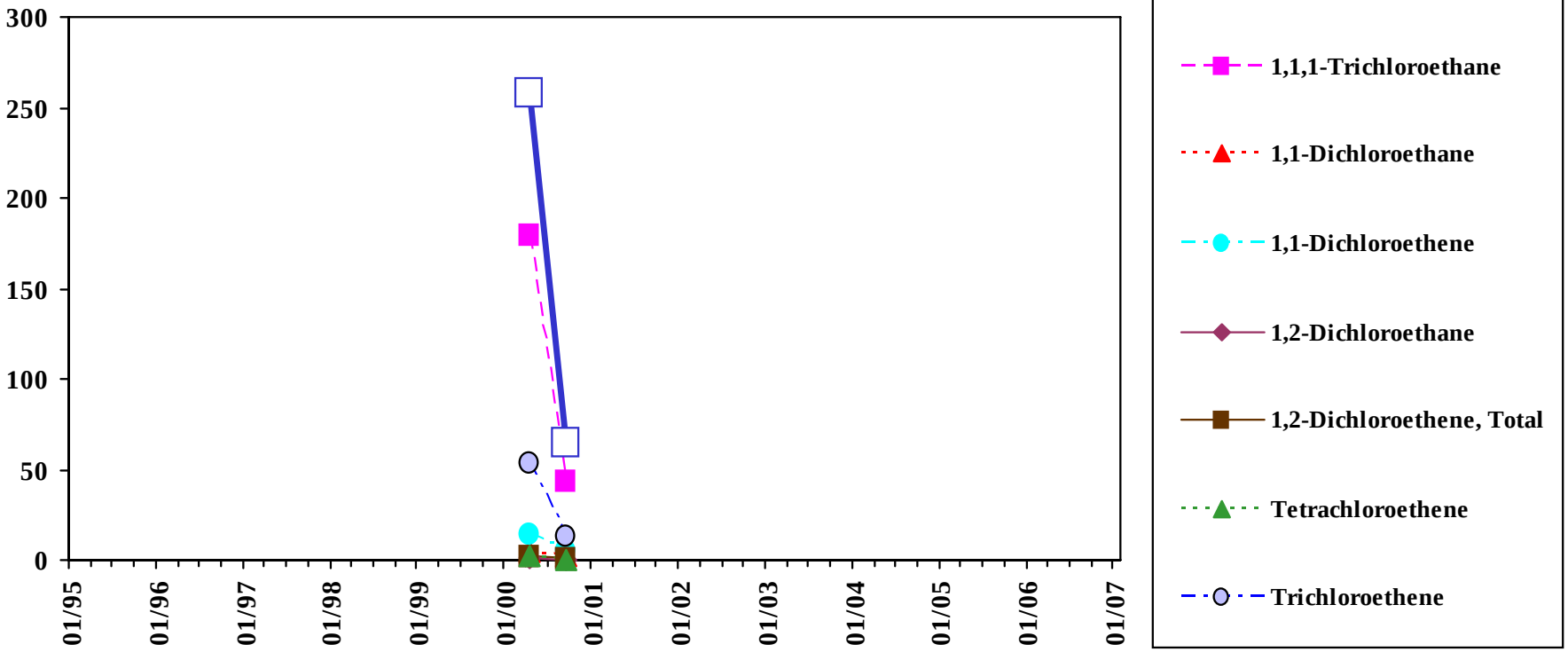
Sample Location:

MW-332

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

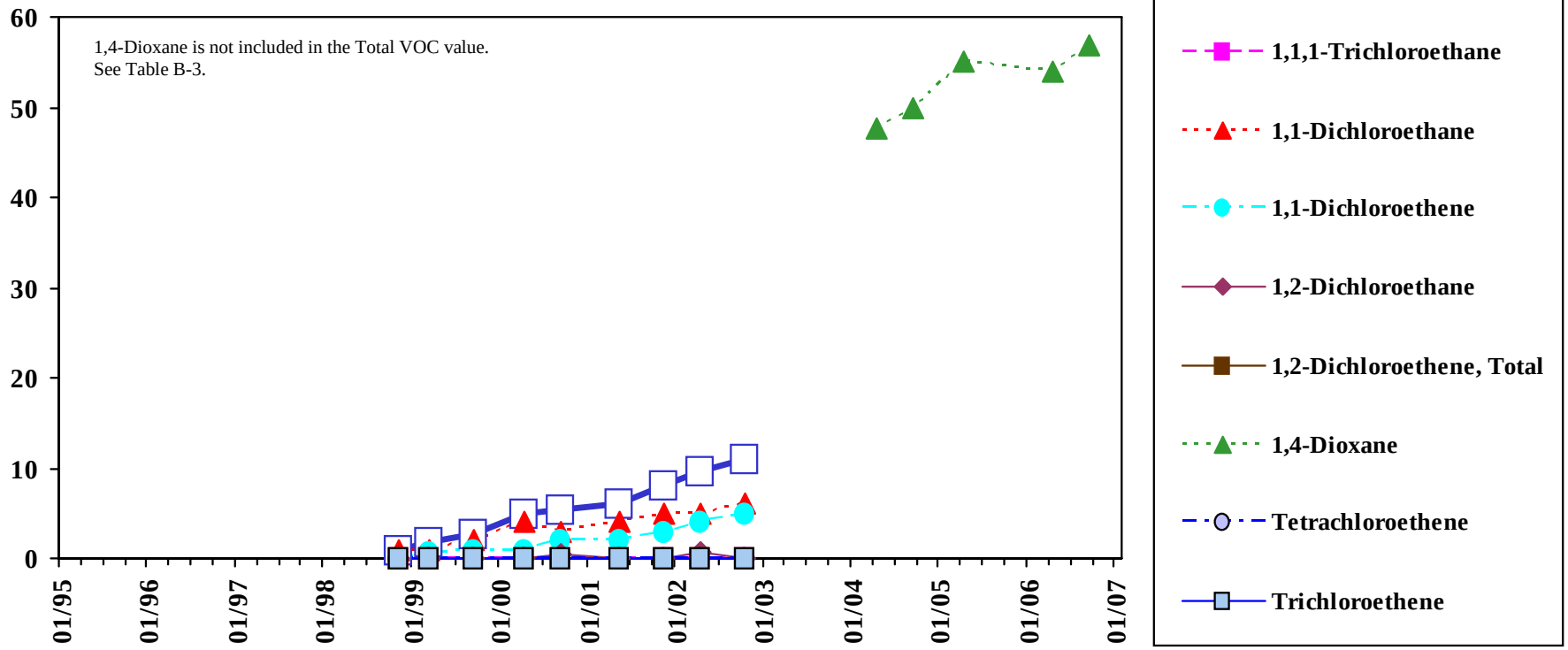
Sample Location:

MW-333

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

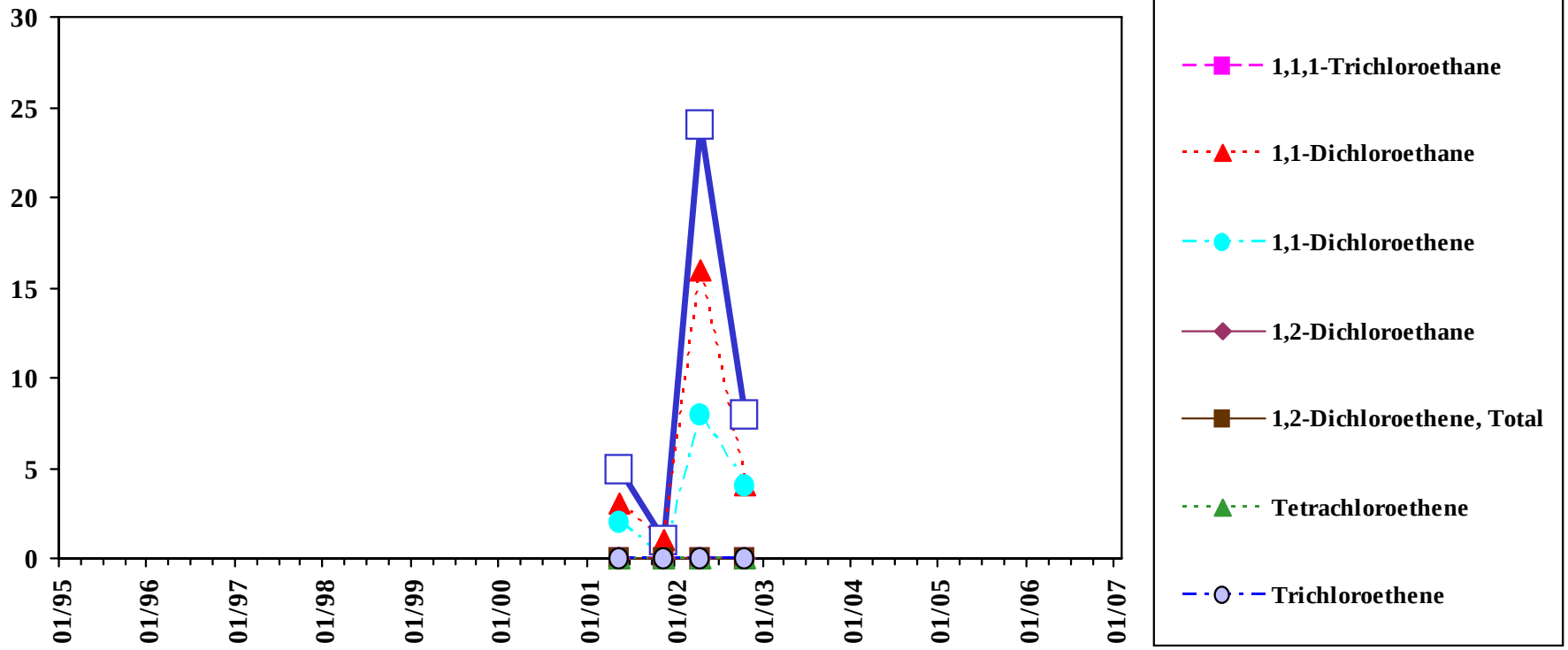
Sample Location:

MW-333

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

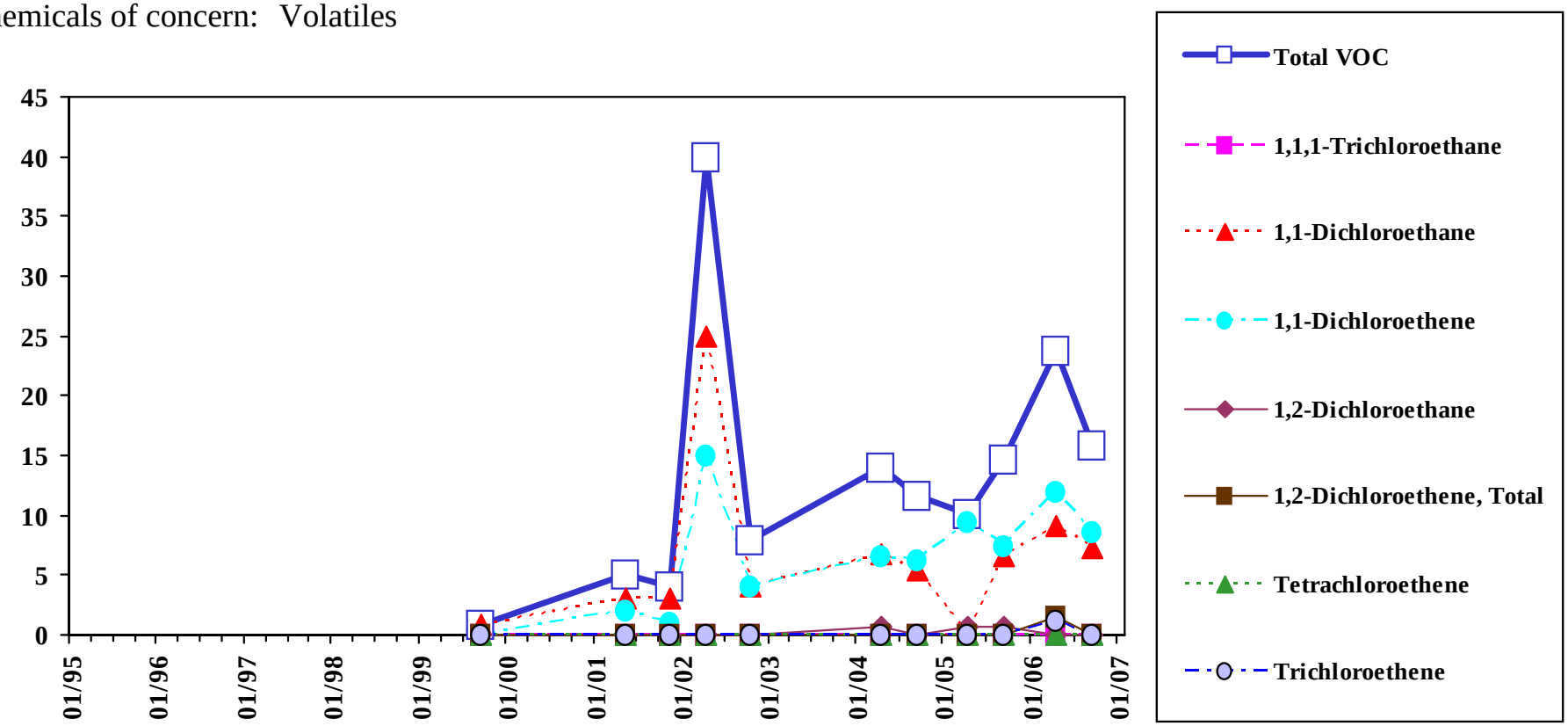
Sample Location:

MW-333

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

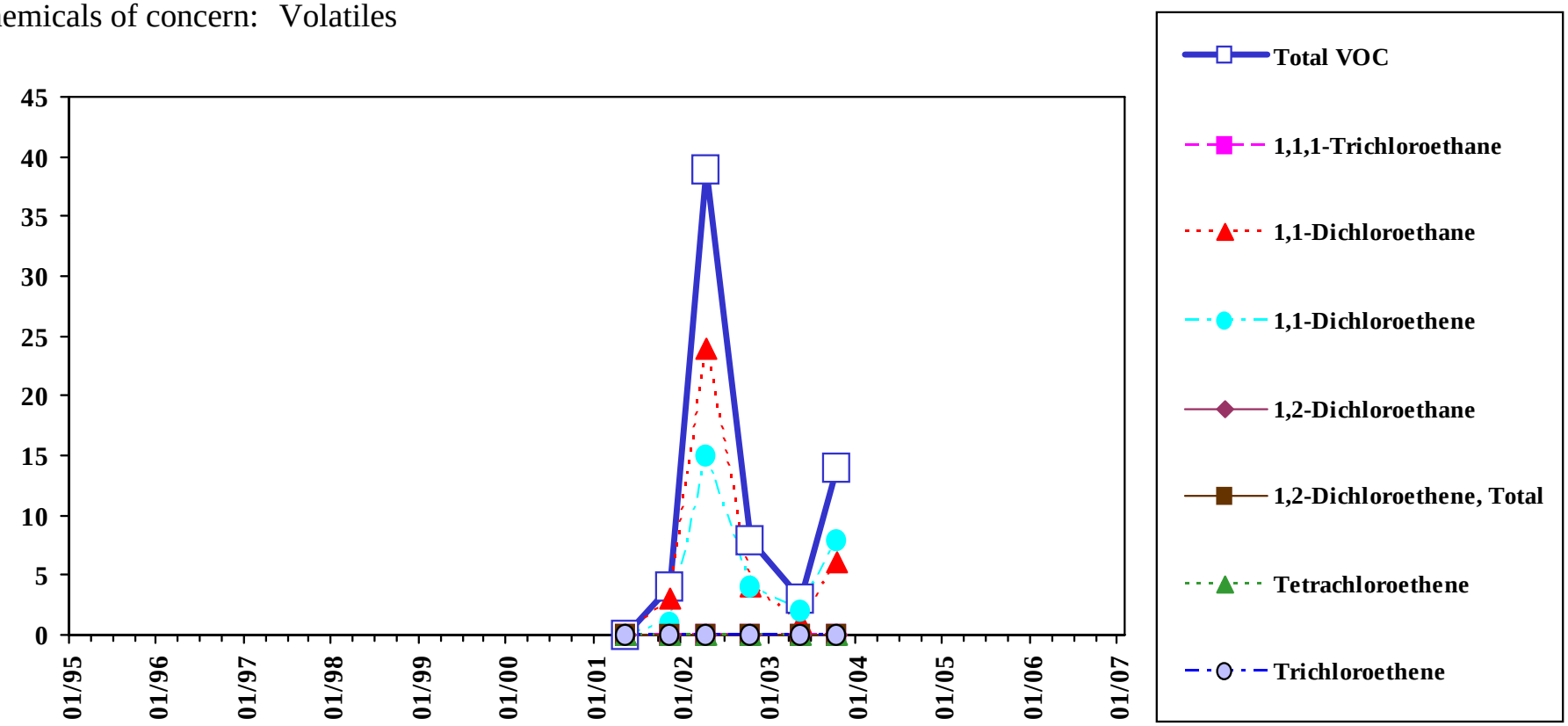
Sample Location:

MW-333

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

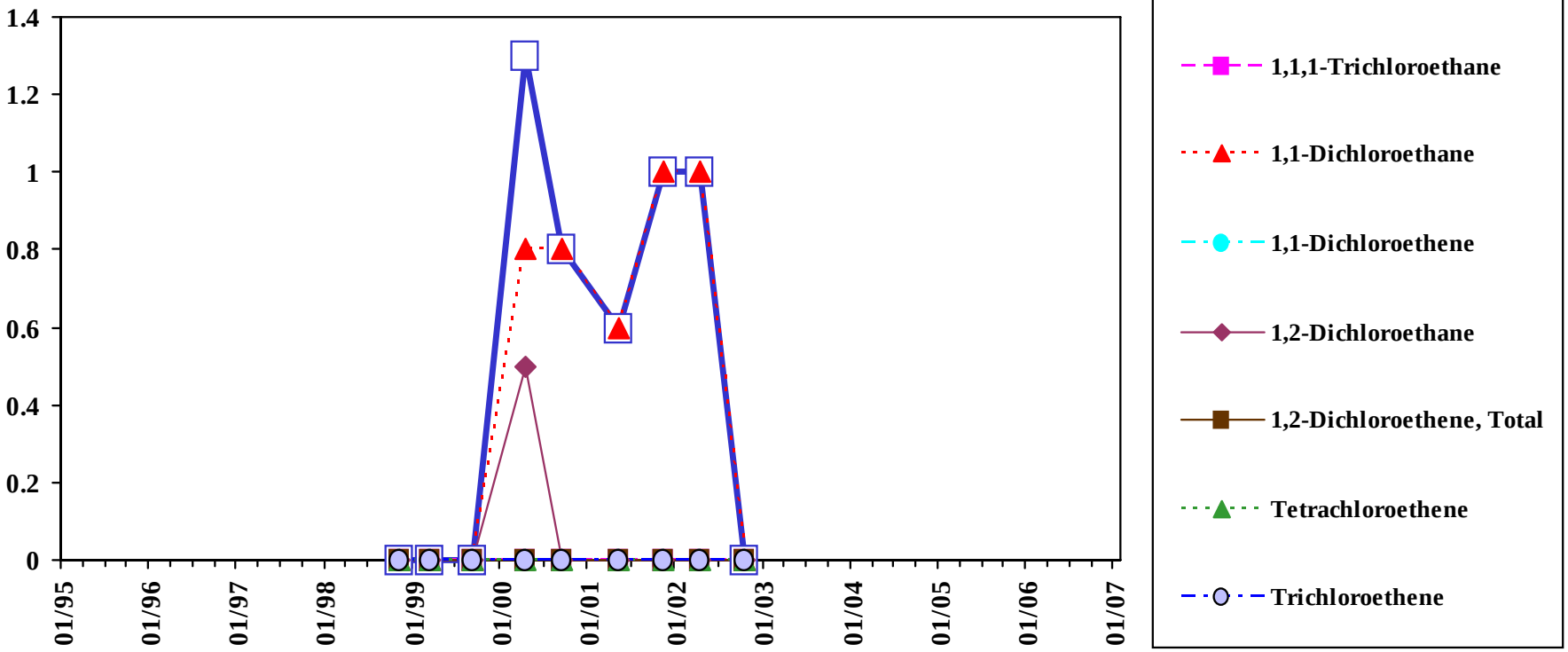
Sample Location:

MW-334

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

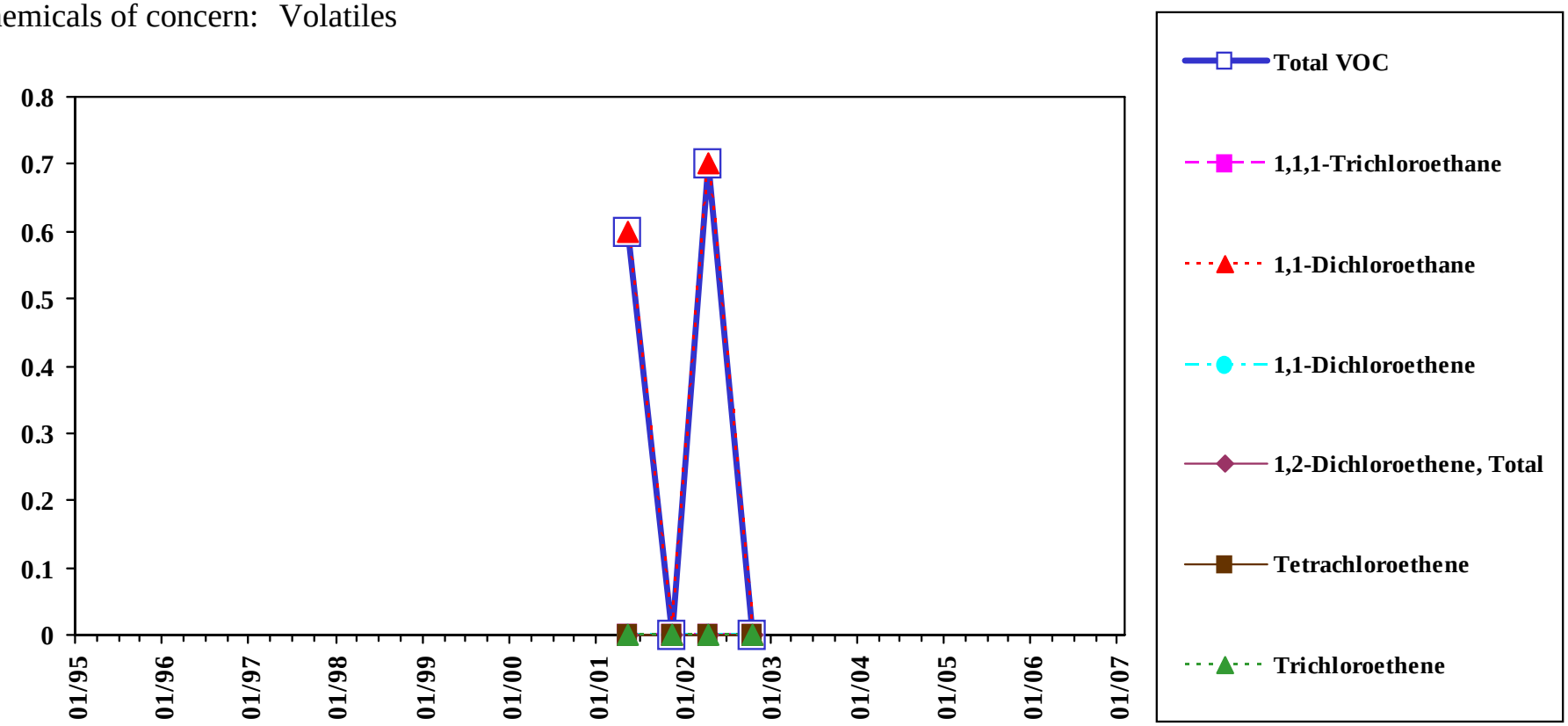
Sample Location:

MW-334

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

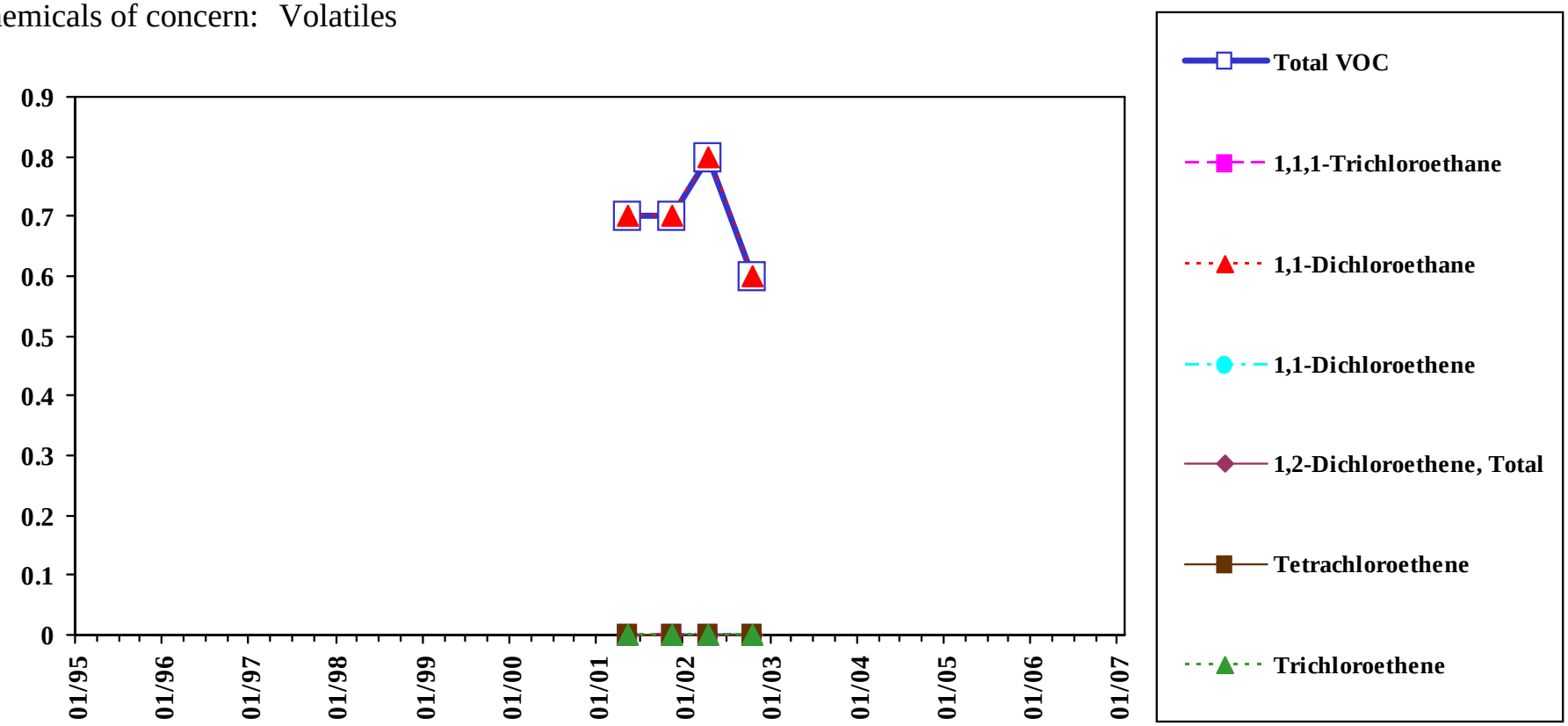
Sample Location:

MW-334

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

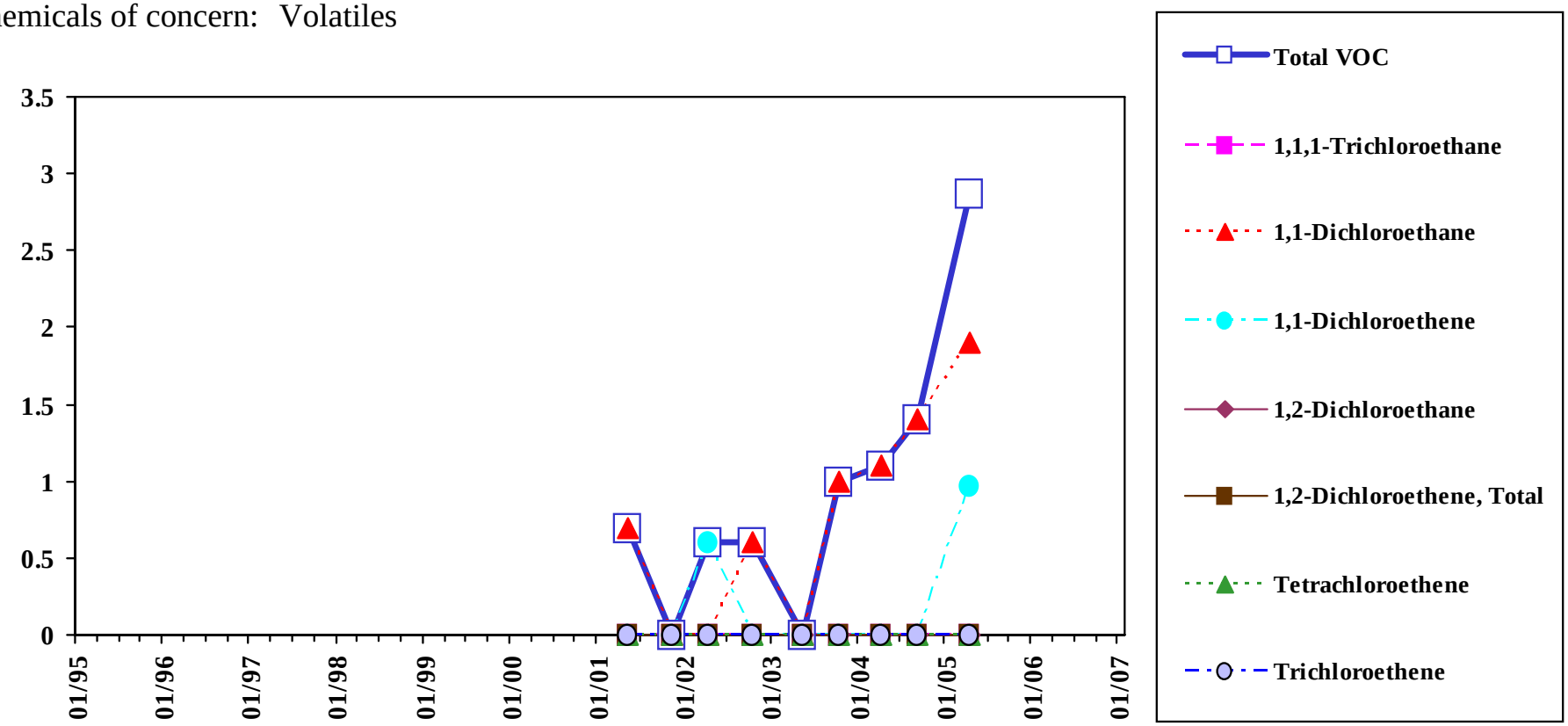
Sample Location:

MW-334

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

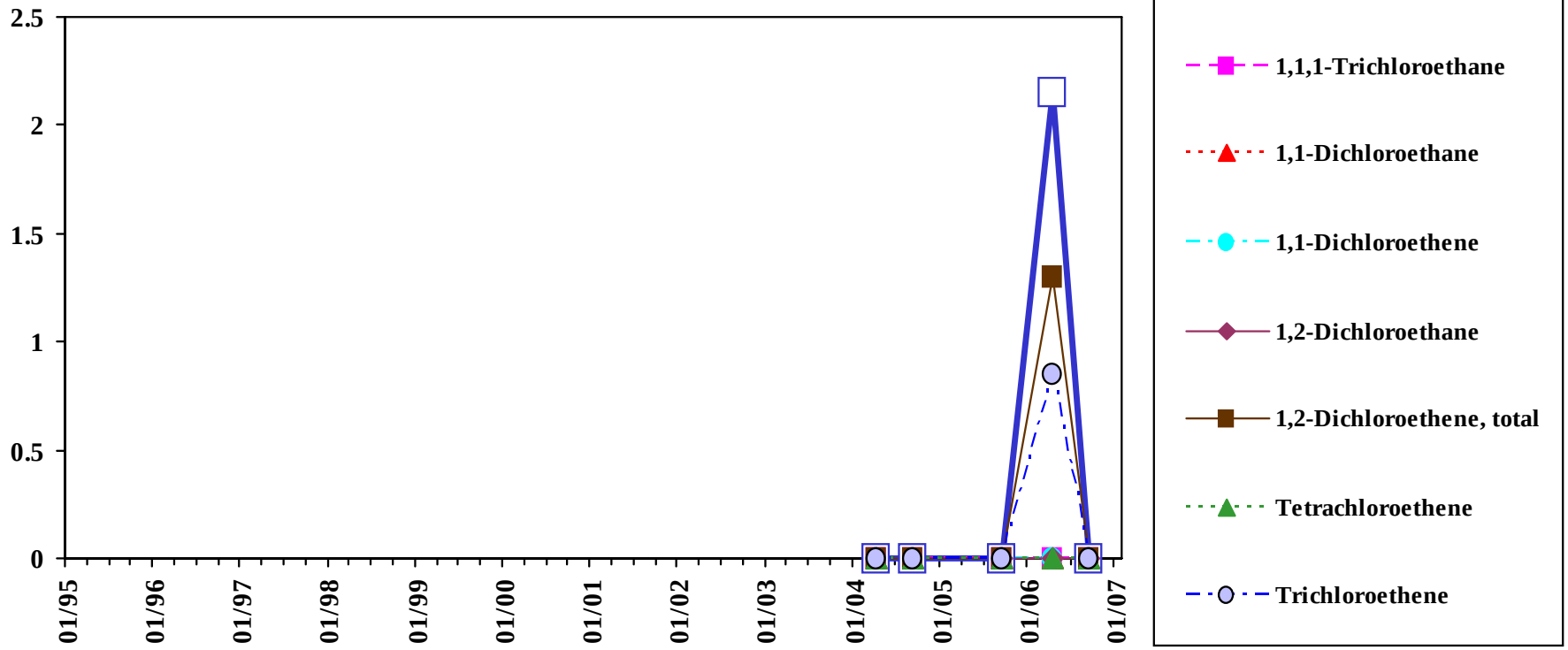
Sample Location:

MW-335

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

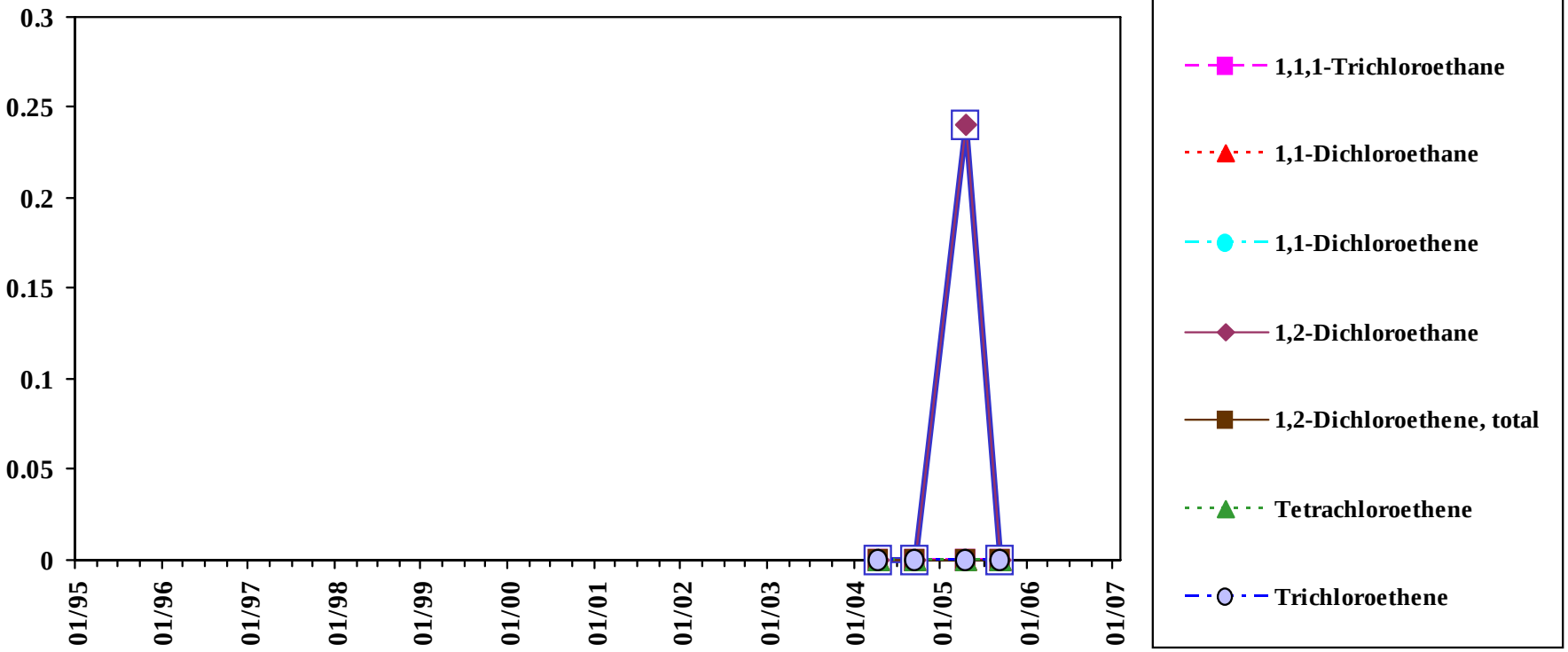
Sample Location:

MW-335

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

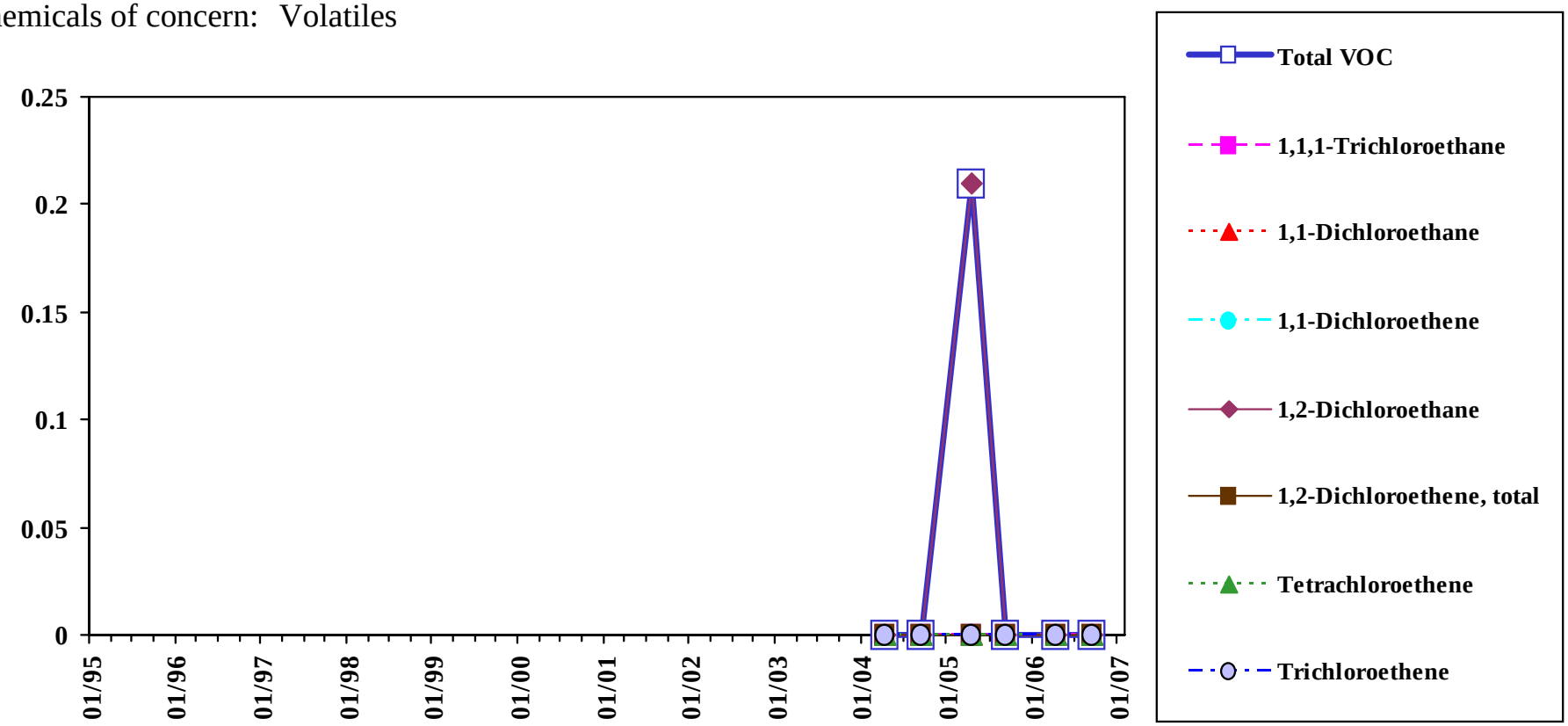
Sample Location:

MW-335

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

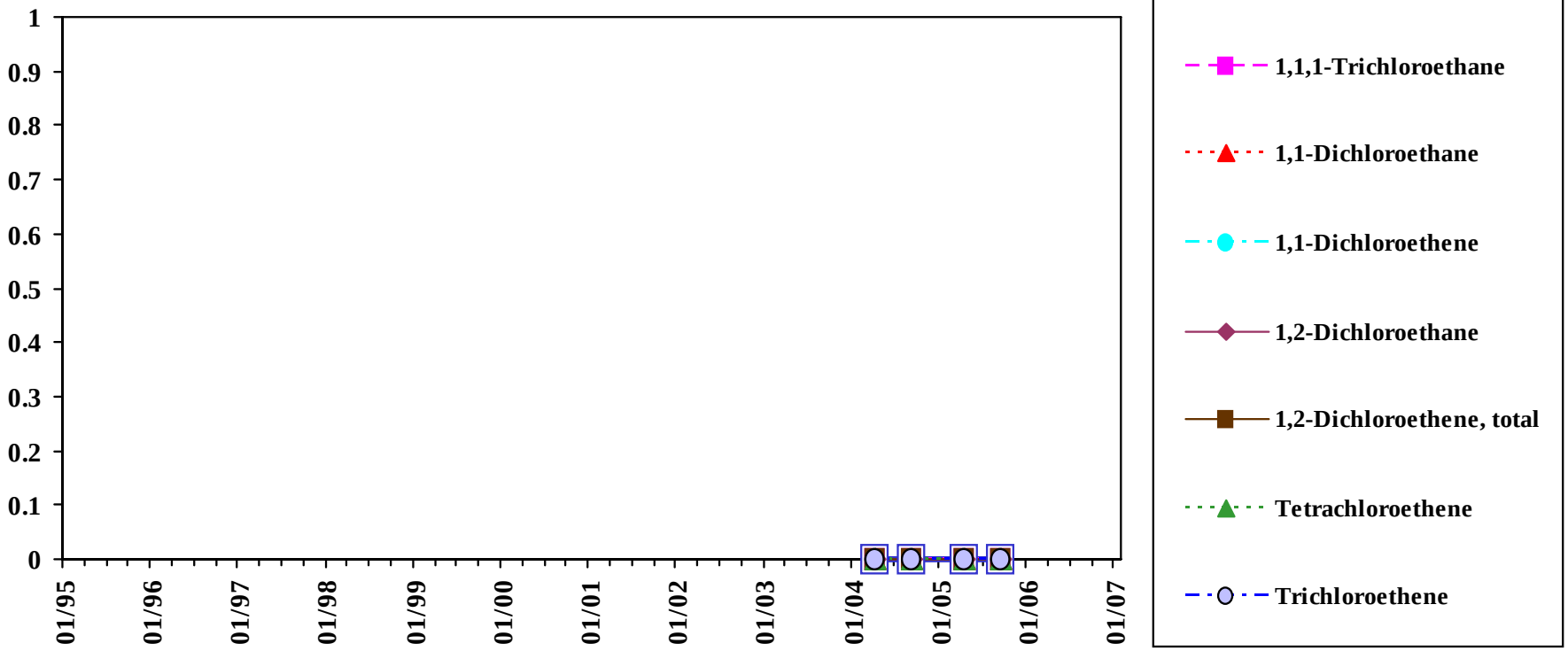
Sample Location:

MW-335

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

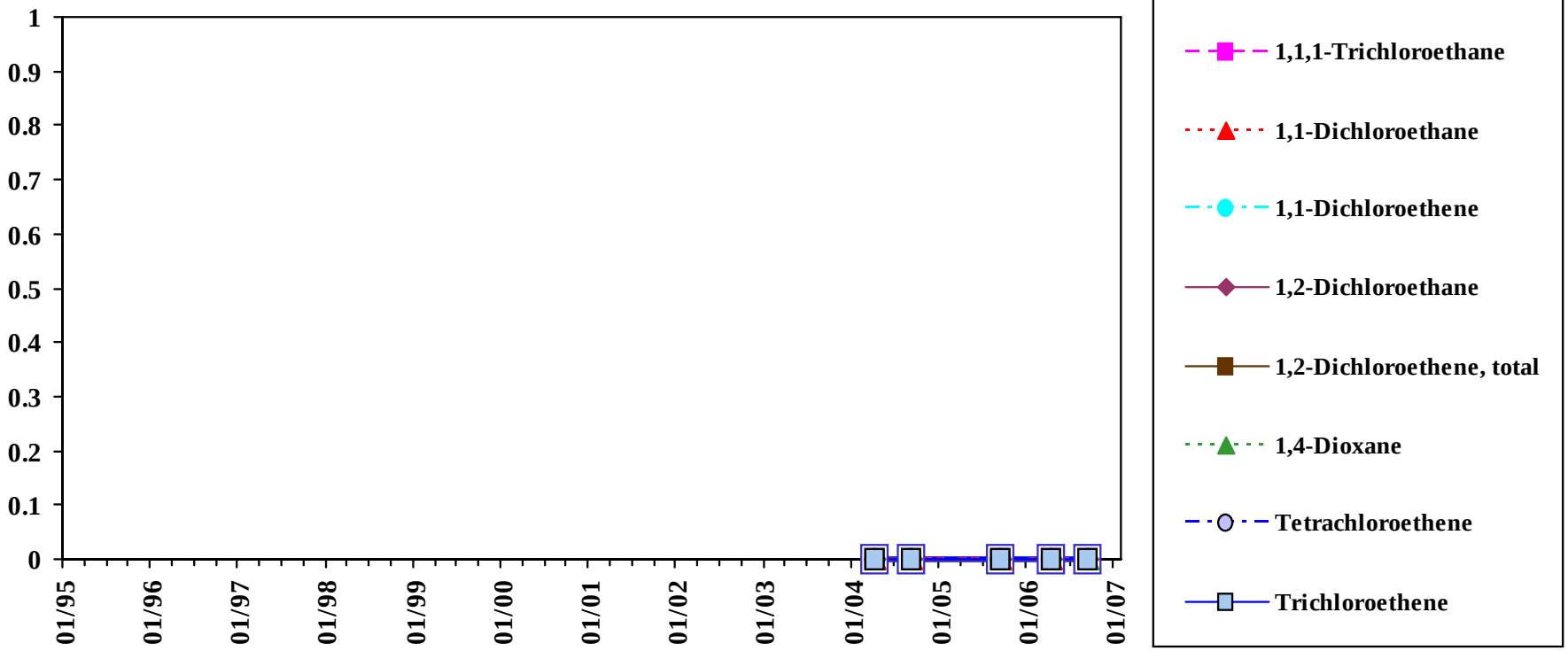
Sample Location:

MW-336

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

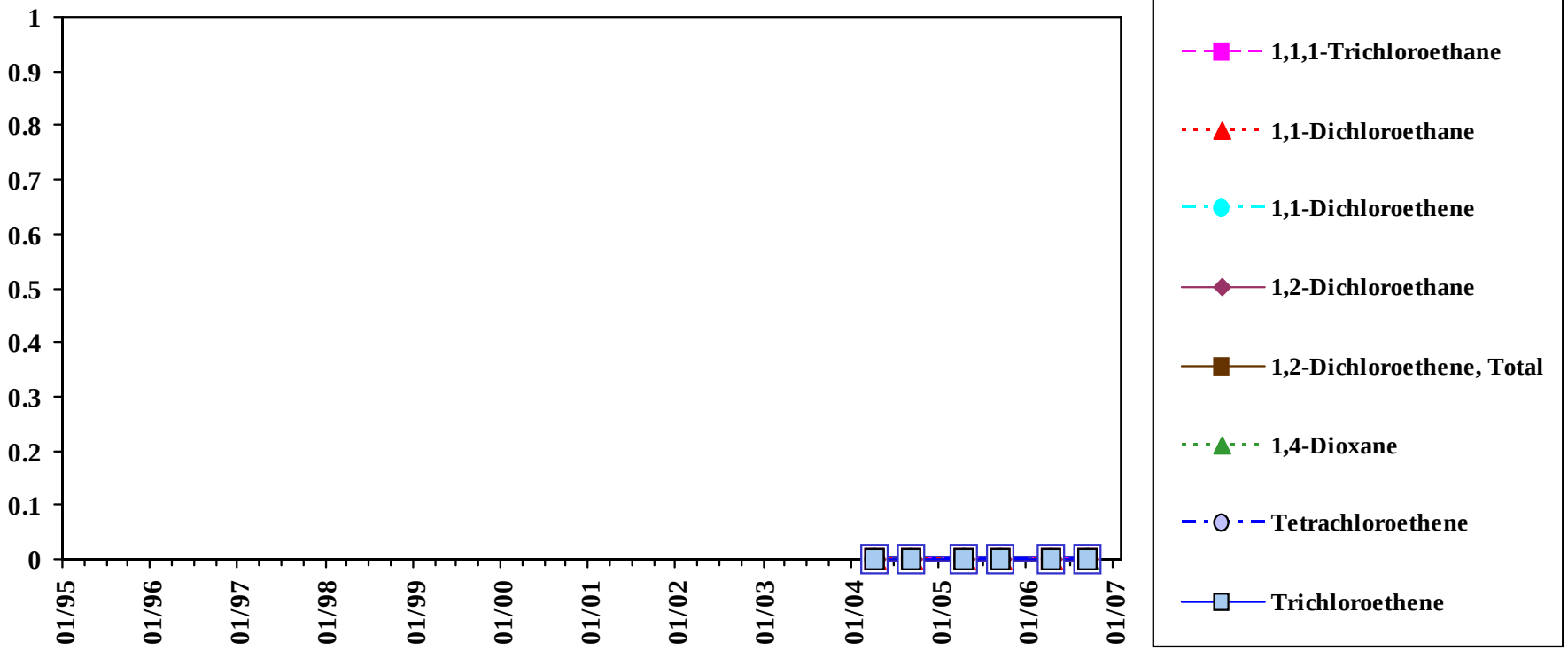
Sample Location:

MW-336

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

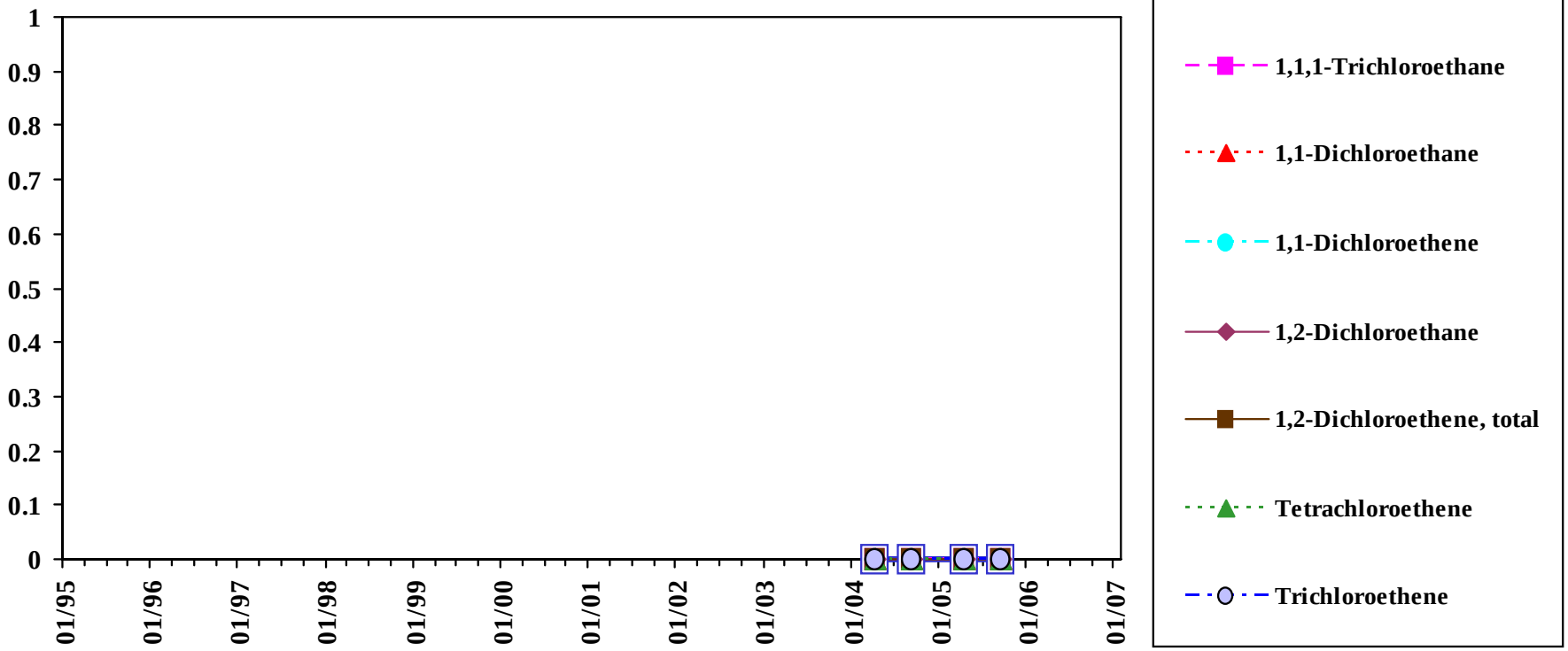
Sample Location:

MW-336

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

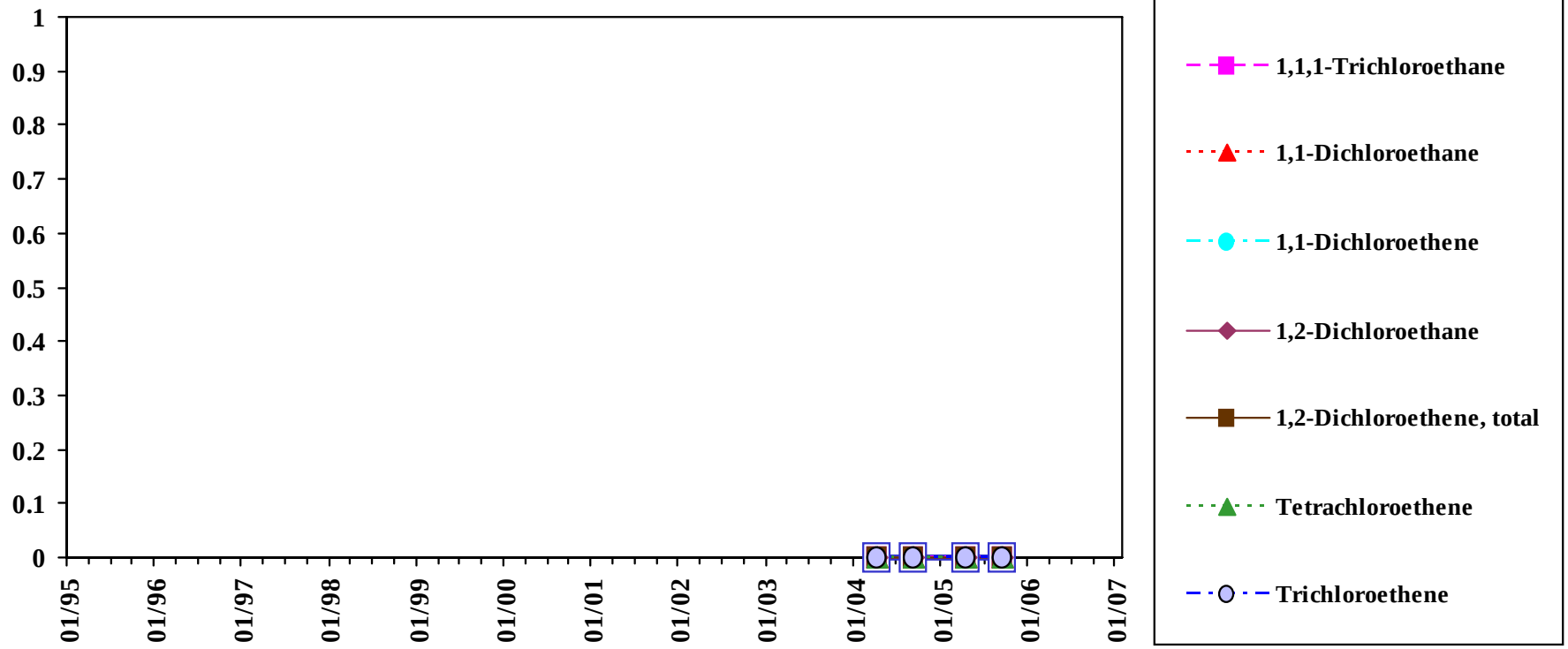
Sample Location:

MW-336

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

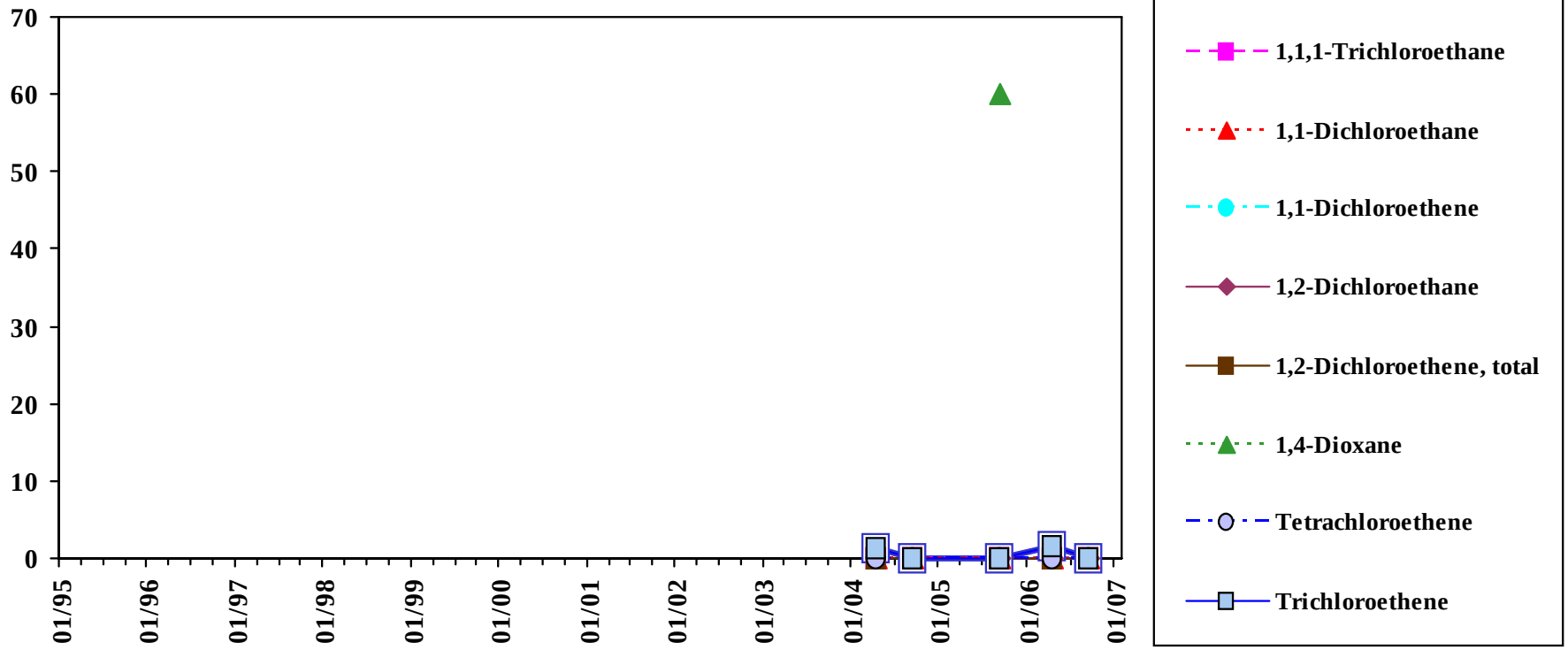
Sample Location:

MW-337

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

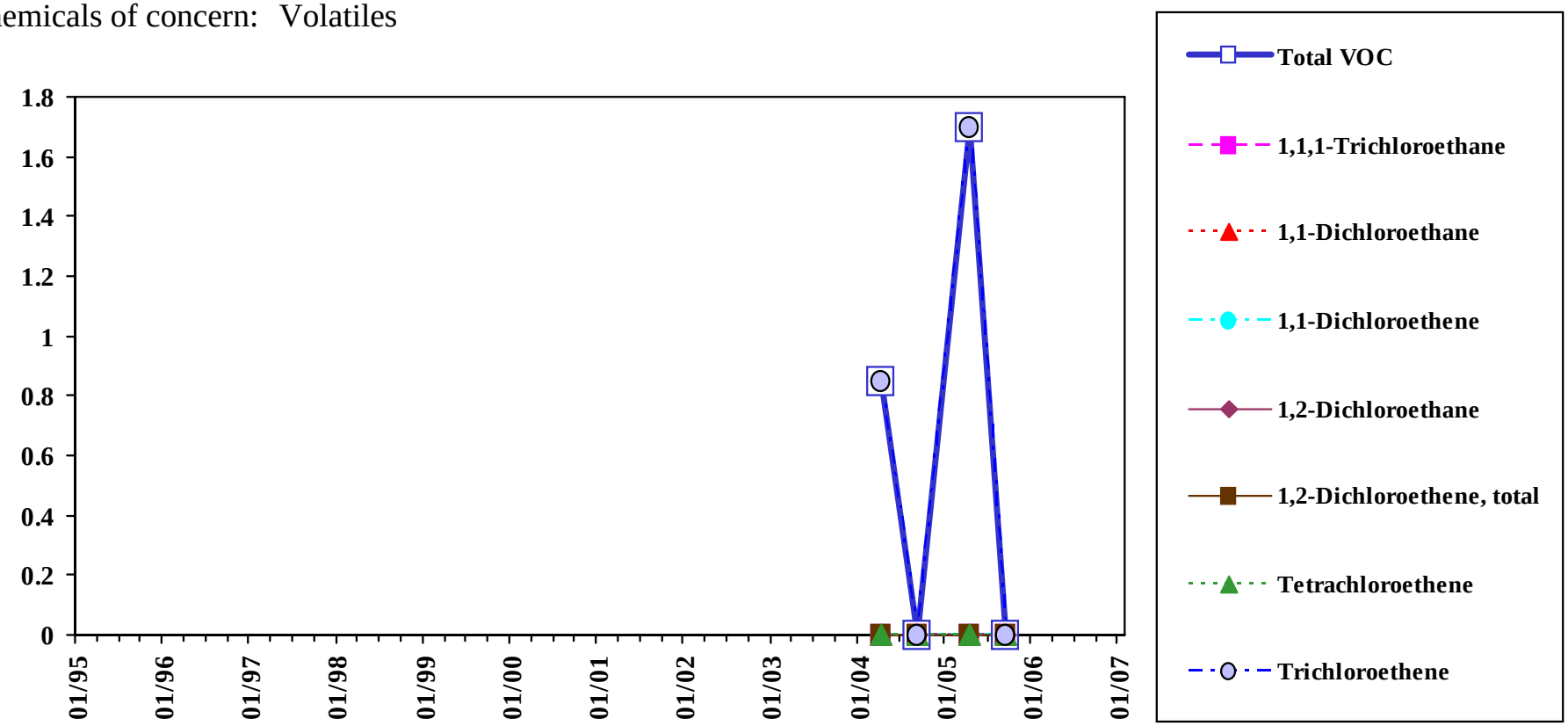
Sample Location:

MW-337

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

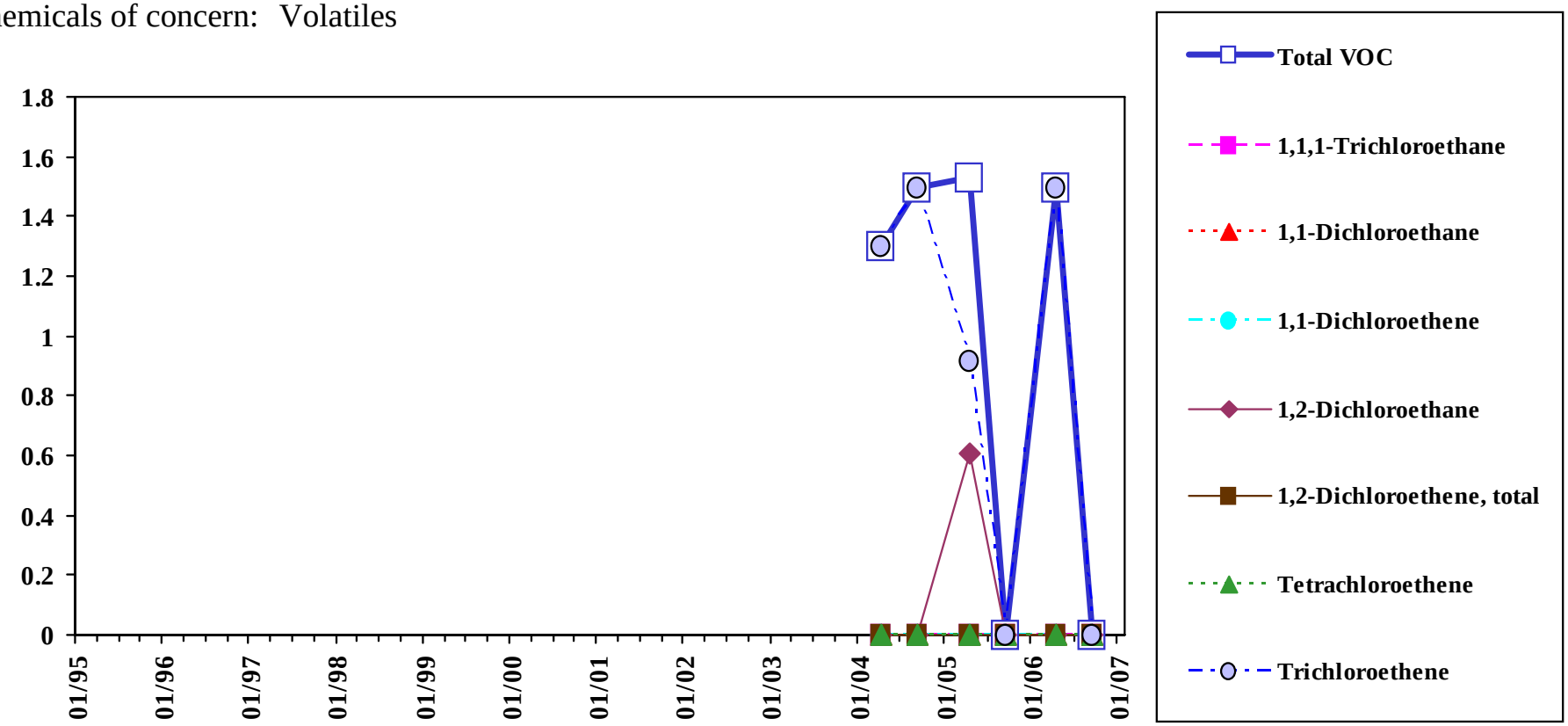
Sample Location:

MW-337

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

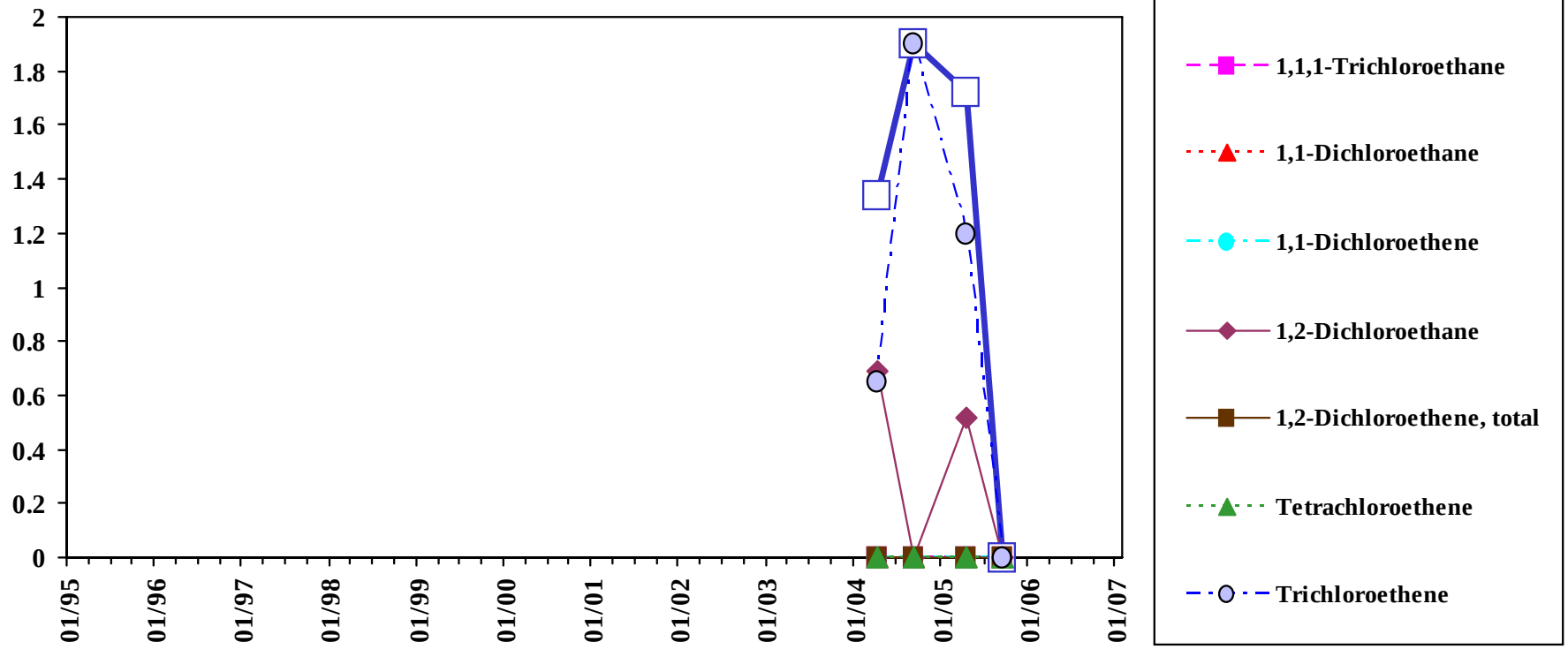
Sample Location:

MW-337

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

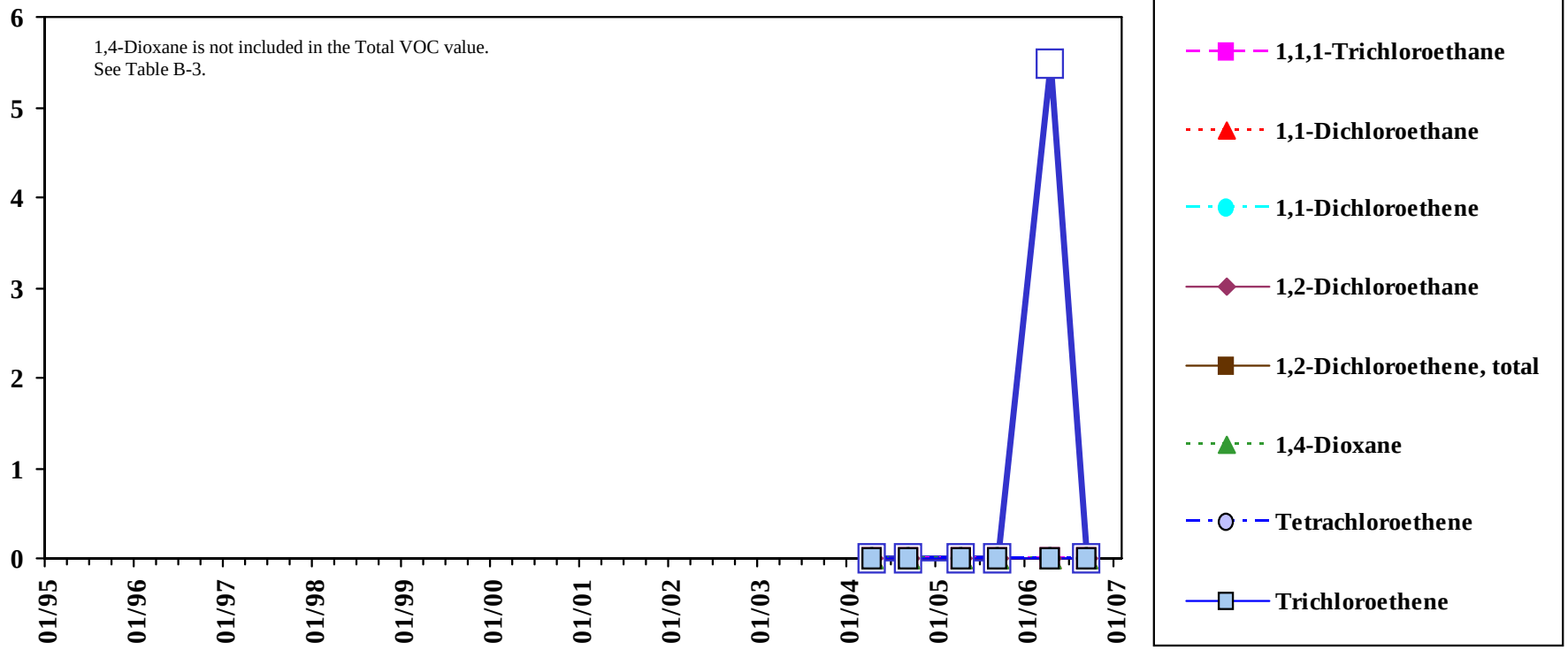
Sample Location:

MW-338A

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

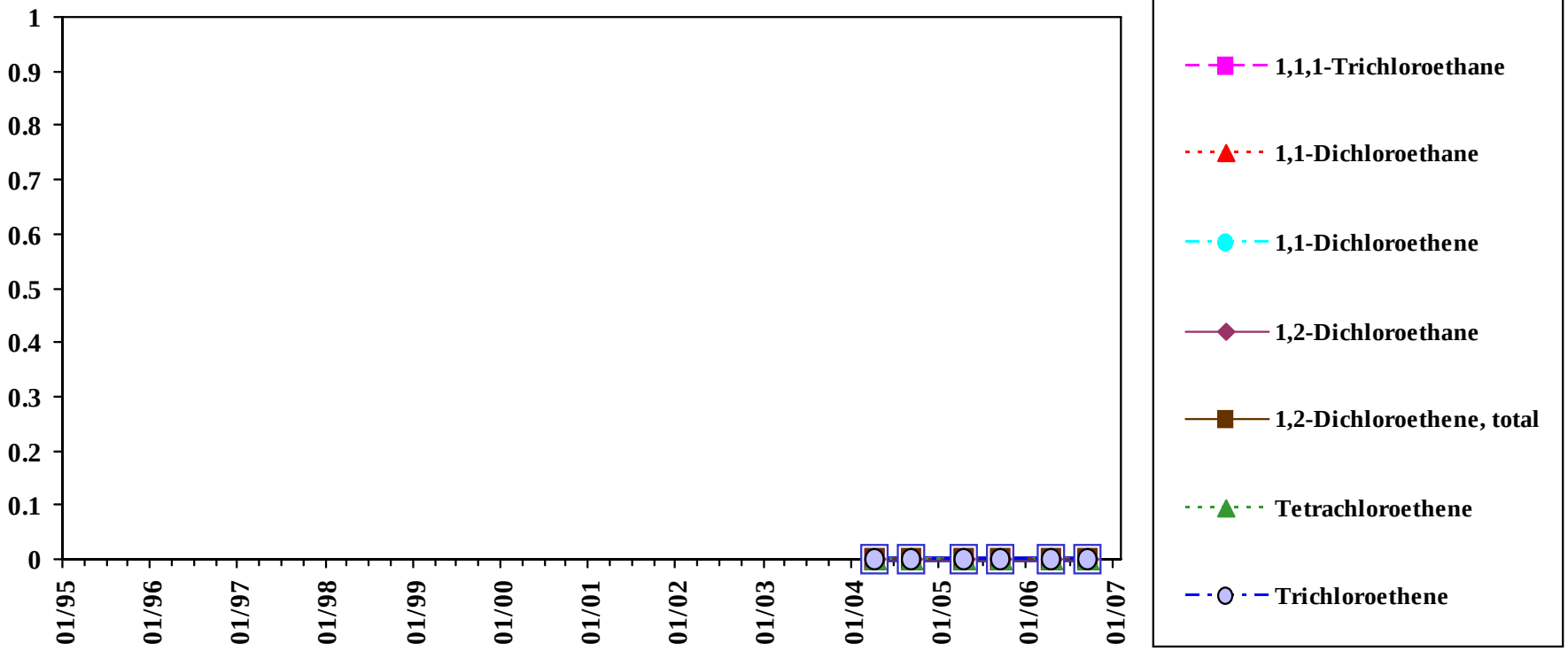
Sample Location:

MW-338A

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

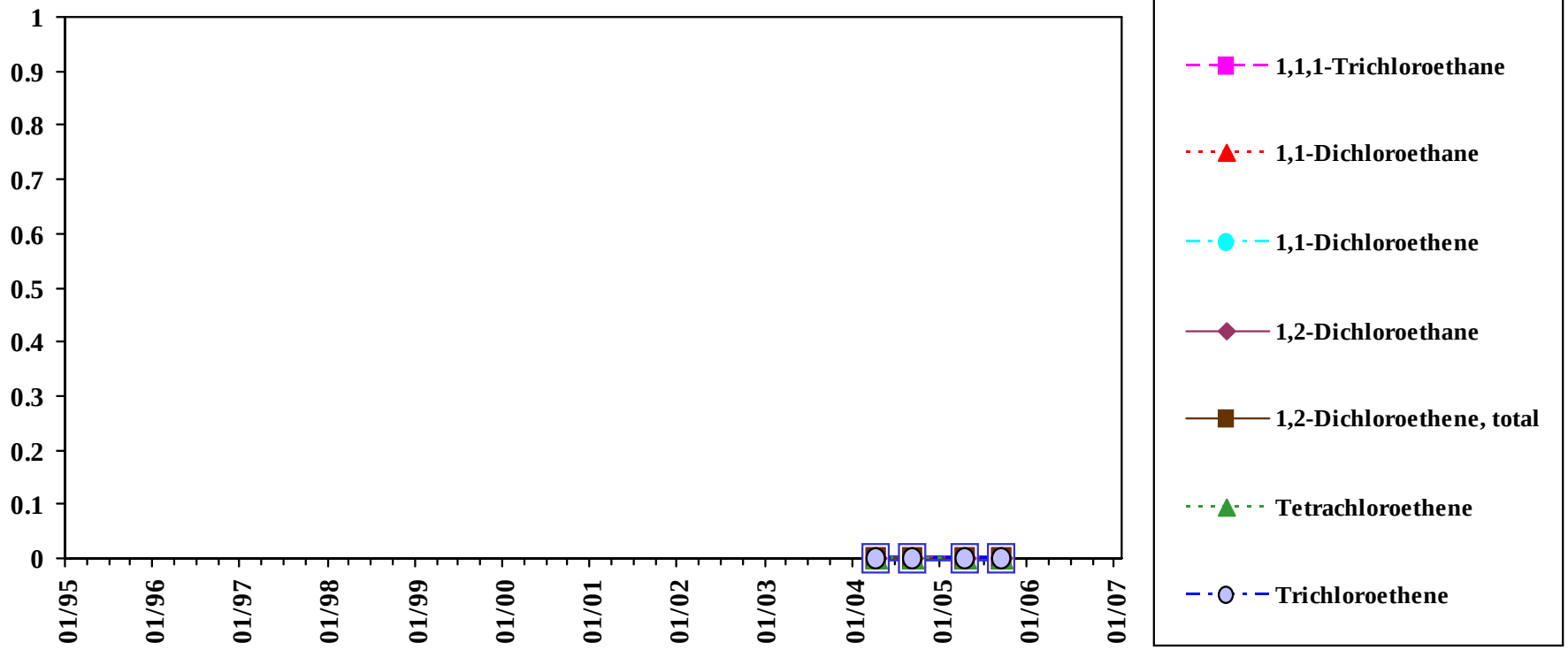
Sample Location:

MW-338A

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

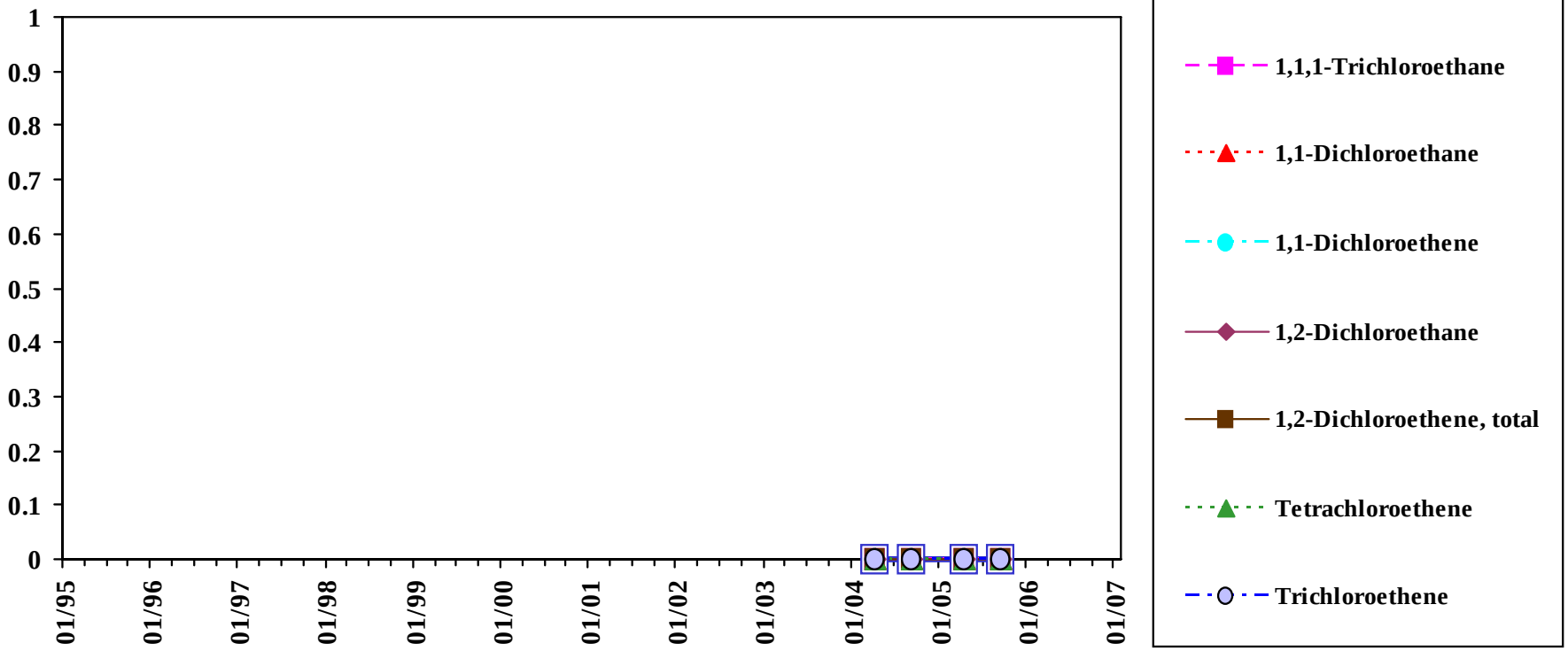
Sample Location:

MW-338A

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

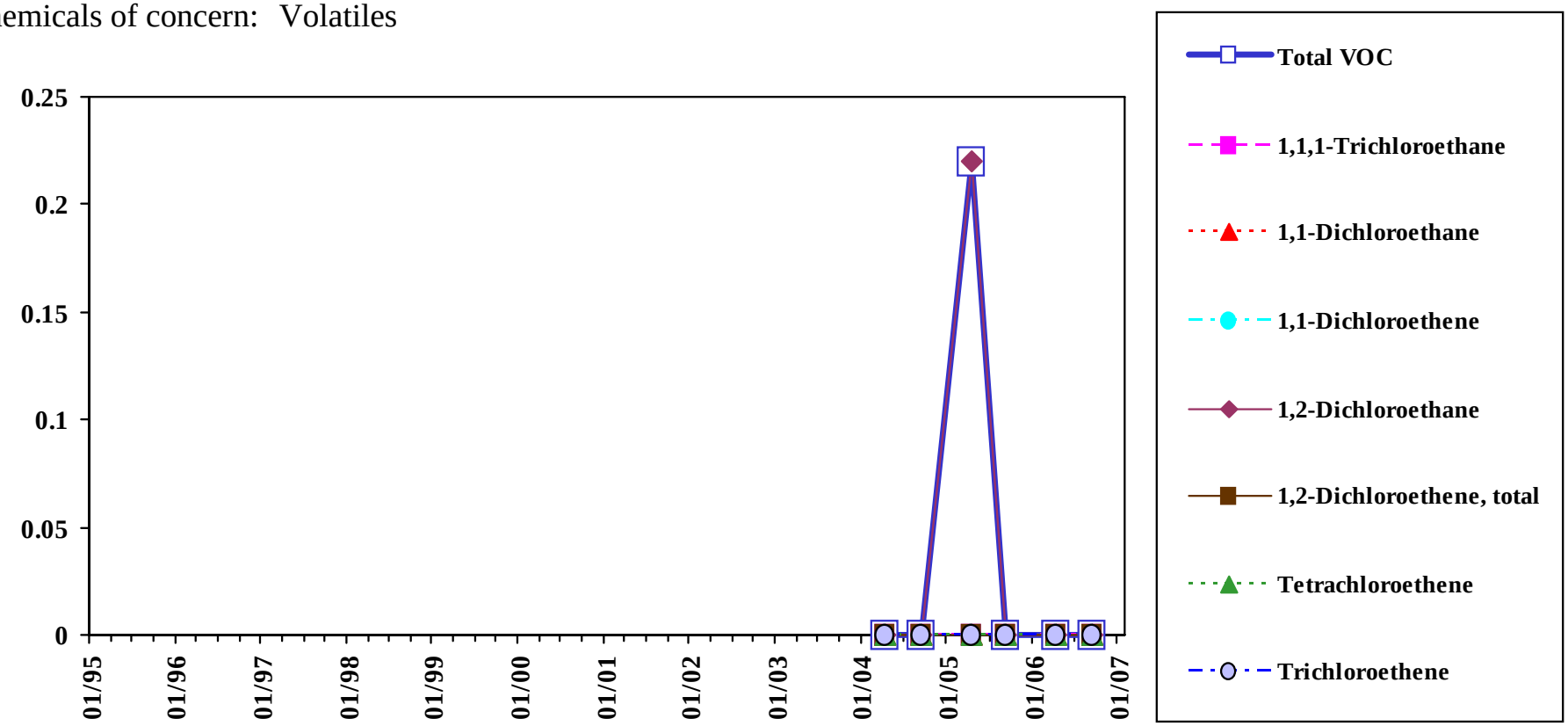
Sample Location:

MW-338B

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

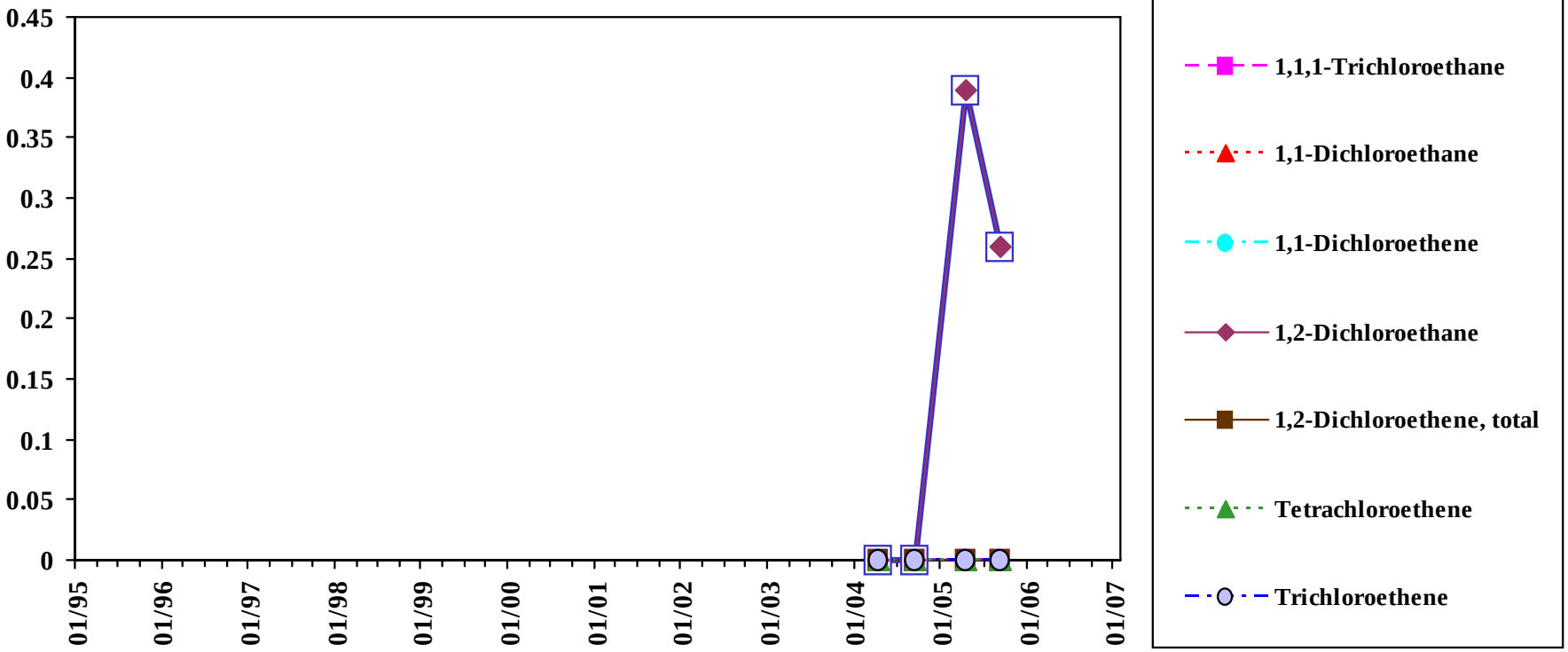
Sample Location:

MW-338B

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

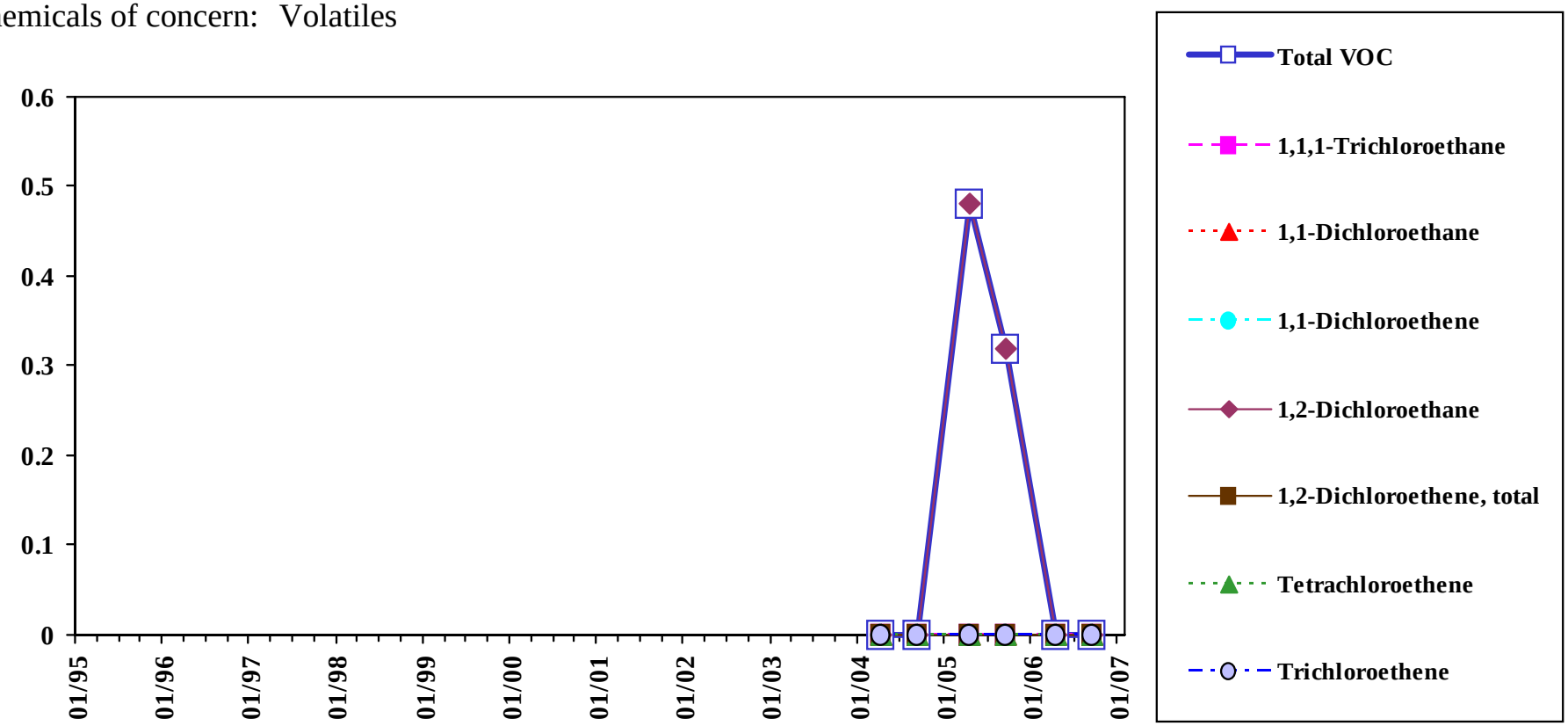
Sample Location:

MW-338B

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

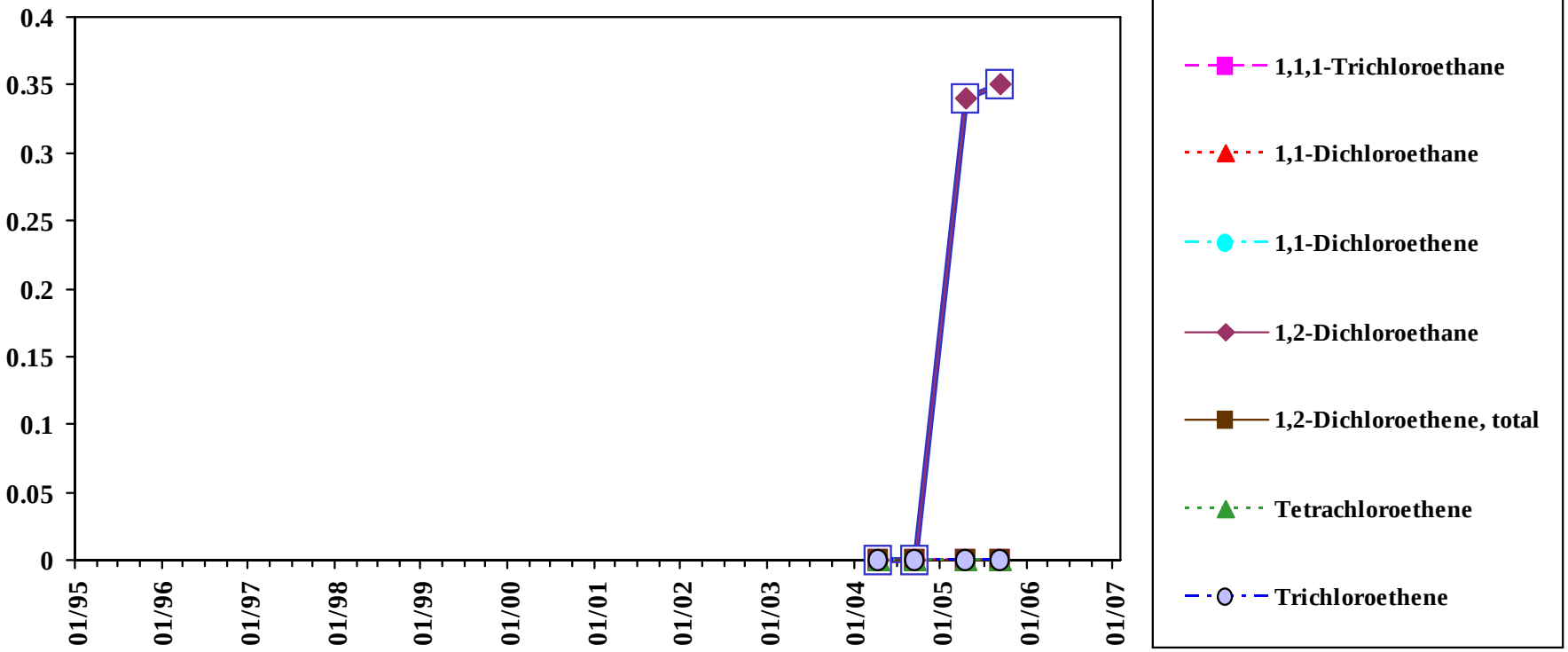
Sample Location:

MW-338B

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

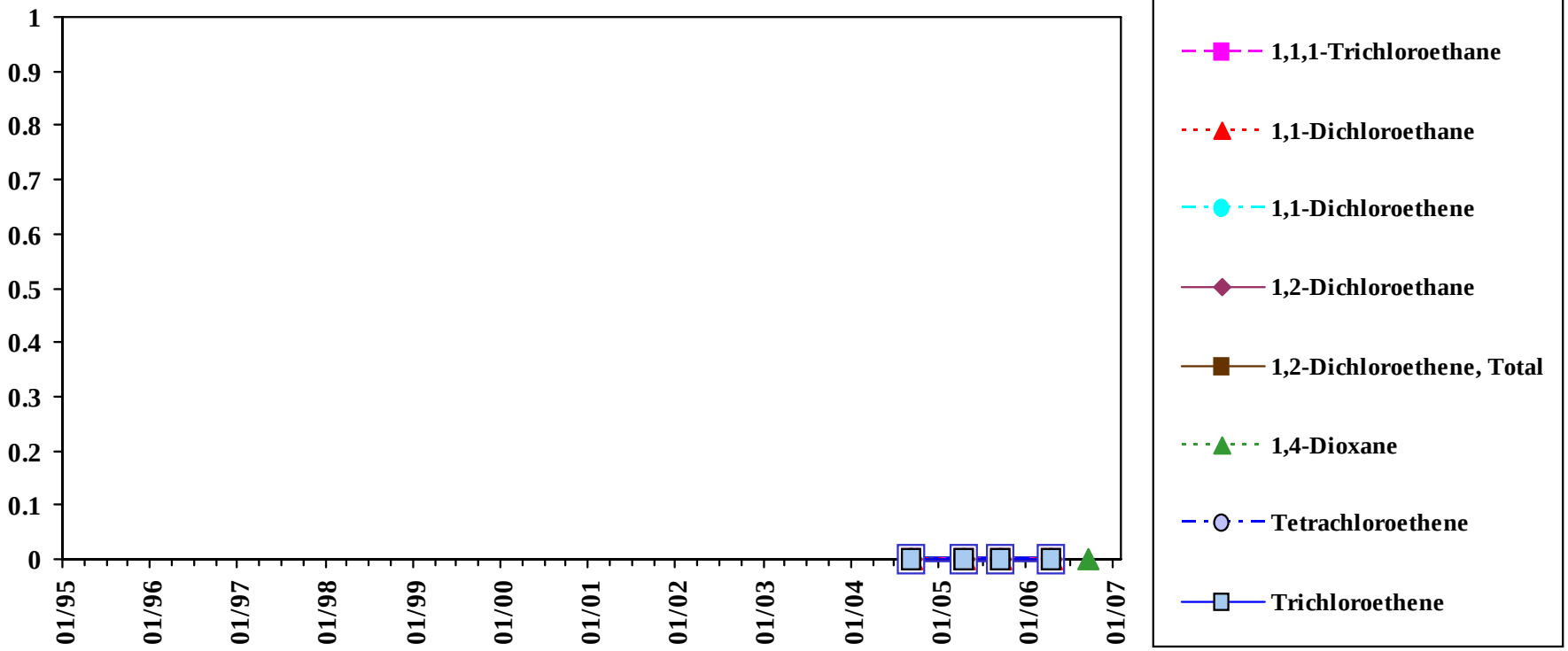
Sample Location:

MW-338C

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

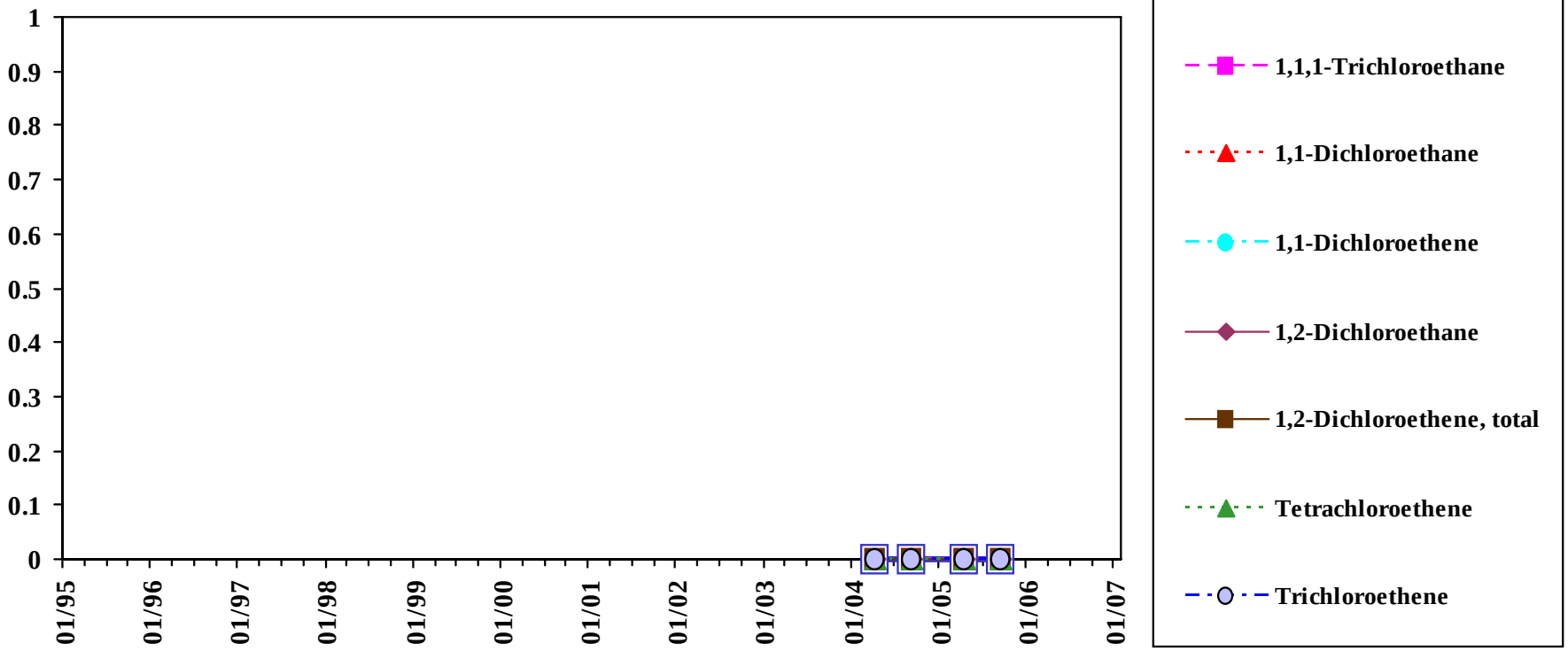
Sample Location:

MW-338C

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

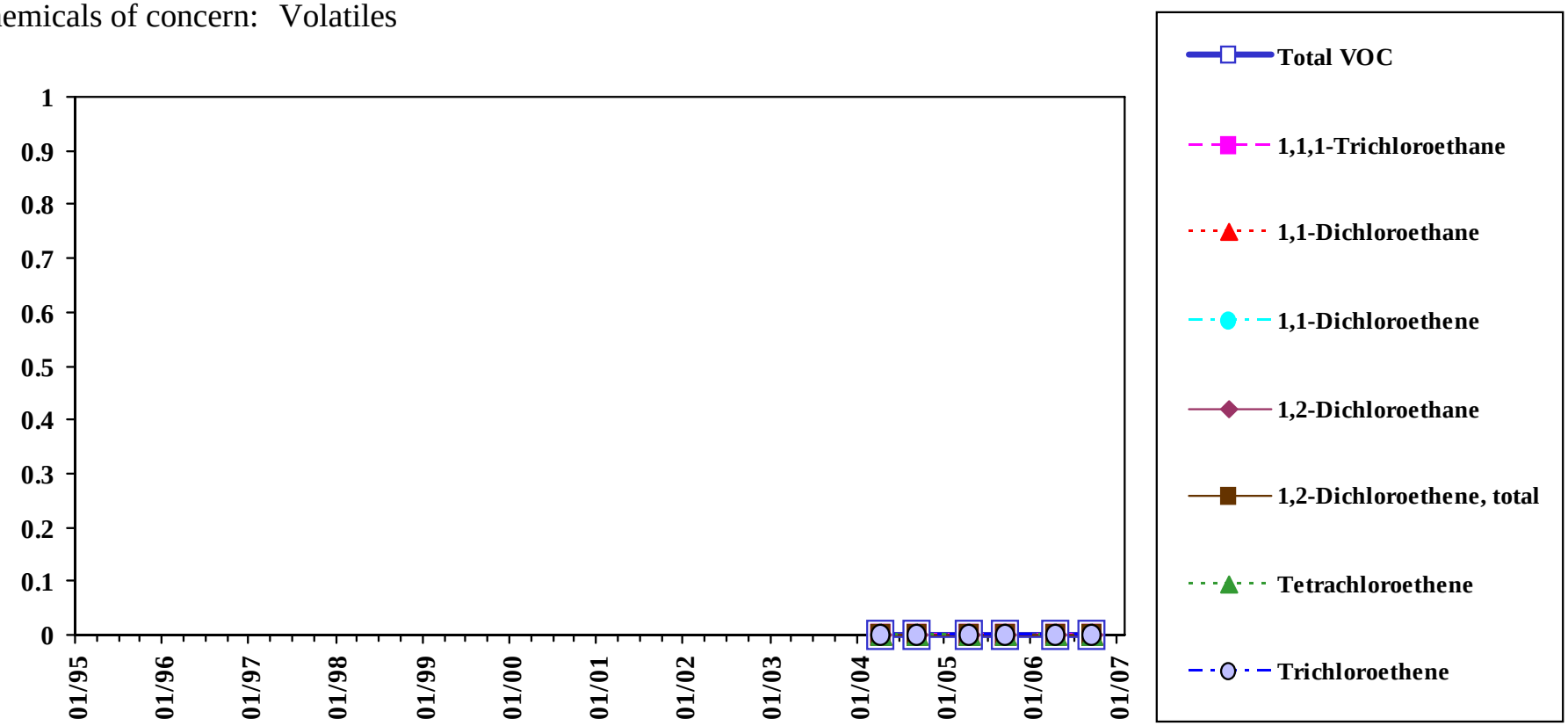
Sample Location:

MW-338C

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

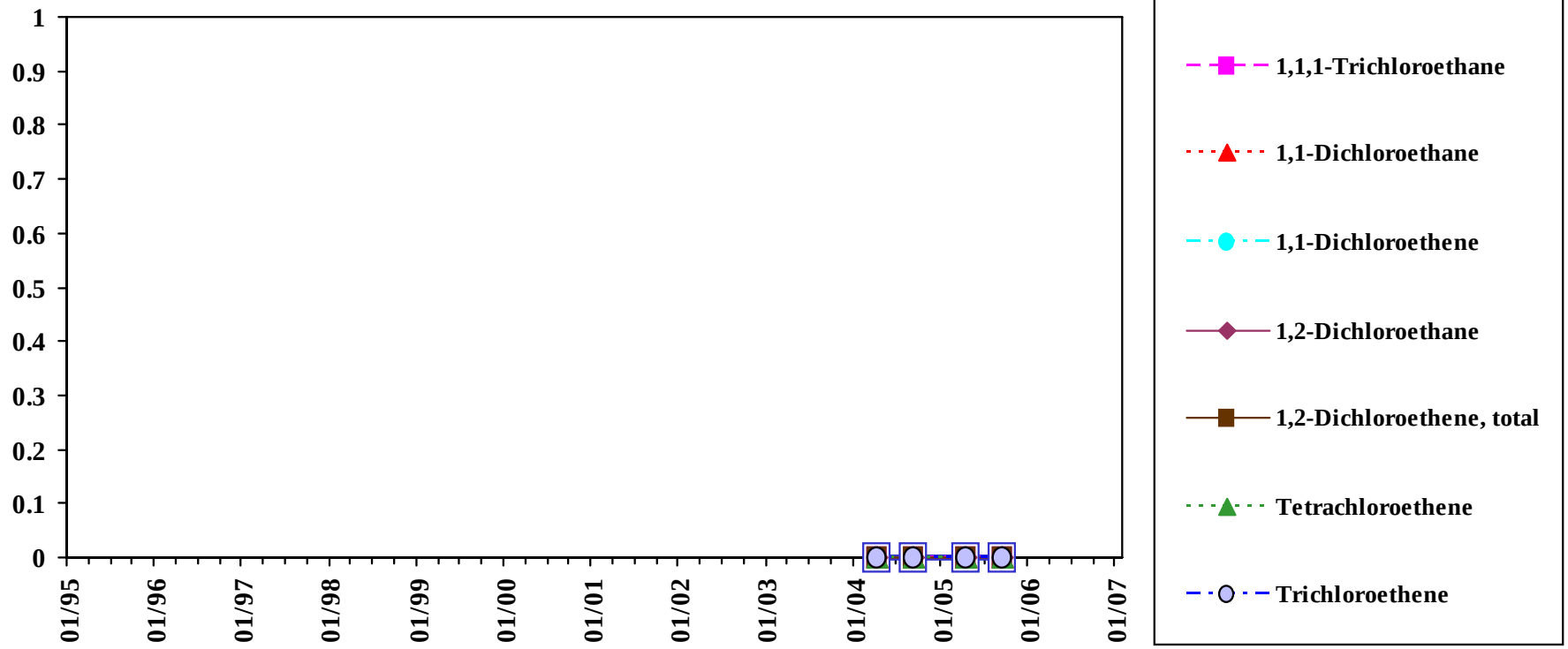
Sample Location:

MW-338C

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

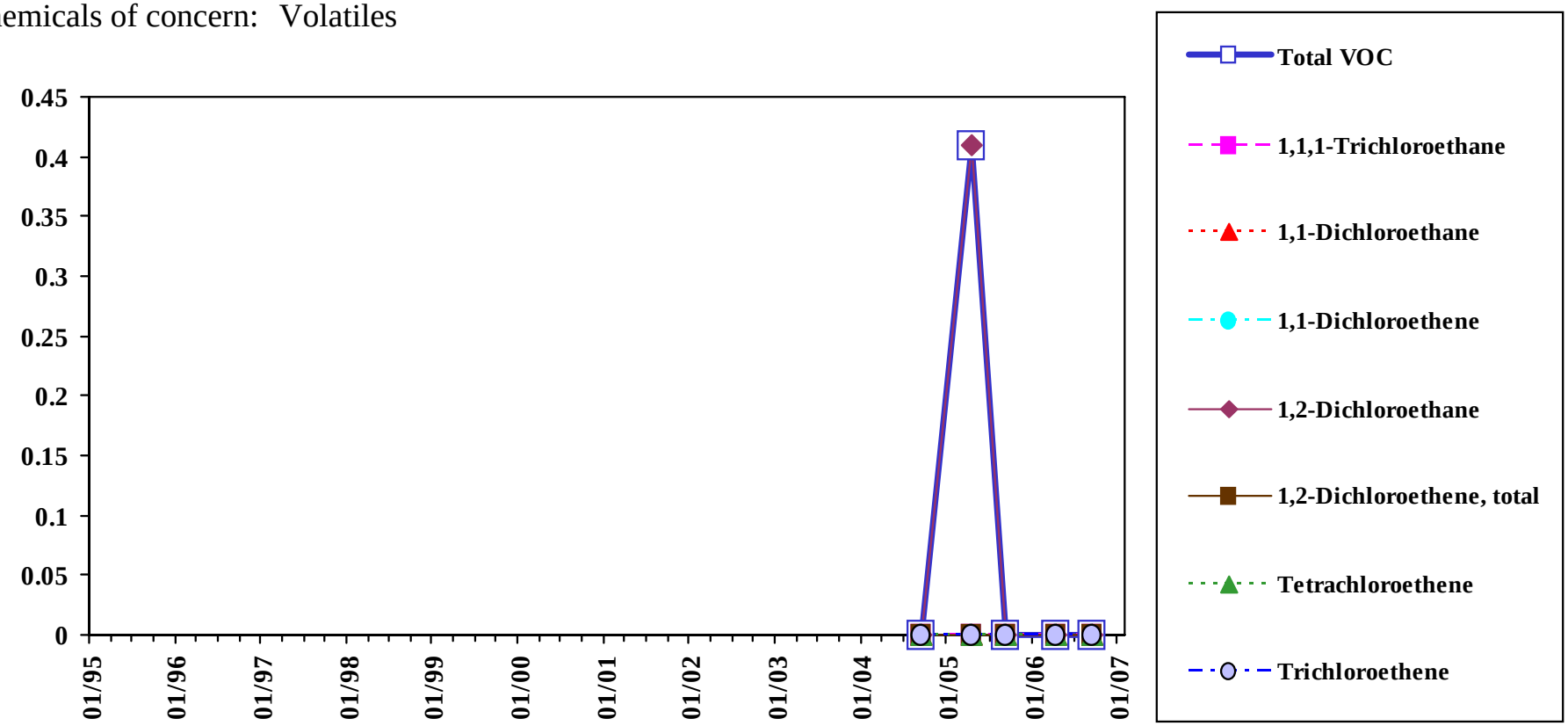
Sample Location:

MW-339

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

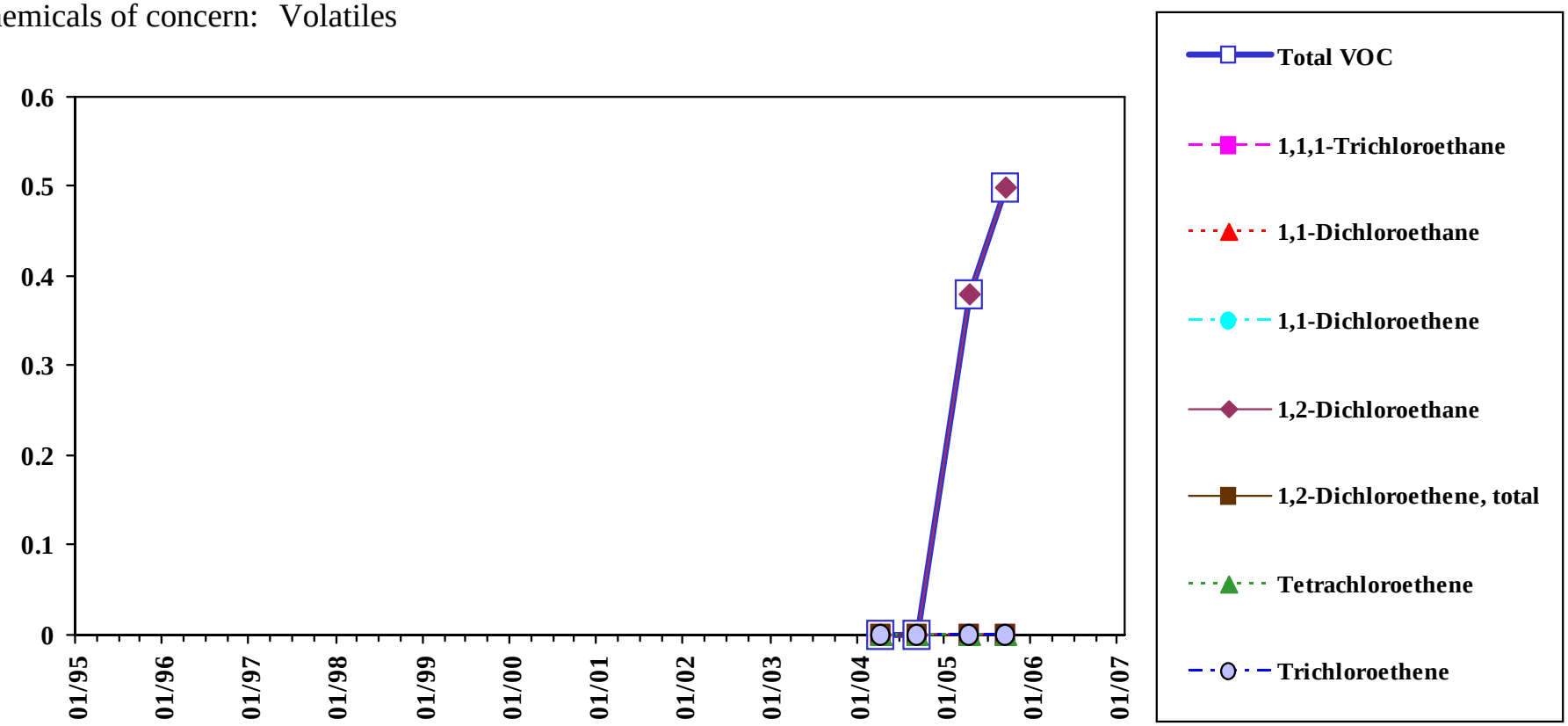
Sample Location:

MW-339

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

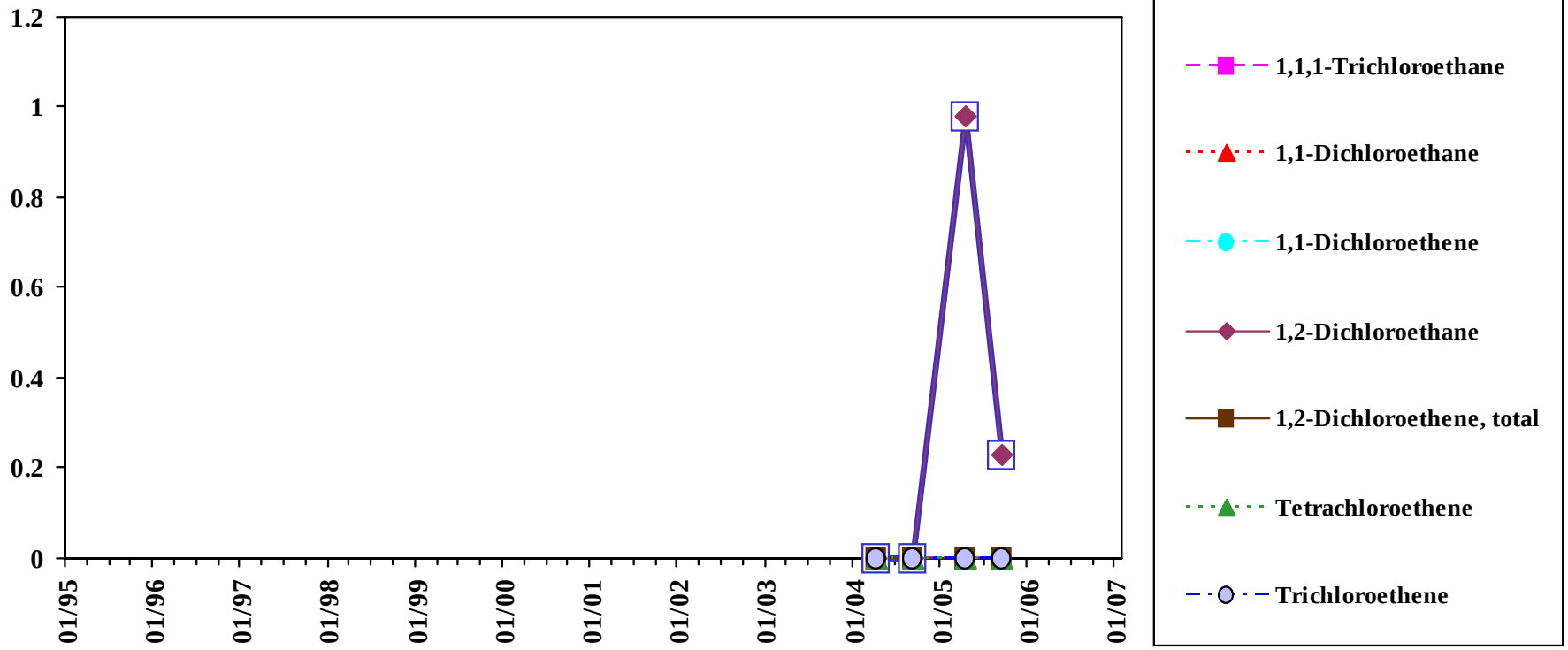
Sample Location:

MW-339

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

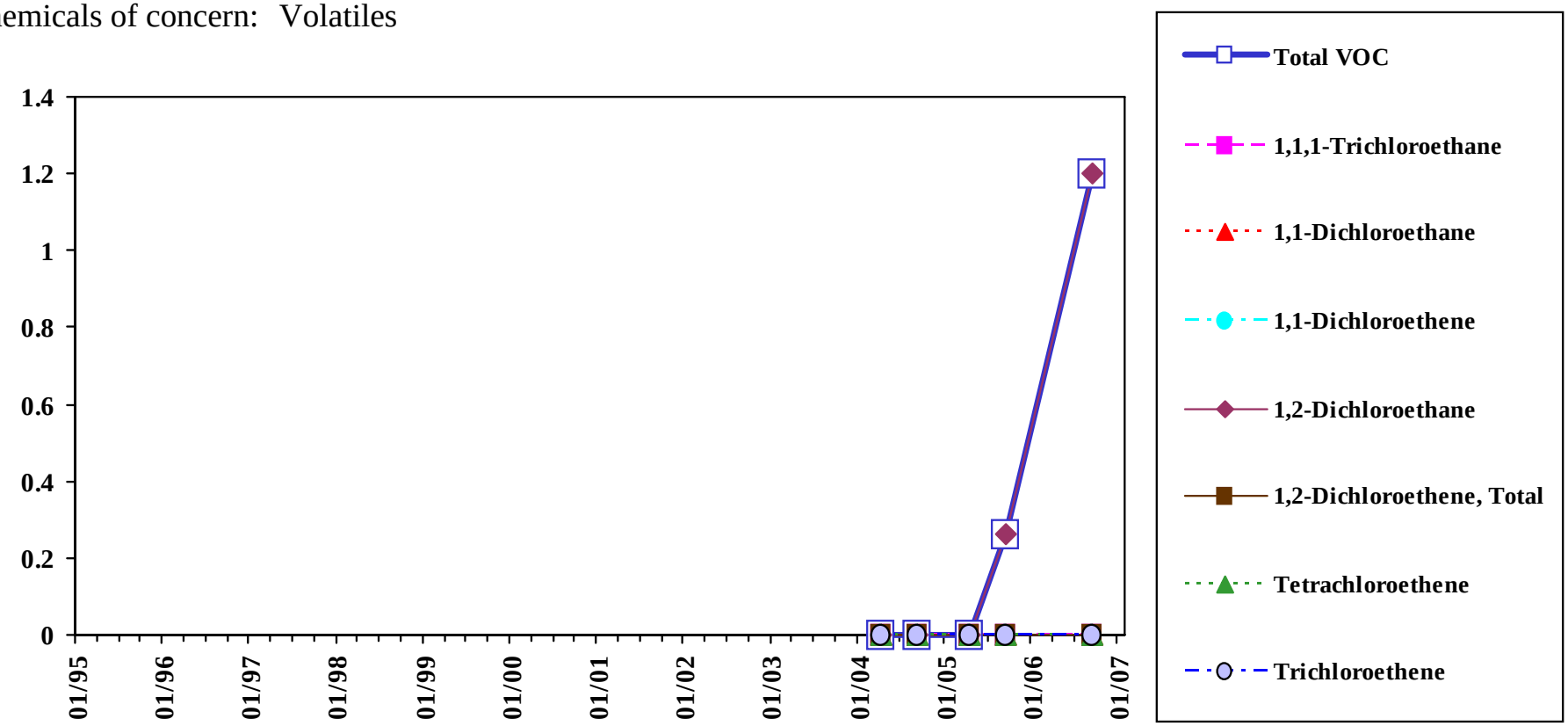
Sample Location:

MW-339

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/l

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

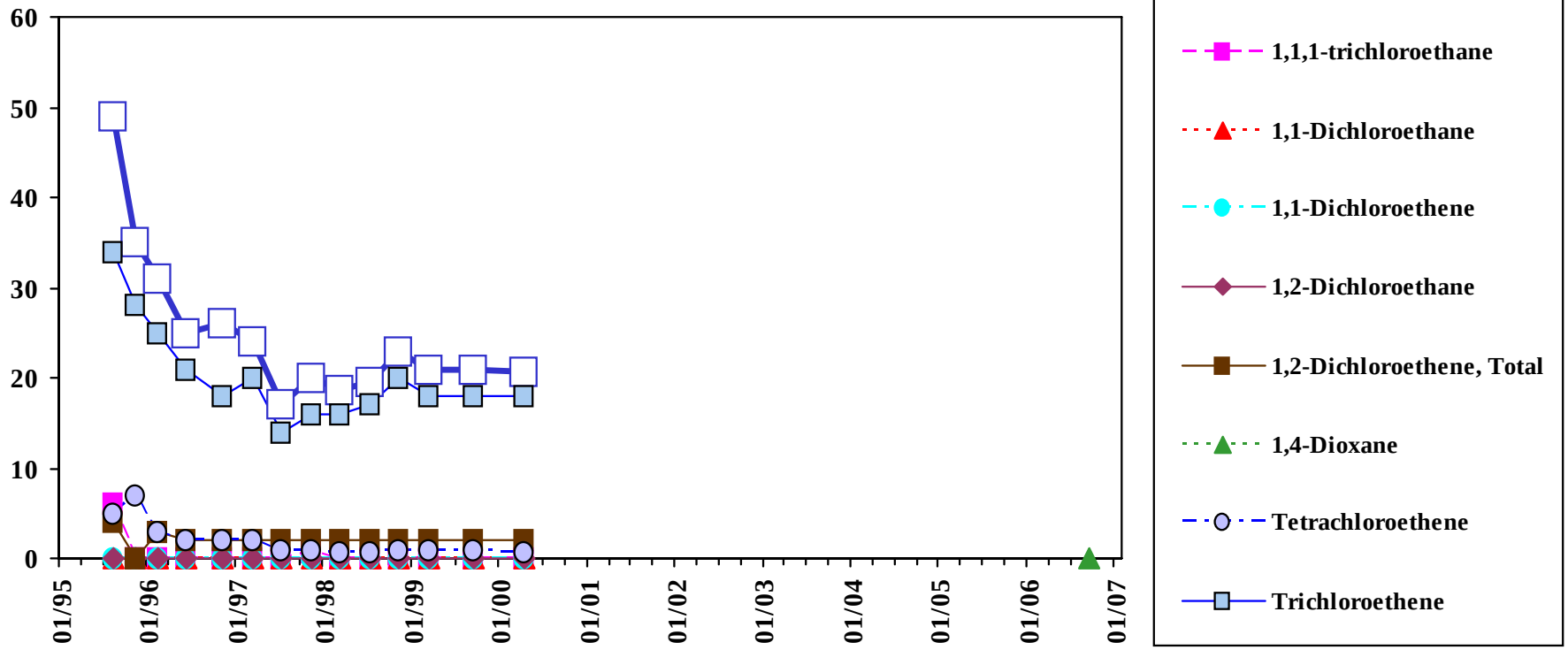
Sample Location:

MW-NASB-212

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

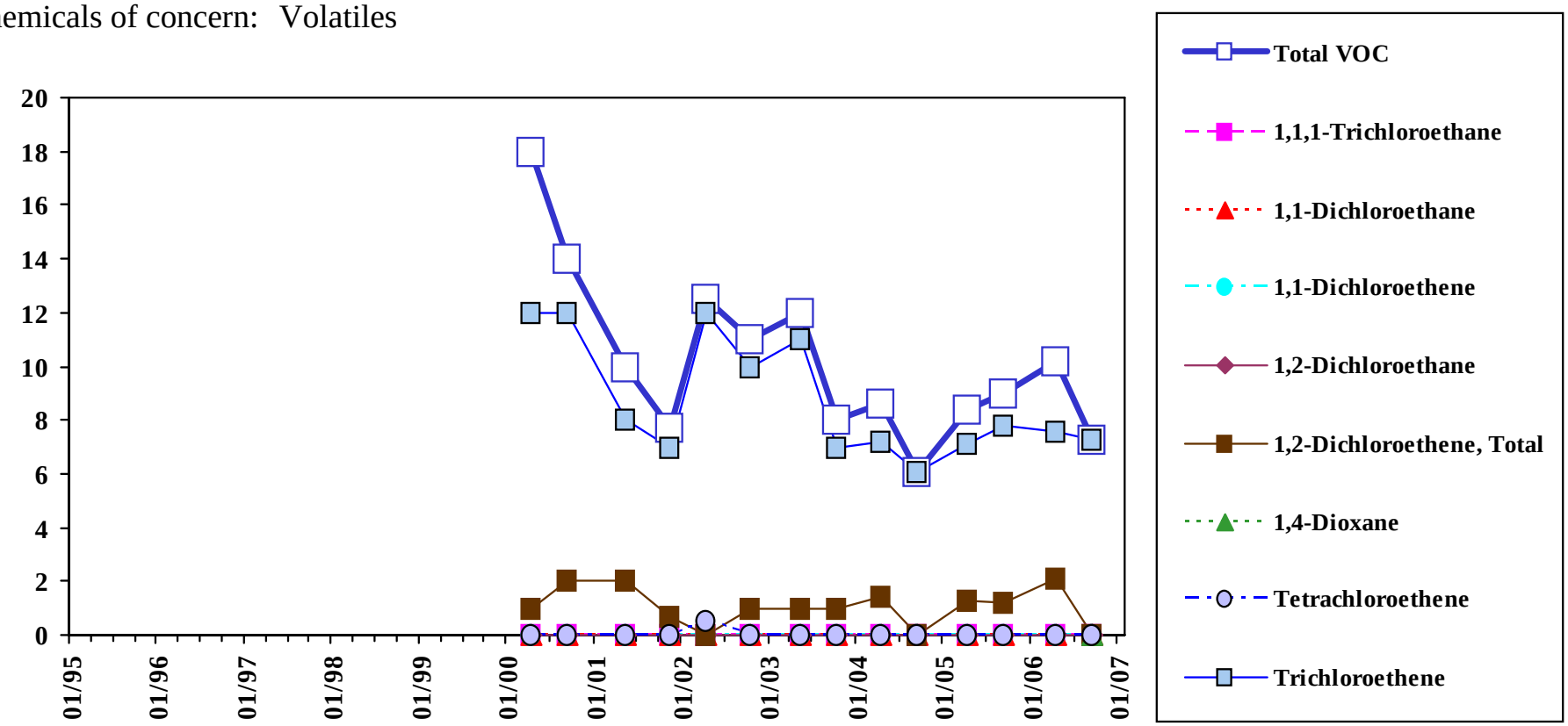
Sample Location:

MW-NASB-212

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

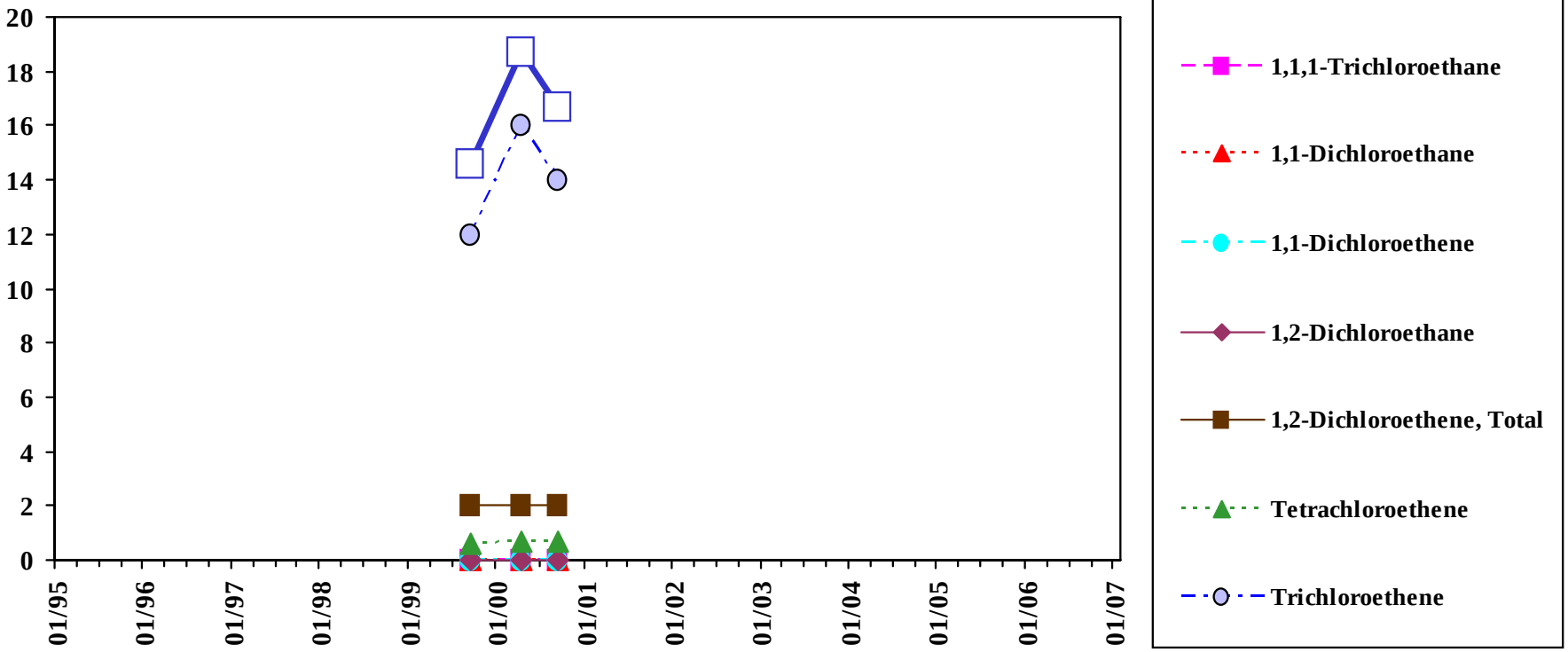
Sample Location:

MW-NASB-212

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

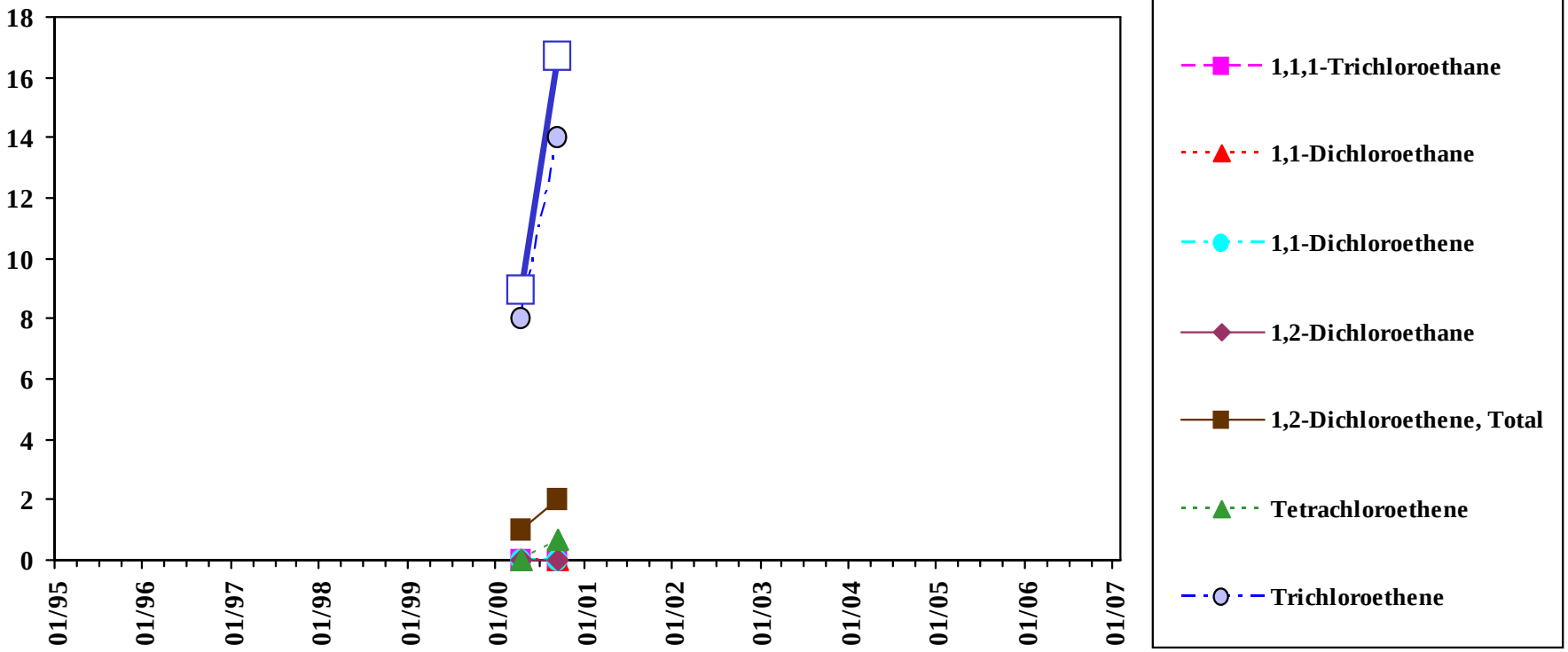
Sample Location:

MW-NASB-212

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

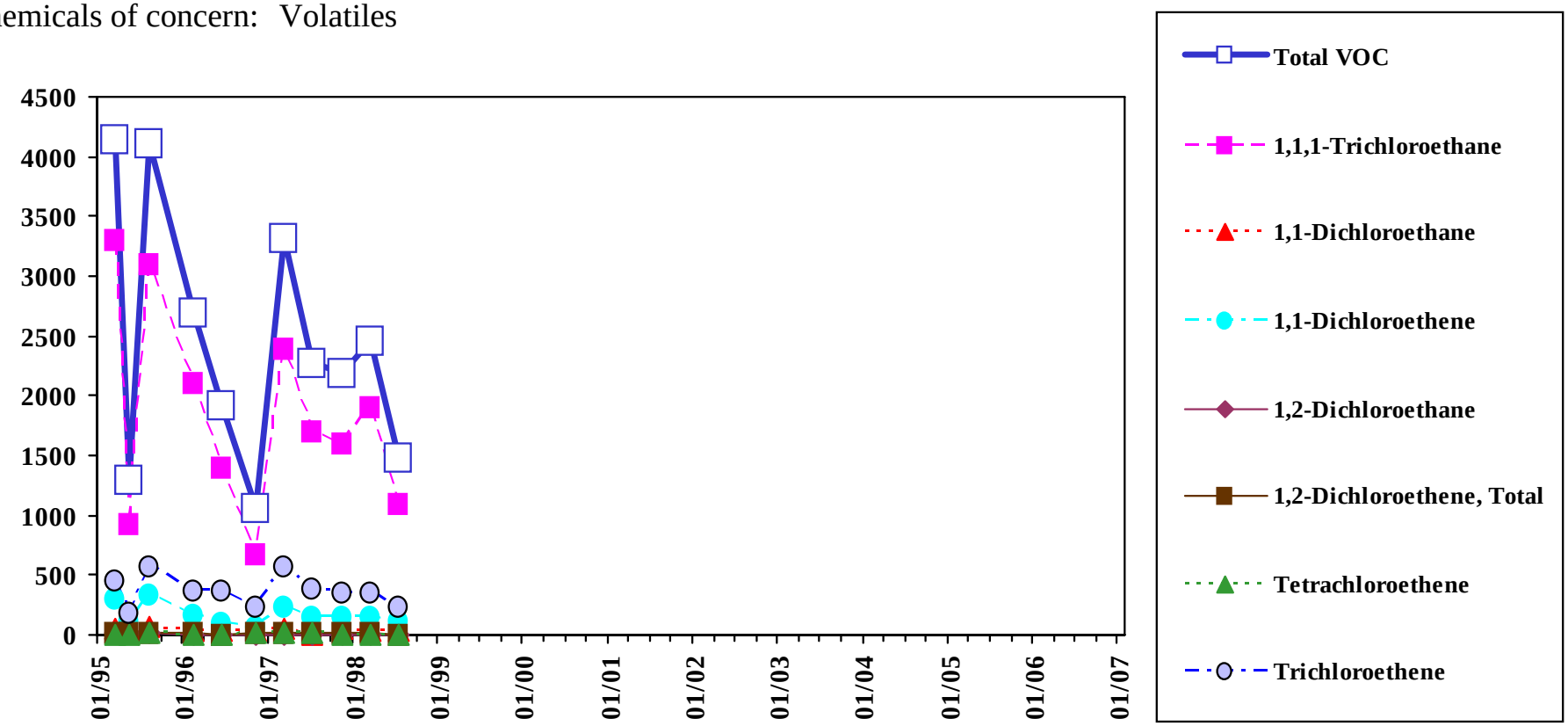
Sample Location:

P-105

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

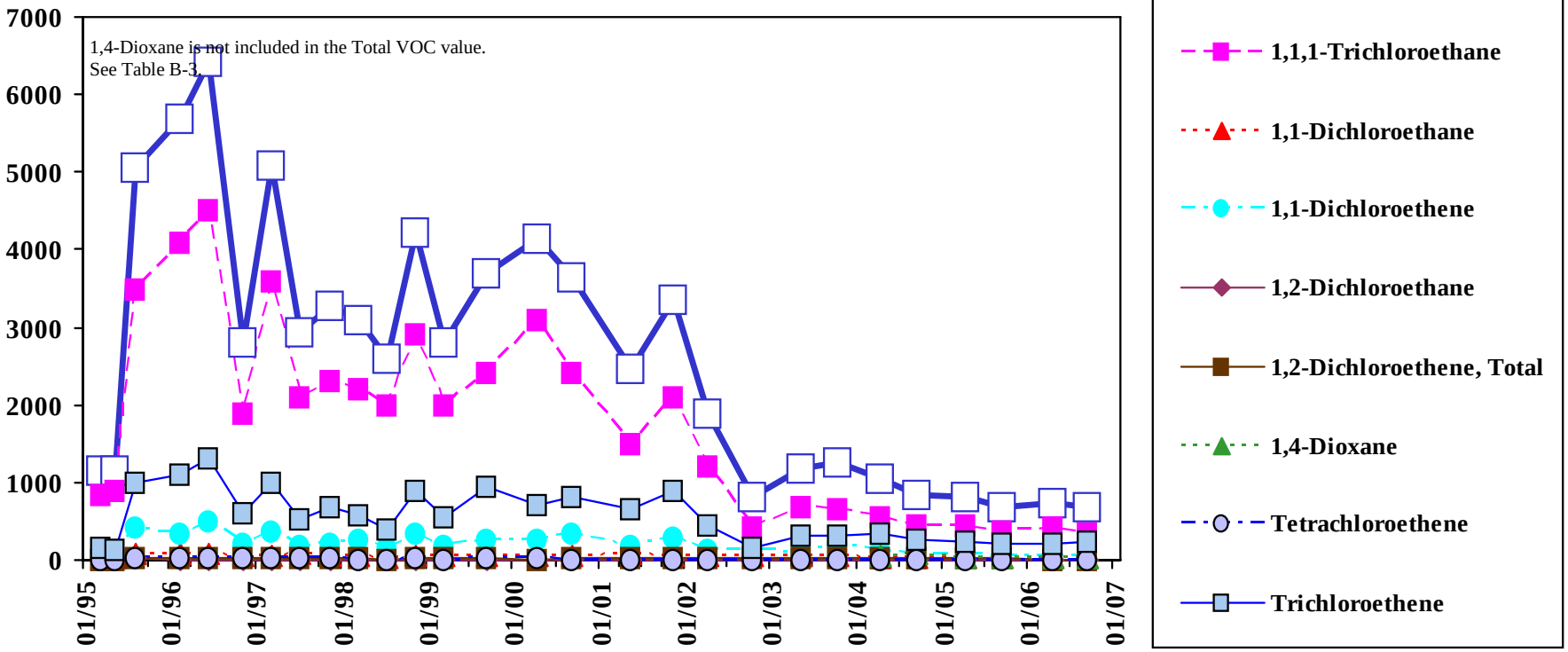
Sample Location:

P-106

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

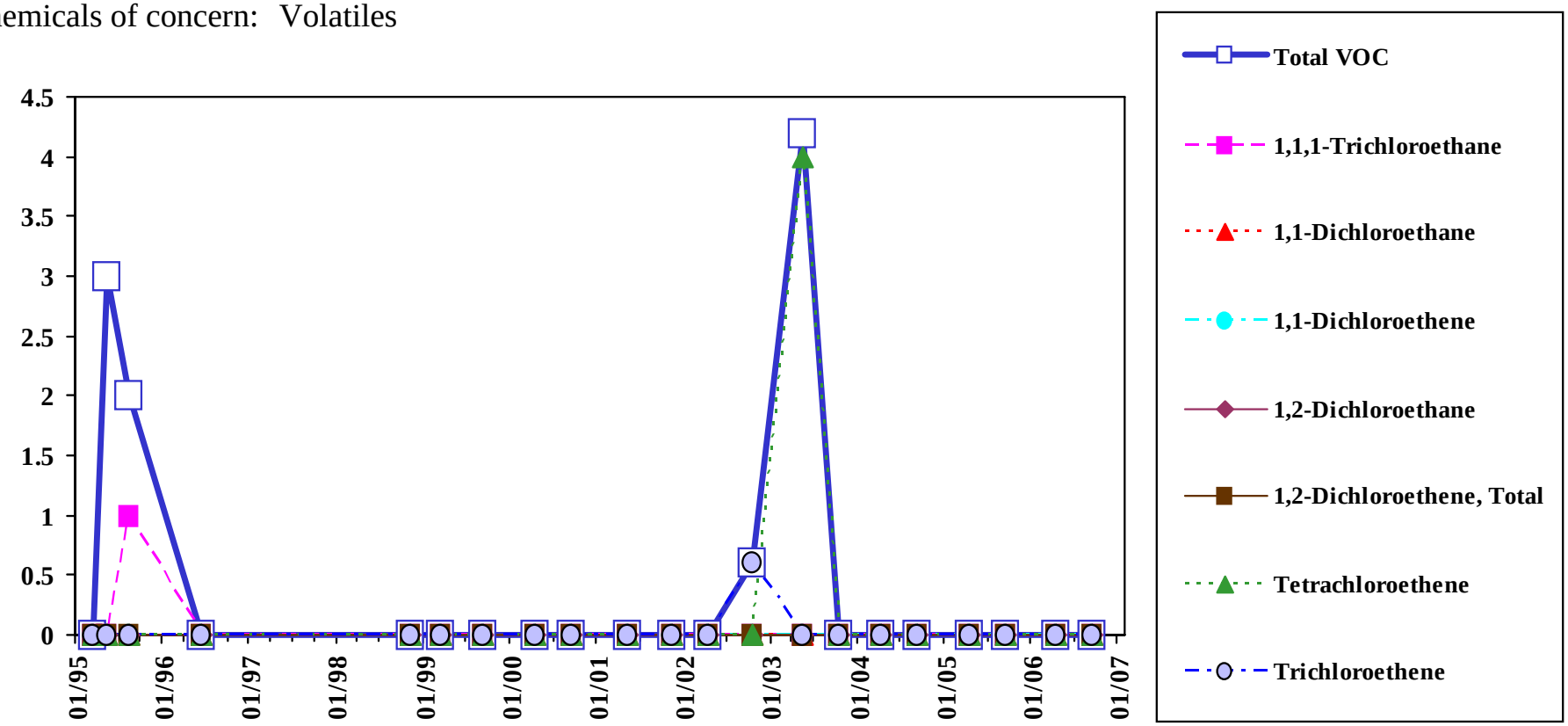
Sample Location:

P-111

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

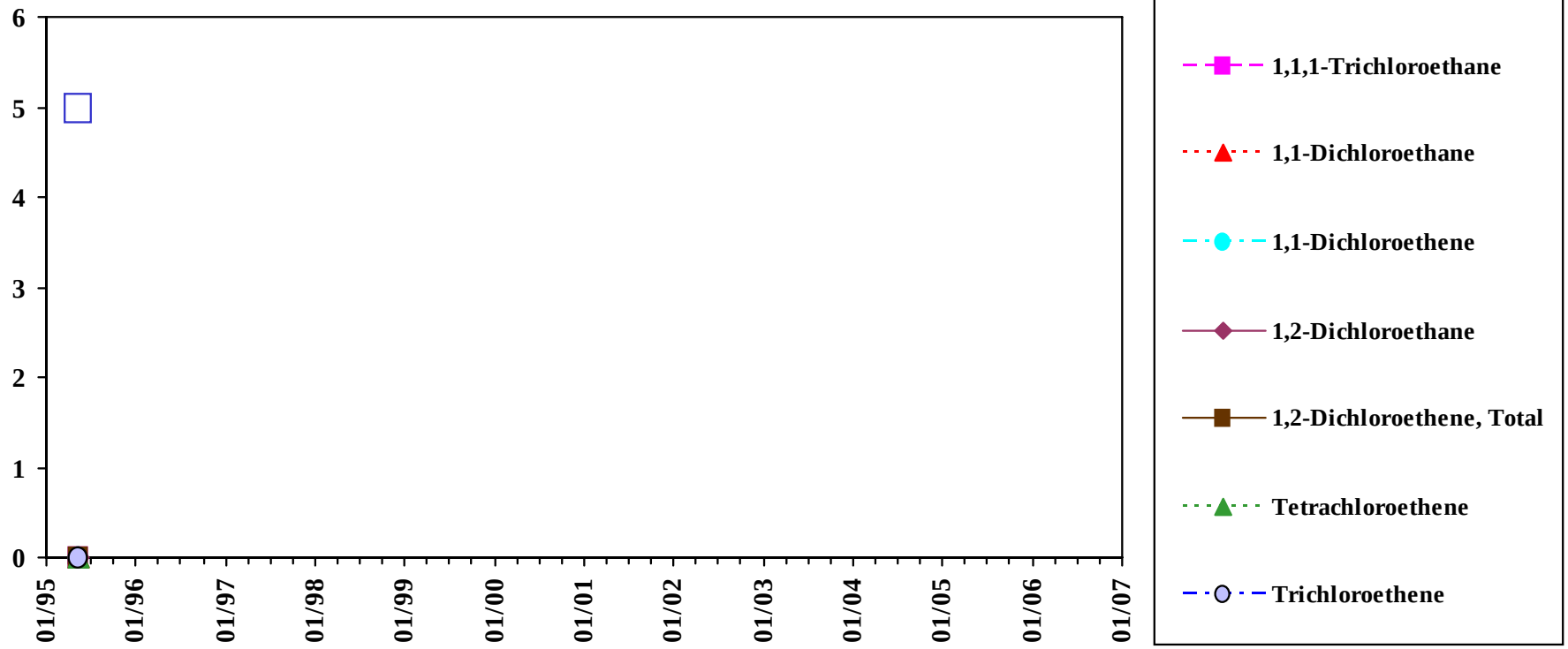
Sample Location:

P-112

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

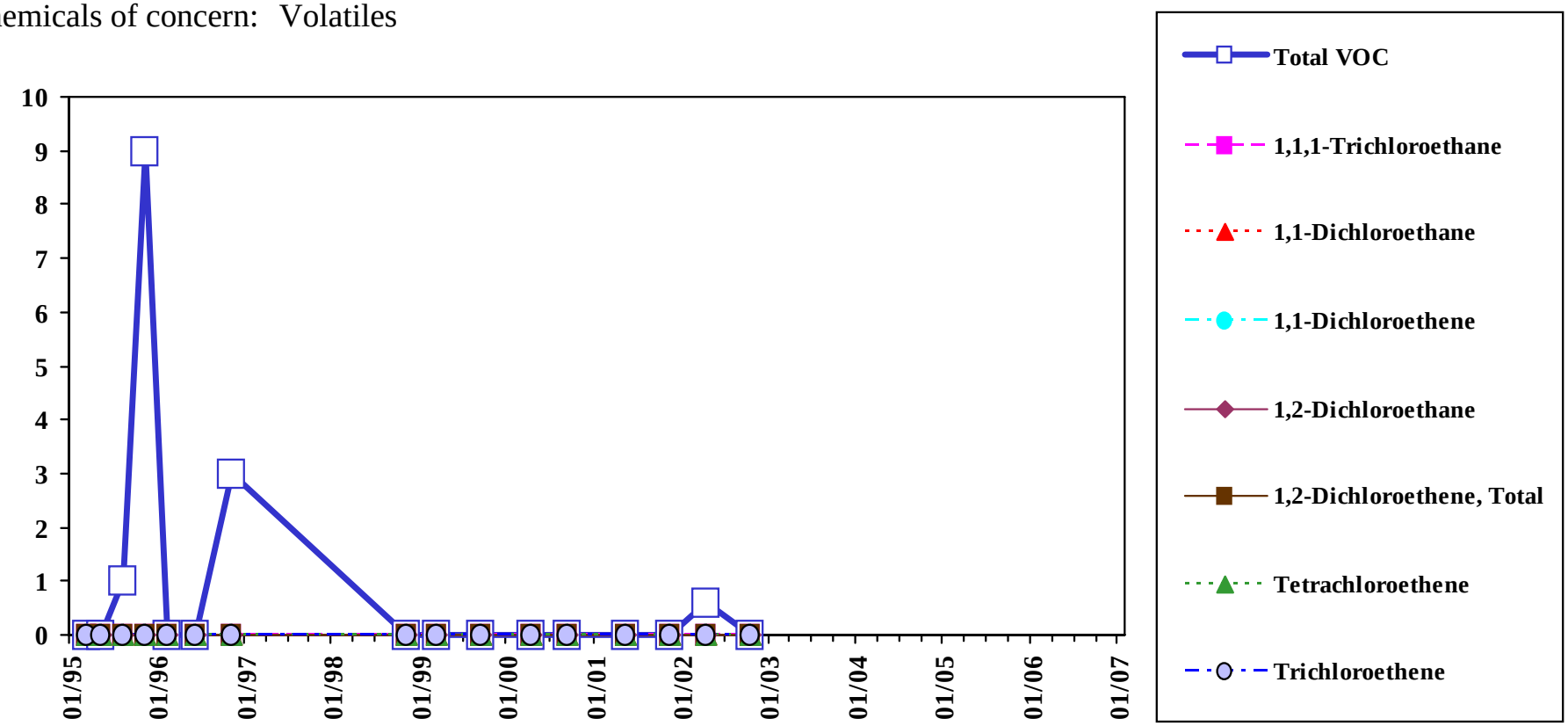
Sample Location:

P-132

Low-flow Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

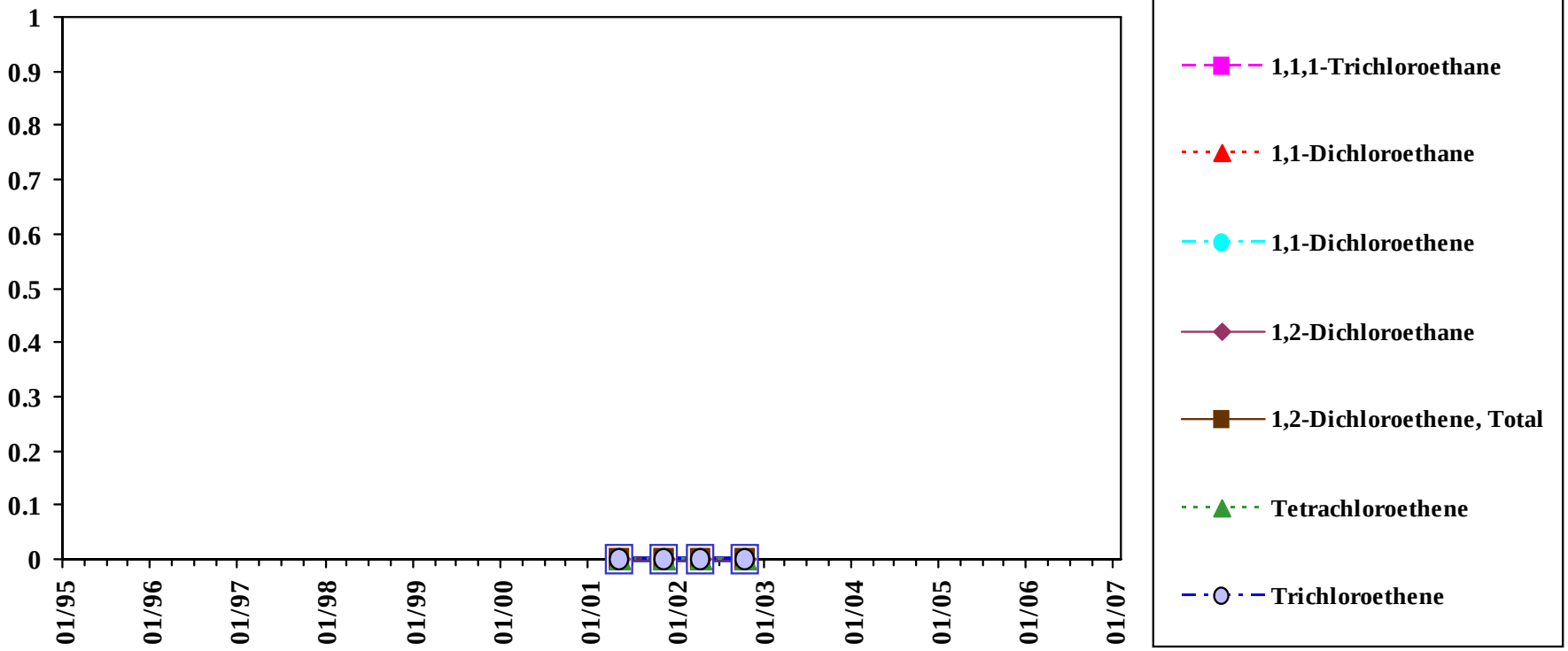
Sample Location:

P-132

Shallow Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

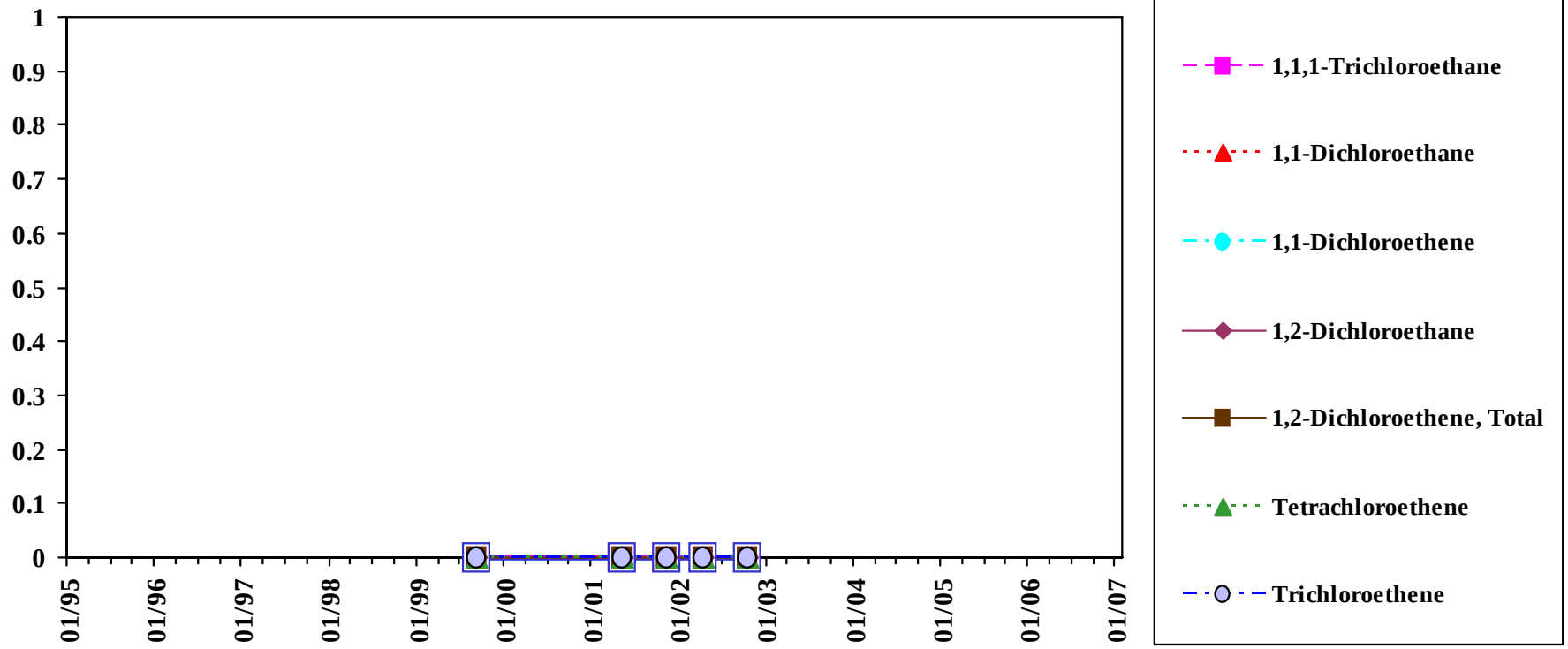
Sample Location:

P-132

Mid-depth Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

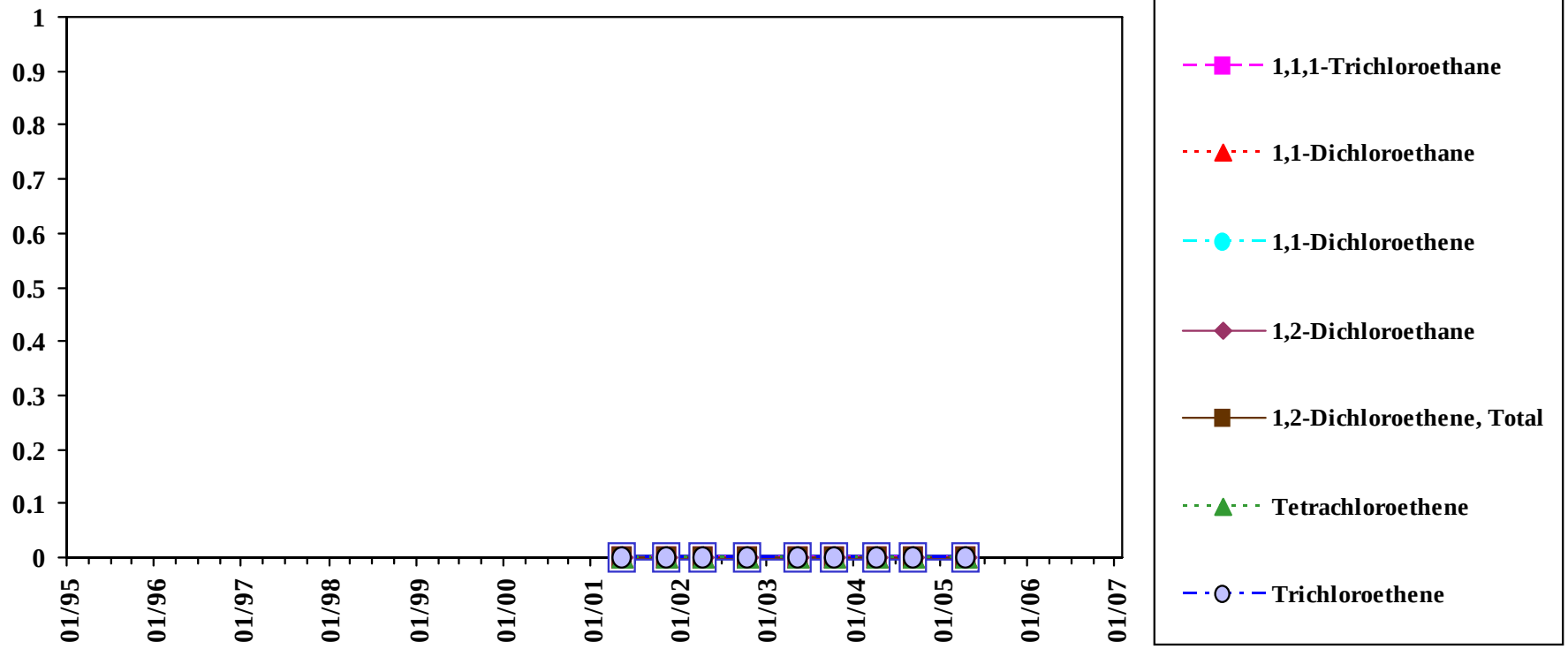
Sample Location:

P-132

Deep Diffusion Sample

Eastern Plume Groundwater

Chemicals of concern: Volatiles



Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Sample concentration units: µg/L

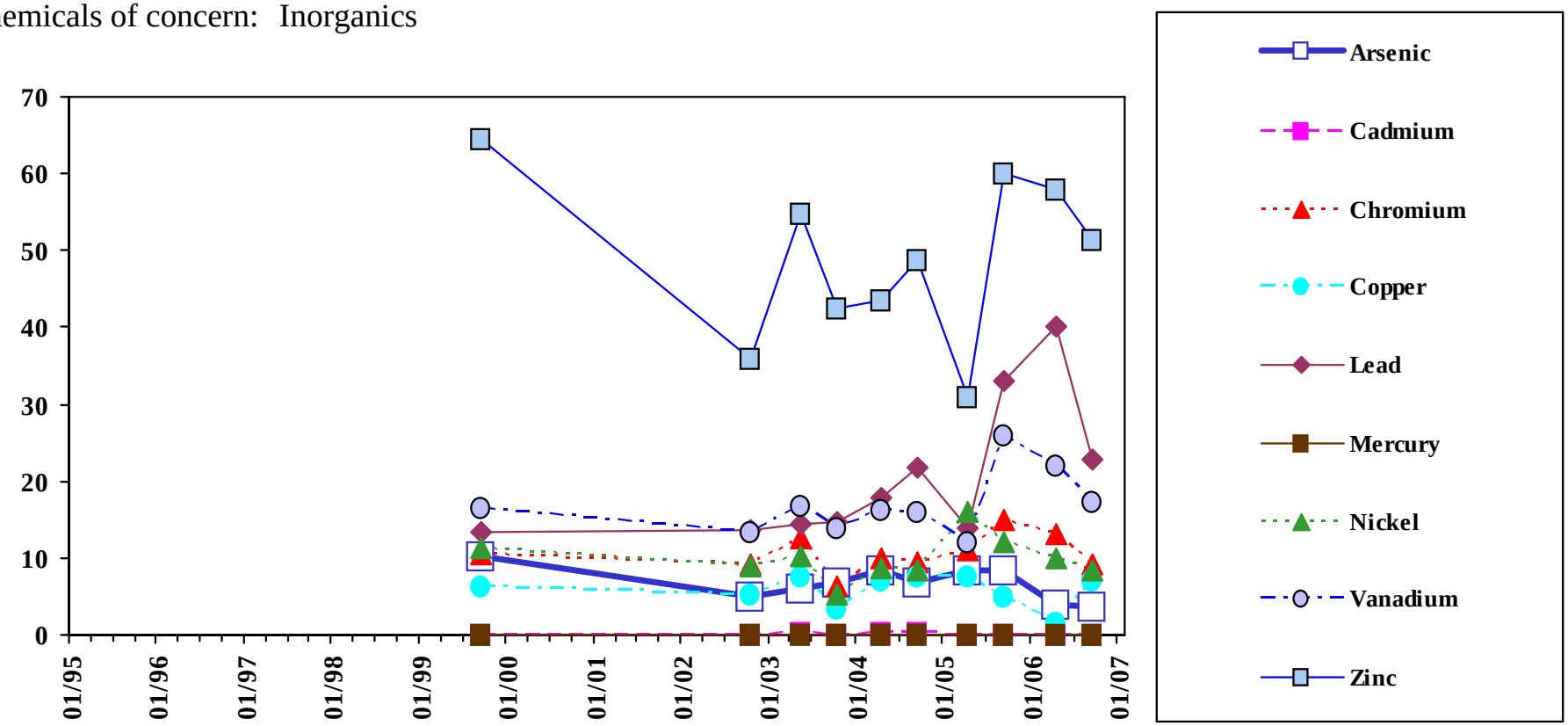
1,1,1-Trichloroethane		1,1-Dichloroethane		1,1-Dichloroethene		1,2-Dichloroethene, total		Tetrachloroethene		Trichloroethene	
MEG:	200	MEG:	70	MEG:	7	MEG:	70	MEG:	3	MEG:	5
MCL:	200	MCL:	-	MCL:	7	MCL:	70	MCL:	5	MCL:	5

Sample Location:

SED-11

Eastern Plume Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

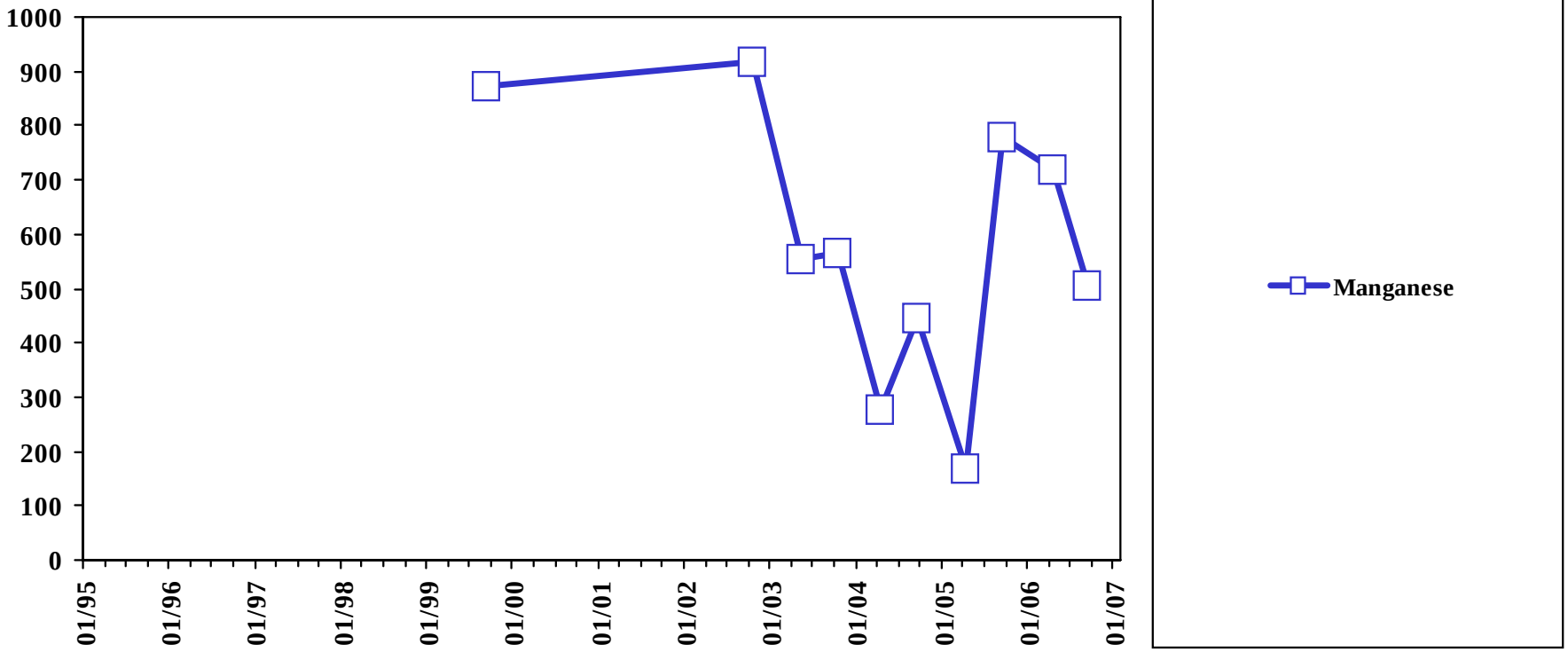
Sample concentration units: mg/Kg

Sample Location:

SED-11

Eastern Plume
Sediment

Chemicals of concern: Inorganics



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: mg/Kg

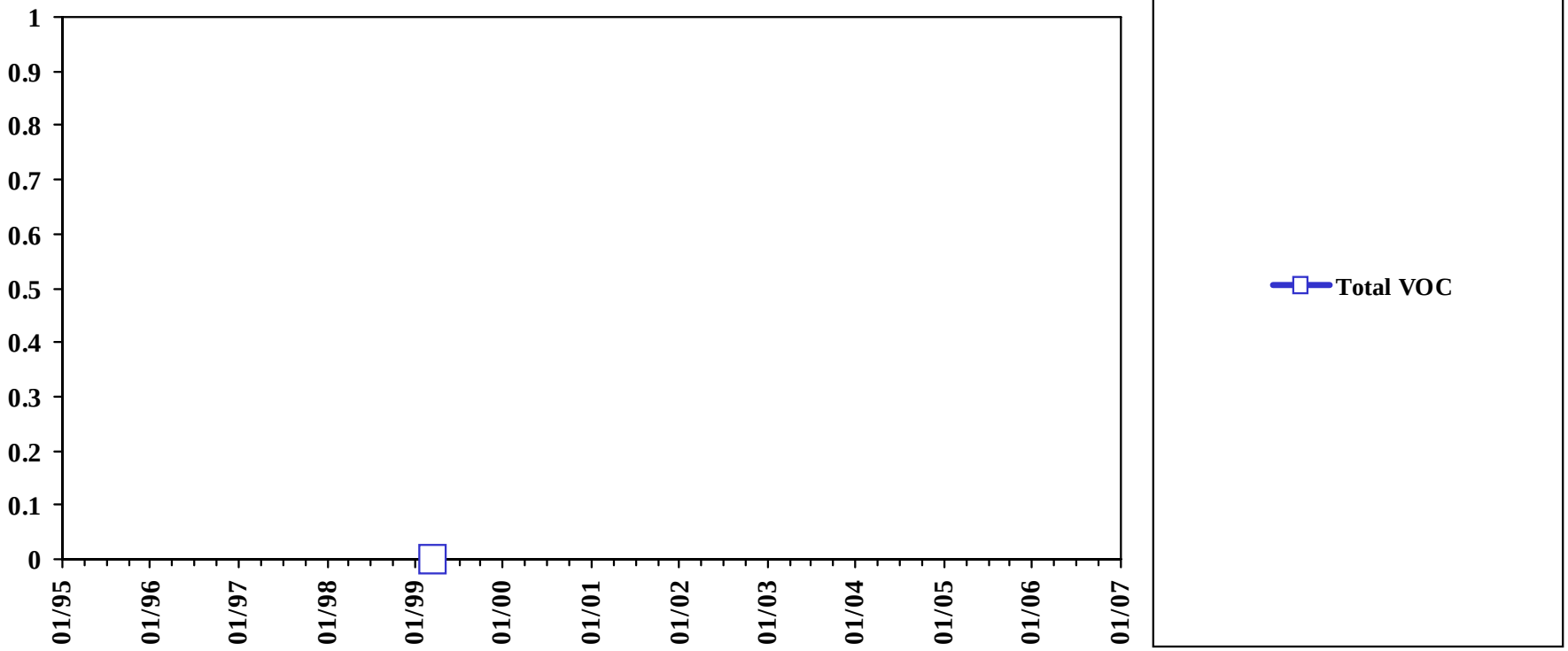
Sample Location:

SEEP-06

Eastern Plume

Leachate

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

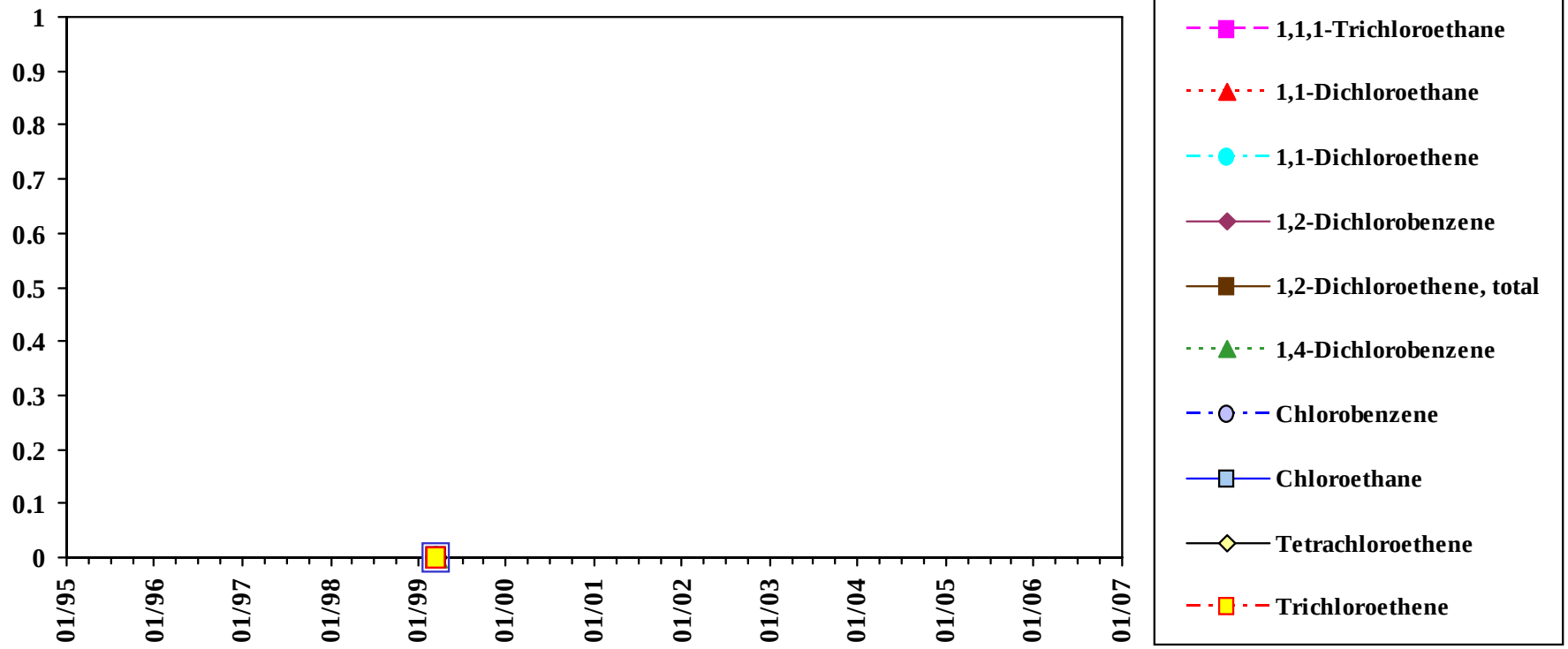
Sample Location:

SEEP-07

Eastern Plume

Leachate

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

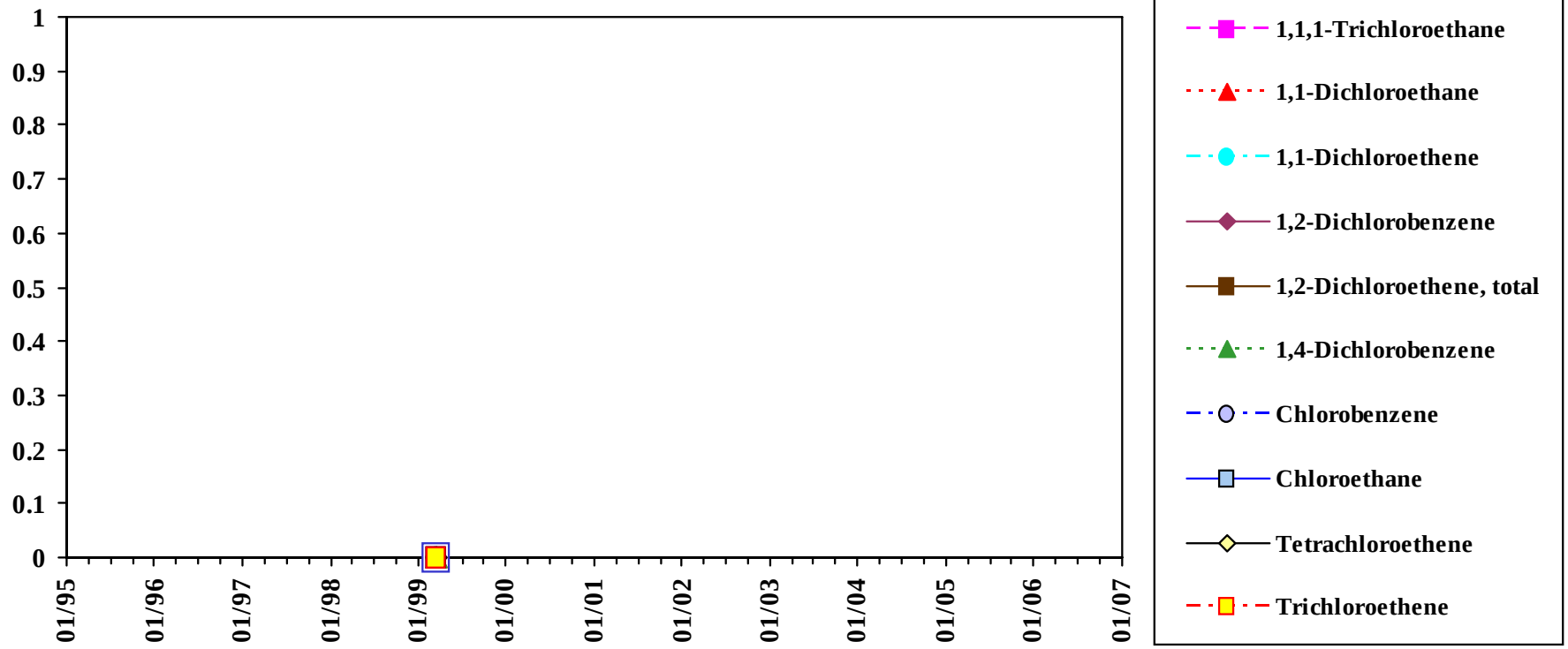
Sample Location:

SEEP-08

Eastern Plume

Leachate

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

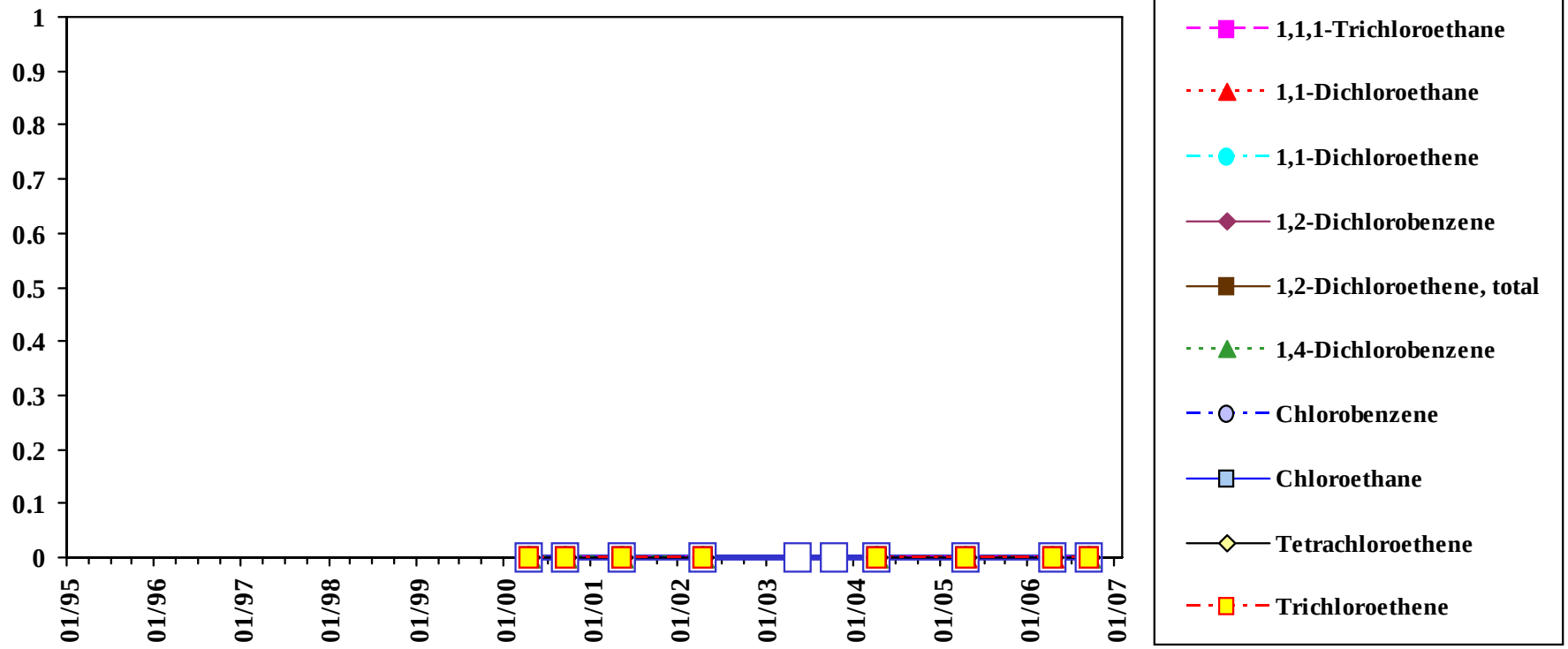
Sample Location:

SEEP-10

Eastern Plume

Leachate

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

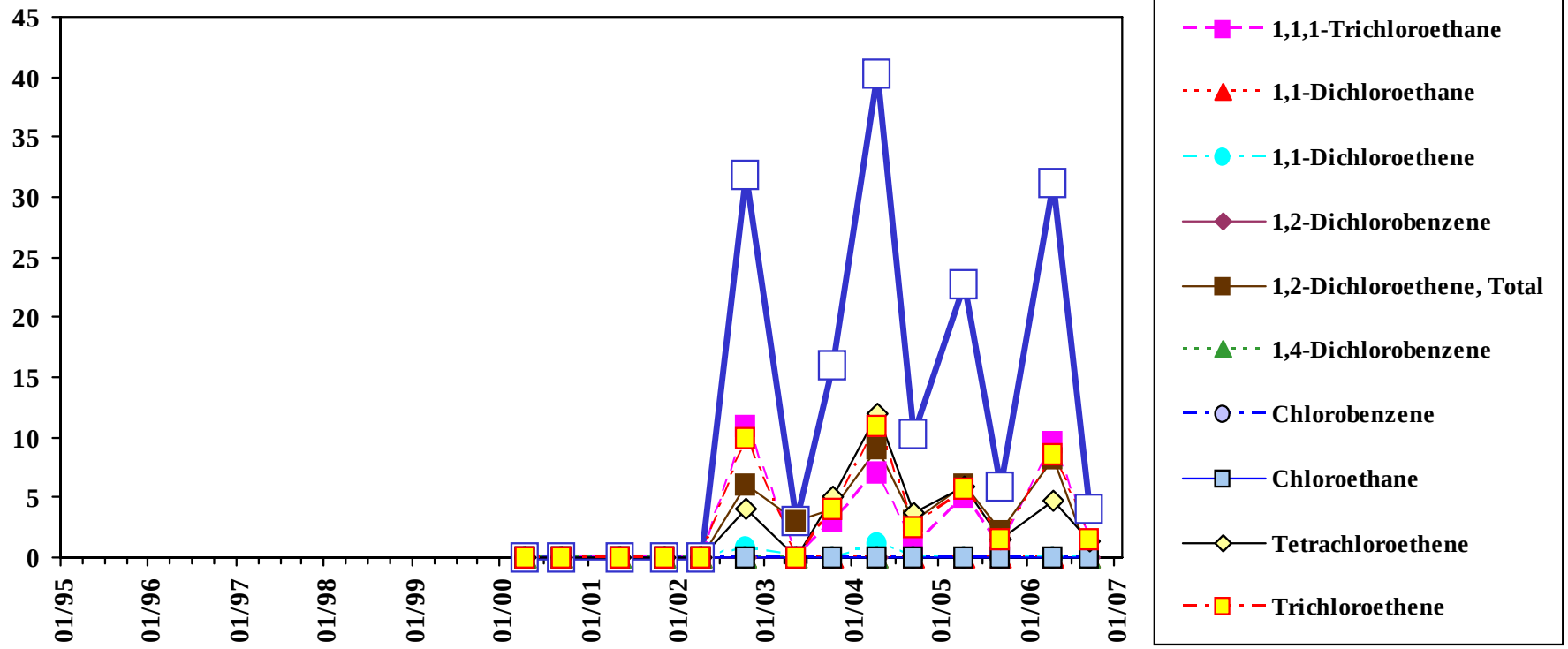
Sample Location:

SEEP-11

Eastern Plume

Leachate

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

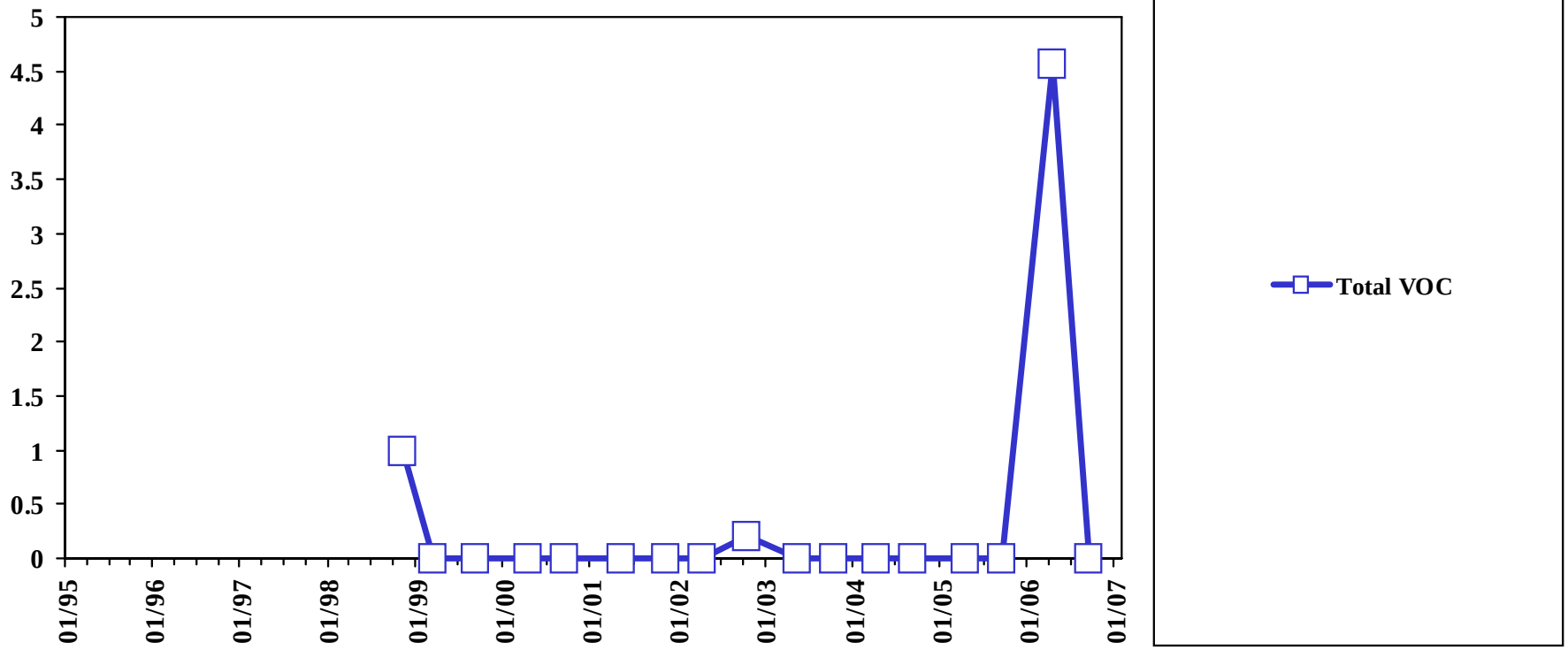
Sample Location:

SW-10

Eastern Plume

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

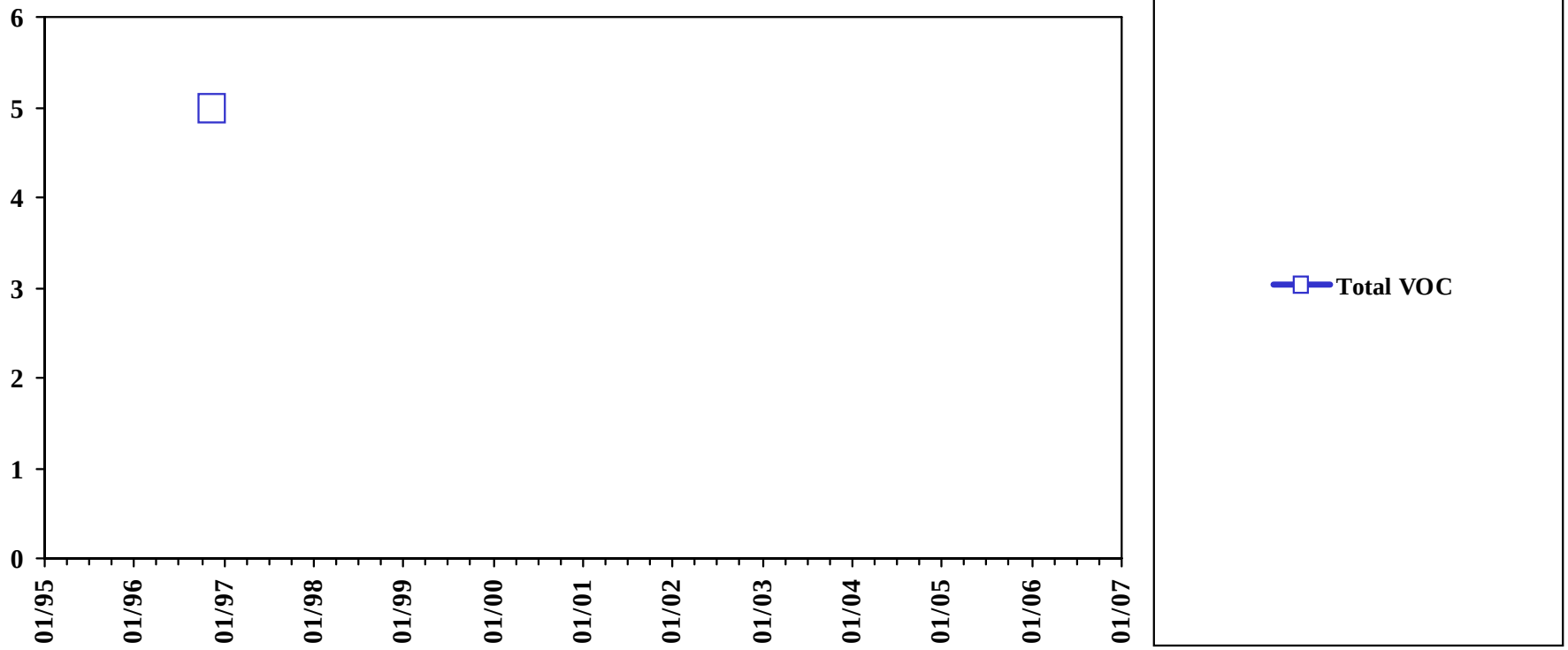
Sample Location:

SW-100

Eastern Plume

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

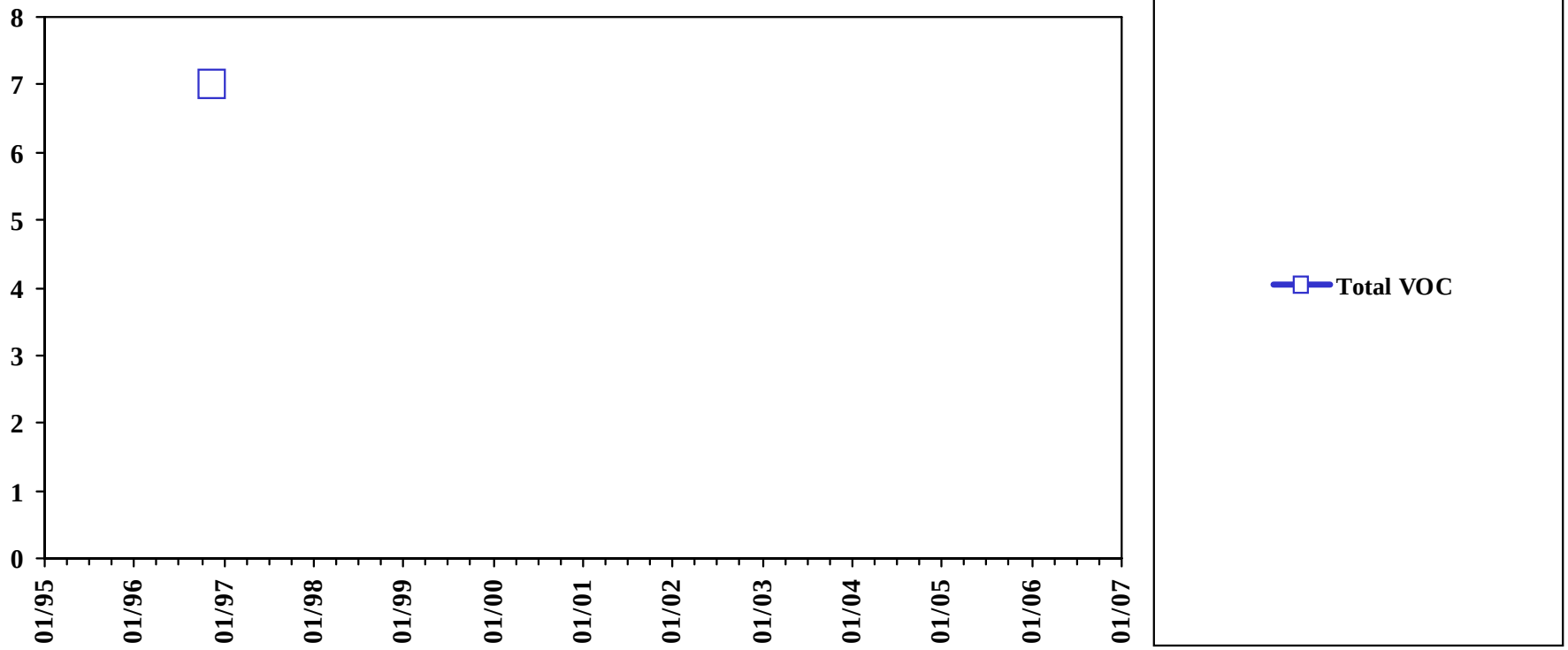
Sample Location:

SW-101

Eastern Plume

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

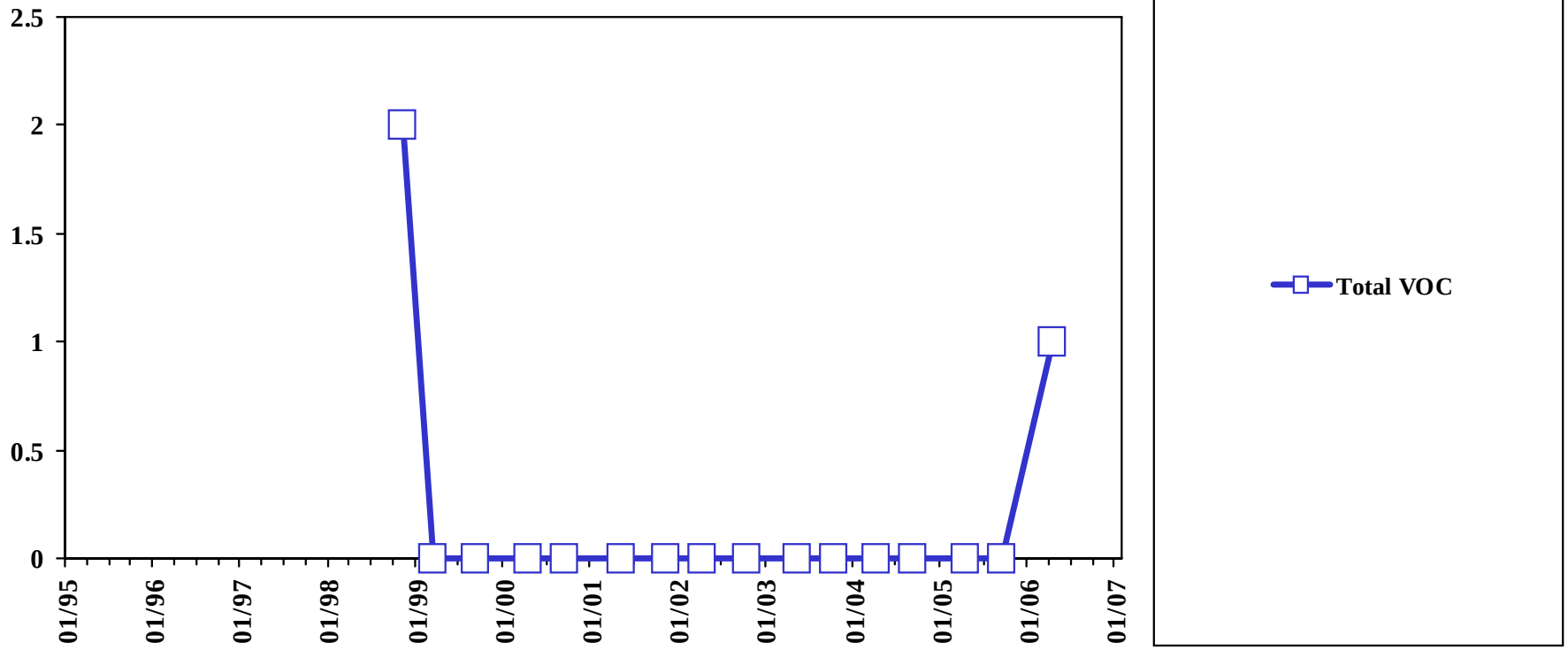
Sample Location:

SW-11

Eastern Plume

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

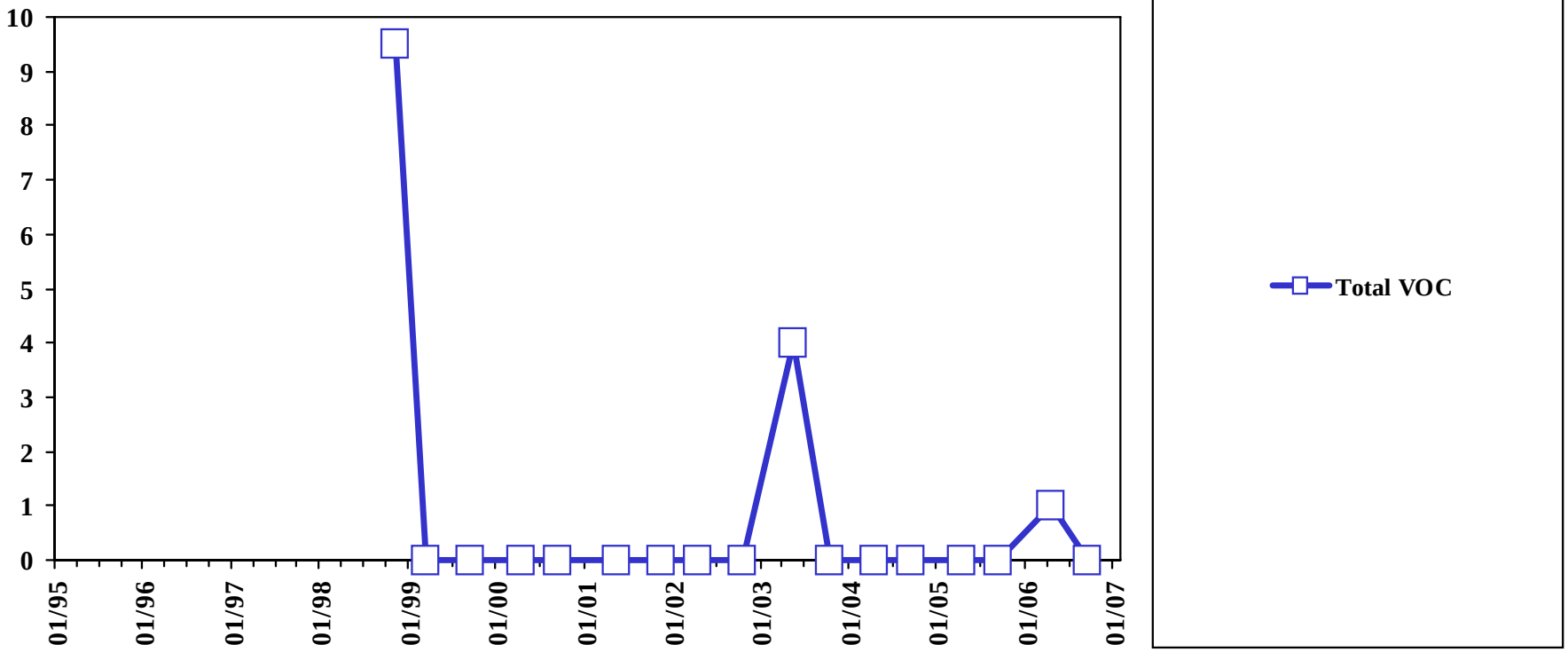
Sample Location:

SW-12

Eastern Plume

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

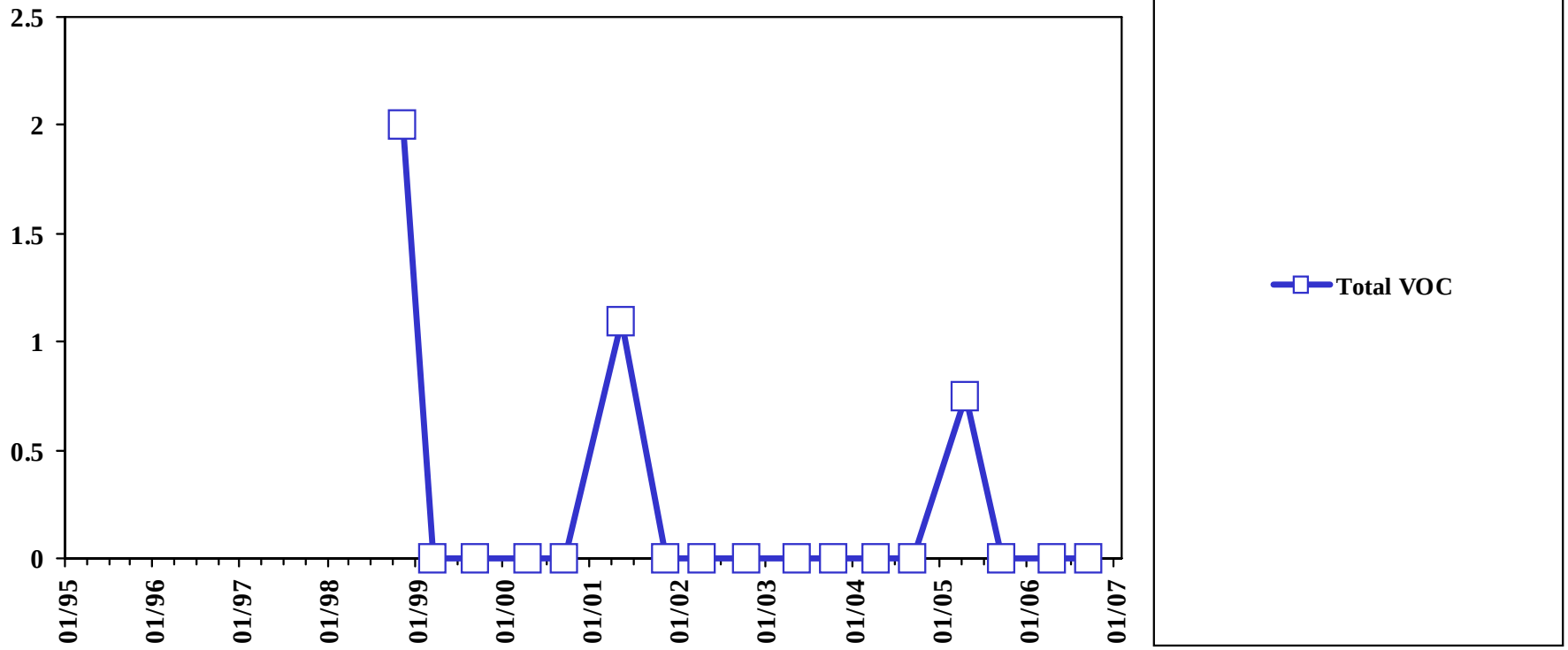
Sample Location:

SW-13

Eastern Plume

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

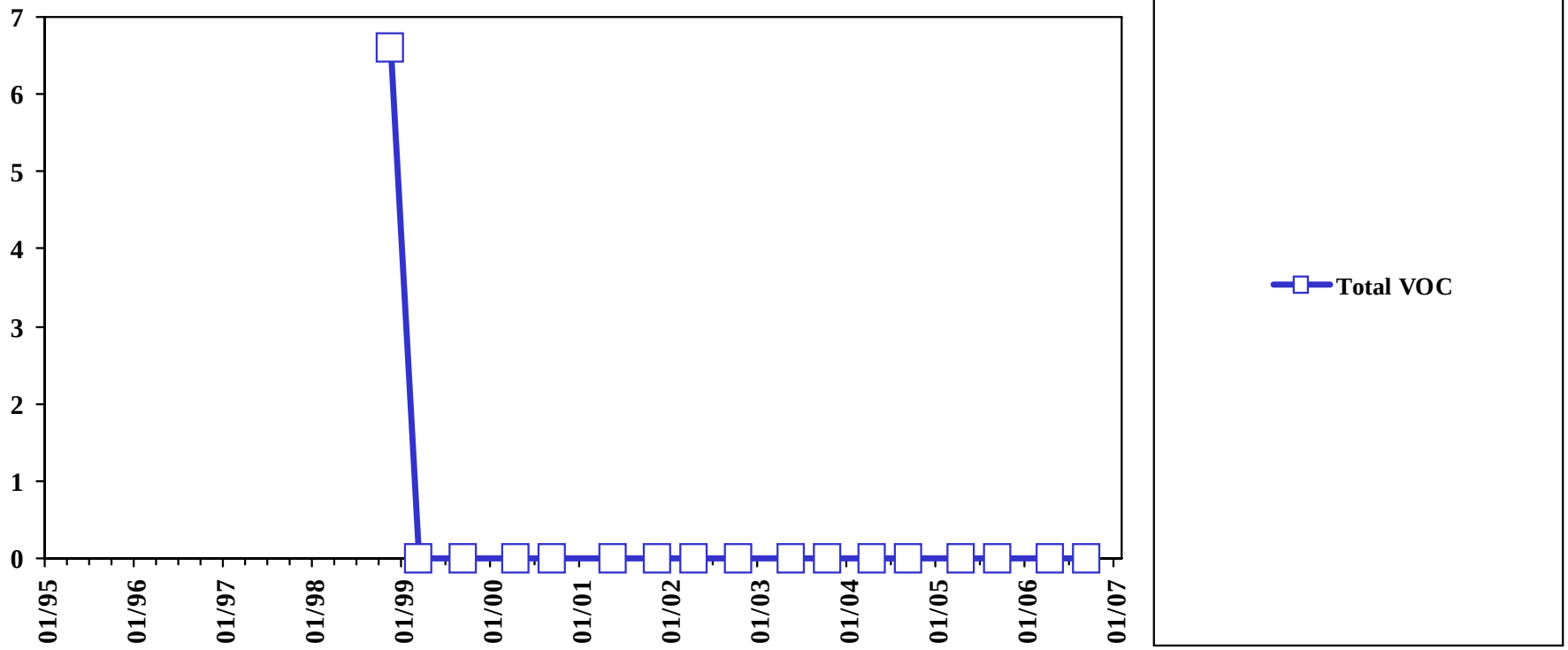
Sample Location:

SW-14

Eastern Plume

Surface water

Chemicals of concern: Volatiles



Analyte concentrations less than the sample detection limit are plotted as zero concentration on this chart.

Total VOC is the sum of all detected VOC except Methylene Chloride, Acetone, and 2-Butanone.

Sample concentration units: µg/L

APPENDIX D

Analytical Data Quality Review

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APPENDIX D

ANALYTICAL DATA QUALITY REVIEW
Sites 1, 3, and Eastern Plume
Monitoring Event 29

D.1 INTRODUCTION

This project utilized both field and analytical laboratory quality control measures to ensure that the data quality objectives presented in the Base-Wide Quality Assurance Project Plan QAPP) (ECC/EA 2006) were met.

For the combined analyses for these sites, the laboratory was provided with all field samples, which included the field quality control samples. Field sample duplicates and trip blanks were collected at the frequency required by the QAPP.

The samples were sent to Accutest Laboratories in Marlborough, Massachusetts which is NFESC and NELAC certified.

Analytical quality control was reviewed for compliance against the measurement performance criteria for precision and accuracy for each sample and analysis type, including field sample duplicates, as presented in the QAPP. Analytical precision for organics was based upon the relative percent difference (RPD) of the matrix spike/matrix spike duplicates (MS/MSD), and analytical precision for inorganics was based upon the laboratory replicate RPD. Accuracy for organics was based upon the reported spike recoveries for the laboratory control samples (LCS), MS/MSD, and surrogate system monitoring compound (SMC) recoveries (for organic analysis), and LCS and MS recoveries (for inorganic analysis).

The ability of the laboratory to extract organic compounds was confirmed by the recoveries of the surrogate spikes. MS/MSD and surrogate spike recoveries measure the effect of the sample matrix and extraction on organic sample preparation and measurement methodology. Post digestion spikes, matrix spikes, or serial dilutions are used to measure the effect of the inorganic sample matrix on preparation and measurement methodology. During the MS/MSD process, known quantities of target compounds are spiked into the sample matrix, and recoveries are used to measure potential bias due to matrix effects. The MS/MSD RPD or laboratory replicate RPD is used to determine analytical precision, and the field duplicate RPD is used to determine overall precision. The accuracy of the LCS spike recoveries is used in conjunction with MS/MSD when evaluating organic analyses.

Field completeness was quantified by reviewing the scheduled number of samples to the number of samples actually collected. Data completeness was quantified by determining the ratio of non-rejected analyte measurements to the total number of analyte measurements.

For clarity, the following terms are defined for use throughout this appendix:

- ***Method Detection Limit –*** The method detection limit (MDL) refers to the minimum concentration that can be measured and reported with 99 percent confidence that the analyte concentration is greater than zero. The method detection limits are summarized at the end of this report.

- ***Practical Quantitation Limit –*** The practical quantitation limit (PQL) is defined as the lowest concentration that can be reasonably achieved within specified units of precision and accuracy during routine laboratory operating conditions.

- ***Method Reporting Limit*** – The method reporting limit (MRL) is defined as the Project Quantitation Limit adjusted for any necessary sample dilutions, percent moisture, sample volume deviations, and/or extract/digestate volume deviations.

- ***Measurement Performance Criteria***—The measurement performance criteria (MPC) define the acceptable performance for the data quality indicators- accuracy and precision. The LTMP QAPP specifies the project MPC for LCS, surrogates, MS/MSD, and MS/MSD RPD quality control checks.

- ***Precision*** - Precision is evaluated by comparing the relative percent difference (RPD) of the MS/MSD or laboratory replicate sample pairs to the QAPP RPD limits. If the RPD is outside the measurement performance criteria, the positive detect or non-detect is qualified for the affected compound in the unspiked sample (U.S. EPA 1996)1. The overall precision is determined by comparing the field duplicate RPD to the QAPP RPD limits.

- ***Accuracy***-- Accuracy is evaluated by comparing MS/MSD recoveries, surrogate spike recoveries, and LCS recoveries to QAPP MPC.

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1 U.S. Environmental Protection Agency, Region I-New England, "Region 1, EPA-New England Data Validation Functional Guidelines for Evaluating Environmental Analyses," (July, 1996; Revised Dec, 1996).

- ***J*** – Data qualifier indicating that the analyte was positively identified; however, the concentration is approximate.

- ***UJ*** - Data qualifier indicating that the analyte was not detected above the MRL, and the reporting limit is approximate.

- ***U*** - The parameter was analyzed, but was not detected above the sample MDL.

- ***R*** - The sample result was rejected due to serious deficiencies. The presence or absence of the analyte cannot be verified.

D.2 LABORATORY ANALYTICAL QUALITY CONTROL PROGRAM

Aqueous samples collected from the monitoring wells, extraction wells, leachate station seeps, influent, effluent, piezometers, and surface waters were analyzed for the following LTMP parameters:

- LTMP Target Compound List (TCL) volatile organic compounds (VOCs) by EPA SW-846 Method 8260B,
- 1,4-Dioxane by EPA SOP-VOADIOX1
- LTMP Target Analyte List (TAL) Metals by EPA SW-846 6010B/7000 Methods
- Pesticides by EPA SW-846 Method 8081A,

The soil samples collected were analyzed for LTMP (2000a EA) parameters:
- LTMP TCL VOCs by EPA SW-846 Method 8260B,
- LTMP TAL Metals by EPA SW-846 6010B/7000 Methods,
- Pesticides by EPA SW-846 Method 8081A,

The quality control measures specified in the EPA SW-846 methodology (MS/MSD, surrogates, and LCS), as well as those in the QAPP, were performed at the proper frequency by the laboratory and established proper analytical quality control. The range of results for the accuracy and precision data quality objectives are discussed in the subsections below.

D.2.1 LABORATORY ACCURACY EVALUATION

Procedures for accuracy assessment are summarized in this section.

D.2.1.1 Evaluating Matrix Spike/Matrix Spike Duplicate Recoveries for Accuracy

Generally, no action is taken based on the MS/MSD recoveries alone to qualify an entire sample delivery group. The qualification is limited to the unspiked parent sample. However, professional judgment may be used to qualify samples across a particular sample delivery group (i.e., all associated samples). Standard procedures for qualifying field sample results for MS/MSD recoveries are summarized below.

- If the spike recovery is greater than the upper control limit (UCL), then the detects are estimated (J) and the non-detects are not impacted for the affected compounds in the unspiked sample.
- If the spike recovery is greater than or equal to 10 percent, but less than the lower control limit (LCL), then the detects are estimated (J) and the non-detects are estimated (UJ) for the affected compounds in the unspiked sample.
- If the spike recovery is less than 10 percent, then the detects are estimated (J) and the non-detects are rejected (R) for the affected compounds in the unspiked sample.

D.2.1.2 Evaluating Surrogate Recoveries for Accuracy

Procedures for qualifying field sample results for surrogate recoveries are summarized below. Surrogate recovery assessments are sample-specific.

- If the surrogate recovery is greater than the UCL, all detects are estimated (J) and the non-detects are not affected (U.S. EPA 1996).
- If the surrogate recovery is greater than or equal to 10 percent, but less than the LCL, then all detects are estimated (J) and all non-detects are estimated (UJ).
- If the surrogate recovery is less than 10 percent, then the detects are estimated (J) and all non-detects are rejected (R).

D.2.1.3 Evaluating Laboratory Control Sample Recoveries for Accuracy

Procedures for qualifying field samples for LCS recoveries are summarized below. LCS assessments are generally applied to an entire sample batch.

- If the LCS recovery is greater than the UCL, the detects are estimated (J) and the non-detects are not affected (U.S. EPA 1996).
- If the LCS recovery is greater than or equal to 10 percent, but less than the LCL, the detects are estimated (J) and the non-detects are estimated (UJ).
- If the LCS recovery is less than 10 percent, the detects are estimated (J) and the non-detects are rejected (R).

D.2.1.4 Evaluating Laboratory Method Blanks for Accuracy

Procedures for qualifying field samples for method blank results are summarized below. Method blank assessments are generally applied to an entire sample batch.

- Method blank results should not have any analyte detections greater than the MRL.
- Analytes detected in field samples are evaluated at a five or ten times (for common laboratory cross-contaminants) the detections of those analytes in the associated method blank.
- Field samples associated with the method blank, which have detected analyte levels less than five or ten times (for common laboratory cross-contaminants) the corresponding analyte level in the method blank, are qualified as non-detect (U) for that analyte.
- Field samples associated with the method blank, which have detected analyte levels greater than five or ten times (for common laboratory cross-contaminants) the corresponding analyte level in the method blank, are not qualified.

D.2.2 LABORATORY ACCURACY ASSESSMENT

Project-specific assessment of laboratory accuracy is detailed in this section.

D.2.2.1 LTMP Volatile Organic Compounds, 1,4-Dioxane, Target Compound List Pesticides

Accuracy assessments for organic analyses are detailed in this section.

D.2.2.1.1 Surrogates

All surrogate recoveries for all methods were acceptable for all matrices, except as noted in this section.

<u>VOCs</u>
Four surrogates were used for VOC analyses. QAPP surrogate dibromofluoromethane was not spiked; however, the surrogates used were adequate for assessing sample-specific method accuracy. The surrogate control limits for data assessment were the limits identified in the QAPP.

The recovery for surrogate dibromofluoromethane was outside the QAPP limits for all six leachate sediment analyses, LT-1, LT-3, LT-4, LT-5, LT-9, & LT-9-duplicate. The samples were reanalyzed with similar results. All results for these samples were qualified (J for detects and UJ for nondetects). The validation work-sheet also noted that there were internal standard outlier recoveries for these samples.

The recovery for surrogate dibromofluoromethane for leachate seep sample from SEEP-9 was slightly outside the laboratory limits but within the QAPP limits. No qualifications were required.

1,4-Dioxane

One surrogate was used for1,4-dioxane analyses. The surrogate recoveries were acceptable for all samples, except MW-331, P106, and P106-duplicate. These three samples were reanalyzed with similar results, and 1,4-dioxane was qualified (J) in all three samples.

D.2.2.1.2 MS/MSD

All MS/MSD recoveries for all methods and matrices were acceptable, except as noted in this section.

VOCs

Twelve VOC MS/MSDs were analyzed using parent samples LT-9, MW-224, MW-331-M, MW-1302S, SW-4, SW-13, SEEP-9, SEEP-11, COMB EFFLUENT, M59052-6, M59133-1, and M59443-9.

Recoveries were high for acetone, 2-butanone, carbon tetrachloride, methylene chloride, and 1,1,2,2-tetrachloroethane in the MS/MSD performed on leachate sediment LT-9. The recovery for 1,2-dichlorobenzene was low in the MS only. The aforementioned compounds were qualified (J for detects and UJ) for nondetects in sample LT-9.

Carbon tetrachloride was recovered high in the MS/MSD performed on MW-224. No qualifications were required because carbon tetrachloride was non-detect in the parent sample.

Acetone, carbon tetrachloride, chloroethane, chloroform, chloromethane, 1,1-dichloroethene, total 1,2-dihloroethene, methylene chloride, 1,1,1-trichloroethane, vinyl chloride, and total xylenes were recovered high in the MS/MSD performed on SEEP-11. 1,1,1-Trichloroethane was qualified (J) in SEEP-11 and SEEP-11 Duplicate. Methylene chloride was qualified (J) in MW-339-D. The other outlier compounds were non-detect in these samples and did not require qualification.

Carbon tetrachloride was recovered high in the MS/MSD analysis performed on SW-13. No qualifications were required because carbon tetrachloride was non-detect in the parent.

Acetone was recovered high and, ethyl benzene, and total xylenes were recovered low in the MS/MSD performed on M59052-6 , which was associated with MW-339 & MW-338C-M. Ethyl benzene and total xylene were qualified (UJ) in MW-339 and MW-338C-M. Acetone was non-detect in these samples and did not require qualification.

Styrene was recovered low in the MS/MSD performed on SEEP-9; therefore, styrene was qualified (UJ) in the parent sample.

1,4-Dioxane
Three MS/MSDs were analyzed for 1,4-dioxane using parent samples COMB EFFLUENT, MW-212, and MW-313. The 1,4-dioxane recovery was high in the MS/MSD performed on groundwater sample MW-313, and 1,4-dioxane qualified (J) in this sample.

TCL Pesticides
Four MS/MSDs were analyzed for pesticides using parent samples SEEP-9 duplicate, SED-19, SED-11, and SED 19.

4,4-DDD, 4,4-DDE, and 4,4-DDT were recovered outside QC limits in the MS/MSD performed on site sample SEEP-9. The three outlier compounds were qualified (J) in SEEP-9 and SEEP-9 duplicate.

4,4-DDE, 4,4-DDT, endrin aldehyde, and methoxychlor were recovered high in the MS/MSD performed on sample SED-11. 4,4'-DDE and 4,4'-DDT were qualified (J) in sample BN-EP-29-SED-XD1 (field duplicate of SED-11). 4,4'-DDE and 4,4'-DDT were non-detect in SED-11 (parent sample), so no qualifications were applied to the parent sample.

D.2.2.1.3 LCS

LCS/LCSD pairs were analyzed at an appropriate rate for all methods and matrices. LCS/LCSD recoveries acceptable, except as noted in this section.

VOCs
Two of the LSC/LSCD pairs associated with the samples for Site 1,3, and the Eastern Plume had outlier recoveries. One had a high recovery for bromoform. The other had high recoveries for bromodichloromethane, carbon tetrachloride, 1,2-dichloroethane, 1,2-dichloropropane, 4-methyl-2-pentanone (MIBK), and 1,1,2,2-tetrachloroethane. No qualifications were required because these compounds were not detected in the associated site samples.

D.2.2.1.4 Method Blank

All method blanks for all methods and matrices were non-detect for target analytes, except as noted in this section.

VOCs
Method blanks were analyzed with each batch of samples. Methylene chloride was detected in one method blank, which resulted in a non-detect (U) qualifier for the compound in samples LT-3 and LT-9.

D.2.2.3 LTMP Target Analyte List Metals

Accuracy assessment for target analyte list metals is detailed in this section.

D.2.2.3.1 Matrix Spike and Matrix Spike Duplicate

Eight TAL metals MS analyses were associated with Sites 1, 3, and the Eastern Plume during the 29th monitoring event. MS recoveries were acceptable, except as noted in this section.

One MS associated with samples from Sites 1,3 and the Eastern Plum had a high recovery for mercury but no qualifications were required because mercury was not detected in the associated parent sample.

The MS analysis performed on sample SED-19, had low recoveries for aluminum and manganese and high recoveries for barium and iron. The detected concentrations of aluminum, iron, and manganese in the parent sample were >4X the MS spike, so no qualifications were required for these three analytes. Barium was qualified (J) in all six associated samples, SED-15, SED-16, SED-17, SED-18, SED-19, and SED-19 duplicate.

The MS analysis performed on sample SED-11 had a low recovery for antimony and high recoveries for aluminum, iron, and manganese. Antimony was qualified (UJ) in SED-11 and SED-11 duplicate. No qualifications were required for aluminum, iron, and manganese because the parent sample concentrations were >4X the spike values.

The MS analysis performed on sample LT-9, had outlier recoveries for aluminum, antimony, arsenic, iron, manganese, selenium, and silver. No qualifications were required for aluminum, arsenic, iron, and manganese. Antimony, selenium, and silver were qualified (J for detects and UJ for nondetects) in LT-1, LT-3, LT-4, LT-5, LT-9, and LT-9 duplicate.

The MS analyses performed on sample SEEP-9 had outlier recoveries for aluminum, iron, manganese, and vanadium. The detected concentrations of aluminum, iron, and manganese were >4x the spike amount; therefore, no qualifications were required for these analytes. Vanadium was qualified (J) in the parent sample, SEEP-9.

D.2.2.3.2 LCS

The LCS samples were analyzed at the correct frequency and the accuracy limits used to evaluate the data were taken from the QAPP. The LCS recoveries in all TAL-Metals SDGs were acceptable. No qualifications were required.

D.2.2.3.3 Method/Preparation Blanks

The method/preparation blanks associated with all SDGs were non-detect for all TAL metals.

D.2.3 LABORATORY PRECISION EVALUATION

Procedures for precision assessment are summarized in this section

D.2.3.1 Evaluating Matrix Spike/Matrix Spike Duplicate Relative Percent Differences for Laboratory Precision

Generally, no action is taken based on the MS/MSD RPDs alone to qualify an entire sample delivery group. The qualification is limited to the unspiked parent sample. However, professional judgment may be used to qualify samples across a particular sample delivery group (i.e., all associated samples).

If the MS/MSD RPD is greater than 30%, the result for the outlier compound is qualified as estimated (J for detects and UJ for non-detects) in the native sample.

D.2.3.2 Evaluating Laboratory Replicate Relative Percent Differences for Laboratory Precision

If the laboratory replicate RPD is greater than 20% and if the analyte concentration is greater than the MRL, then sample results are qualified (J for detects and UJ for non-detects). Laboratory replicates are generally analyzed for inorganic analyses.

D.2.4 LABORATORY PRECISION ASSESSMENT

Project-specific assessment of precision is detailed in this section.

D.2.4.1 LTMP Volatile Organic Compounds, 1,4-Dioxane, Target Compound List Pesticides

Precision assessments for organic analyses are detailed in this section.

D.2.4.1.1 MS/MSD RPDs

All MS/MSD RPDs for all methods for all matrices were acceptable, except as noted in this section.

<u>TCL Pesticides</u>
The MS/MSD performed using sample SEEP-9 had RPD values for 4,4-DDD, 4,4-DDE, and 4,4-DDT. All three compounds were qualified (J) in SEEP-9 and SEEP-XD1 (field duplicate for SEEP-9).

The MS/MSD performed using QA sample BN-EP-29-QS1 had outlier RPD values for all pesticide compounds. All pesticide compounds were qualified (UJ – all were non-detect) in sample BN-EP-29-QS1.

D.2.4.2 LTMP Target Analyte List Metals

Precision assessment for TAL metals is detailed in this section.

D.2.4.2.1 MS/MSD RPDs

All MS/MSD RPDs were acceptable, except as noted in this section.

The MS/MSD performed using sample SED-11/SED-XD1 had outlier recoveries for selenium and thallium. Selenium was qualified (J) and thallium was qualified (UJ) in this sample.

D.3 FIELD SAMPLING PROGRAM QUALITY PROGRAM

Field duplicates are collected and analyzed for the same parameters as the primary environmental samples to determine field sampling precision.

D.3.1 FIELD PRECISION EVALUATION

Procedures for assessment of field precision are summarized in this section.

D.3.1.1 Evaluating Field Duplicate Results for Precision

Field duplicates are collected during the sampling programs for monitoring well/groundwater, leachate seep sediment, surface water, and leachate seep areas, as appropriate. The sample locations of the field duplicate samples are not identified to the laboratory. Field duplicate results are used to evaluate the overall precision of both the field and laboratory. EPA Region 1 criteria are used to evaluate the field duplicate results. Field duplicate assessments are generally applied only to the field duplicate and primary field sample; however, professional judgment may be used to qualify samples across a particular sample delivery group.

Procedures for qualifying field samples for field duplicate results are summarized below.

- Field sample and field duplicate sample results greater than twice the MRL are evaluated and the RPDs are calculated.
- A detect greater than the MRL in one but non-detect in another sample of the field duplicate pair are qualified as estimated (J for detects and UJ for non-detects).
- The overall precision is evaluated as being acceptable if less than 30 percent for aqueous sample and 50 percent for solids.

D.3.2 FIELD PRECISION ASSESSMENT

Field precision assessment for volatile, pesticides, and metals analyses is detailed in this section. Field duplicate criteria are 30% for aqueous samples and 50% for solids.

D.3.2.1 Field Duplicates

Fourteen field samples and corresponding field duplicate samples, listed in the table below, were collected during the 29th monitoring event.

Field Duplicate Location	Site Sample ID	Duplicate Sample ID		Analyses
MW-224	BN-EP-29-MW224	BN-EP-29-MW-XD1[a]	EP	VOCs
MW-1302S	BN-1&3-29-MW1302S	BN-1&3-29-MW-XD1	1 & 3	VOCs, Metals
MW-311	BN-EP-MW311-D	BN-EP-29-MW-XD2	EP	VOCs
MW-319	BN-EP-MW319-M	BN-EP-29-MW-XD4[b]	EP	VOCs
SEEP-9	BN-1&3-29-SEEP9	BN-1&3-29-SEEP-XD1	1 & 3	VOCs, Metals, Pesticides
SEEP-11	BN-EP-29-SEEP11	BN-EP-29-SEEP-XD1	EP	VOCs
SW-4	BN-1&3-29-SW4	BN-1&3-29-SW-XD1	1 & 3	VOCs, Metals
SW-13	BN-EP-29-SW13	BN-EP-29-SW-XD1	EP	VOCs
LT-9	BN-1&3-29-LT9	BN-1&3-29-LT-XD1	1 & 3	VOCs, Metals
SED-11	BN-EP-29-SED11	BN-EP-29-SED-XD1	EP	Metals. Pesticides
SED-19	BN-1&3-29-SED-19	BN-1&3-29-SED-XD1	1 & 3	Metals, Pesticides
COMB EFFLUENT	BN-EP-29-COMB EFFLUENT	BN-EP-29-EFFLUENT-XD1	EP	VOCs, 1,4-Dioxane
MW-313	BN-EP-29-MW313	BN-EP-29-MW313-XD1	EP	1,4-Dioxane
P106	BN-EP-29-P106	BN-EP-29-MW-XD5	EP	VOCs, 1,4-Dioxane

D.3.2.1.1 Field Duplicate RPDs

<u>Aqueous Samples</u>
The aqueous field duplicates were considered to be in agreement and field precision was acceptable with the following exceptions:

- Total 1,2-dichloroethene in MW-224 and duplicate, which was qualified (J).
- Iron, 4,4-DDT, 4,4-DDD, barium, thallium, arsenic, lead, antimony, aluminum, magnesium, nickel, potassium, silver, sodium, cadmium, and copper in SEEP-9 and duplicate, which were qualified (J).
- Antimony in SW-4 and duplicate, which was qualified (J).

Sediment Samples
The sediment field duplicates were considered to be in agreement and field precision was acceptable with the following exceptions:

- Mercury in SED-11 and duplicate, which was qualified (J).
- Iron, aluminum, lead, magnesium, nickel, thallium, arsenic, cobalt, copper, zinc, calcium, mercury, 1,4-dichlorobenzene, carbon disulfide, and 1,2-dichlorobenzene in LT-9 and duplicate, which were qualified (J).
- Chromium and selenium in SED-19 and duplicate, which were qualified (J).

Tables D-1 (aqueous) and D-2 (sediments), provided at the end of this appendix, list the field duplicate results and RPDs. Only detects are listed and field duplicate pairs that were non-detect for all analytes are not listed.

D.3.3 FIELD ACCURACY EVALUATION

Procedures for assessment of field accuracy are detailed in this section.

D.3.3.1 Evaluating Rinsate Blanks for Field Accuracy

Procedures for qualifying field samples for rinsate blank results are summarized below. Equipment blank qualifications are specific to the samples for which a rinsate blank is considered representative. Analysis of a rinsate blank collected from non-dedicated and/or non-disposable equipment is used to evaluate potential field cross contamination.

- Rinsate blank results should not have any analyte detections greater than the MRL.
- Analytes detected in field samples are evaluated at five or ten times (for common laboratory cross-contaminants) the detections of those analytes the associated rinsate blank.
- Field samples associated with the rinsate blank, which have detected analyte levels less than five or ten times (for common laboratory cross-contaminants) the corresponding analyte level in the rinsate blank, are qualified as non-detect (U) for that analyte.
- Field samples associated with the rinsate blank, which have detected analyte levels greater than five or ten times (for common laboratory cross-contaminants) the corresponding analyte level in the rinsate blank, are not qualified.

D.3.3.2 Evaluating Trip Blanks for Field Accuracy

Procedures for qualifying field samples for trip blank results are summarized below. Trip blank qualifications are specific to the samples for which a trip blank is considered representative. VOC analysis of a trip blank shipped with sample shipment coolers containing VOC samples is performed to assess any VOC contamination introduced during sample handling and shipping.

- Trip blank results should not have any analyte detections greater than the MRL.
- Compounds detected in VOC field samples are evaluated at a five or ten times (for common lab cross contaminants) the detections in the associated trip blank.
- VOC field samples associated with the trip blank, which have detected compound levels less than five or ten times (for common lab cross contaminants) the corresponding level in the trip blank, are qualified as non-detect (U) that compound.
- VOC field samples associated with the trip blank, which have detected compound levels greater than five or ten times (for common lab cross contaminants) the corresponding level in the trip blank, are not qualified.

D.3.4 FIELD ACCURACY ASSESSMENT.

Project-specific assessment of field accuracy is detailed in this section.

D.3.4.1.1 Rinsate Blanks

One rinsate blank was collected for this event and was non-detect for all analytes.

D.3.4.1.2 Trip Blanks

Trip blanks were non-detect for all VOCs except as noted in this section.

Ethylbenzene, toluene, total xylene, acetone, benzene, and methylene chloride were detected in trip blank BN-EP-29-MW-QT1. Ethylbenzene and total xylene were qualified (U) in Comb Effluent, methylene chloride was qualified (U) in MW-339-D, and acetone was qualified (U) in SEEP-10, MW-388B-M, MW-338A-S, MW-339-D, and MW-388C-M.

Trip blank BN-EP-29-QT2 had one detect for acetone; no qualifications were required because acetone was non-detect in the associated samples. Trip blank BN-EP-29-QT3 had one detect for chlorobenzene; no qualifications were required, because chlorobenzene was non-detect in the associated samples.

D.4 OVERALL EVALUATION OF DATA AND USABILITY RECOMMENDATION

The following is a summary table of the findings for the data quality review performed and discussed in detail in this appendix:

Data Quality Review		Holding Time	Field/Method	Precision		Accuracy			Completeness	
			Blank Contamination	Laboratory	Field	Surrogate	MS/MSD	LCS	Analytical	Field
Aqueous	VOCs	√	U	√	J	√	J/UJ	√	100%	100%
	1,4-Dioxane	√	√	√	√	J	J	√	100%	100%
	Metals	√	√	√	J	N/A	J/UJ	√	100%	100%
	Pesticides	√	√	J/UJ	J	√	J	√	100%	100%
Sediment	VOCs	√	√	√	J	J/UJ	J/UJ	√	100%	100%
	Metals	√	√	J/UJ	J	N/A	J/UJ	√	100%	100%
	Pesticides	√	√	√	√	√	J	√	100%	100%

Note:	
VOC =	Volatile Organic Compound.
√ =	The data are usable as reported based on the data quality review of this quality measurement.
B =	The data have been affected by field blank/laboratory contamination; false-positives may exist.
UJ =	The analyte was not detected above the sample reporting limit, and the reporting limit is approximate
J =	The data are usable; however, some analyte concentrations should be considered estimates of the true concentrations.
R =	Some of the analytes are considered unusable due to quality control criteria.
N/A =	The quality measurement does not apply to this matrix or analytical methodology.

Field samples collected and analyzed as part of Sites 1&3 and Eastern Plume Monitoring Event 29 were validated and found to meet the data quality objectives established in the QAPP for data usability.

D.5 COMPLETENESS

The planned field samples and corresponding quality control samples (duplicate) were collected, resulting in a percent field completeness of 100 percent.

VOCs, metals, pesticides, and 1,4-dioxane were reviewed for method and QAPP compliance, and the data were determined to meet completeness requirements. No data were rejected for this sampling event; therefore, analytical completeness for these field samples is 100 percent.

D.6 METHOD DETECTION LIMITS

The following table provides the MDLs for aqueous and sediment samples. The MDL represents the minimum concentration of a substance that can be measured and reported with 99 percent confidence that the analyte concentration is greater than zero.

Values were compared to the Maximum Exposure Guidelines [2i] (MEGs) for the State of Maine by the validator, and the MDLs for these compounds are less than the MEGs

Analytical Method	Matrix	Analyte	MDL	Units
Metals 6010B - Aqueous				
SW8466010B	Aqueous	Aluminum	0.0196	mg/L
SW8466010B	Aqueous	Arsenic	0.0007158	mg/L
SW8466010B	Aqueous	Barium	0.0015	mg/L
SW8466010B	Aqueous	Beryllium	0.0015	mg/L
SW8466010B	Aqueous	Cadmium	0.0015	mg/L
SW8466010B	Aqueous	Calcium	0.153	mg/L
SW8466010B	Aqueous	Chromium	0.0012	mg/L
SW8466010B	Aqueous	Cobalt	0.0036	mg/L
SW8466010B	Aqueous	Copper	0.0015	mg/L
SW8466010B	Aqueous	Iron	0.0157	mg/L
SW8466010B	Aqueous	Lead	0.0005564	mg/L
SW8466010B	Aqueous	Magnesium	0.0902	mg/L
SW8466010B	Aqueous	Manganese	0.0103	mg/L
SW8466010B	Aqueous	Nickel	0.0015	mg/L
SW8466010B	Aqueous	Potassium	0.0584	mg/L
SW8466010B	Aqueous	Silver	0.0012	mg/L
SW8466010B	Aqueous	Sodium	0.2769	mg/L
SW8466010B	Aqueous	Vanadium	0.0034	mg/L
SW8466010B	Aqueous	Zinc	0.0081	mg/L
Metals 6010B - Solids				
SW8466010B	Dry	Aluminum	0.0196	mg/kg
SW8466010B	Dry	Antimony	0.0018	mg/kg
SW8466010B	Dry	Arsenic	0.0007158	mg/kg
SW8466010B	Dry	Barium	0.0015	mg/kg
SW8466010B	Dry	Beryllium	0.0015	mg/kg
SW8466010B	Dry	Cadmium	0.0015	mg/kg
SW8466010B	Dry	Calcium	0.153	mg/kg
SW8466010B	Dry	Chromium	0.0012	mg/kg
SW8466010B	Dry	Cobalt	0.0036	mg/kg
SW8466010B	Dry	Copper	0.0015	mg/kg

Analytical Method	Matrix	Analyte	MDL	Units
SW8466010B	Dry	Iron	0.0157	mg/kg
SW8466010B	Dry	Lead	0.0012	mg/kg
SW8466010B	Dry	Magnesium	0.0902	mg/kg
SW8466010B	Dry	Manganese	0.0103	mg/kg
SW8466010B	Dry	Nickel	0.0015	mg/kg
SW8466010B	Dry	Potassium	0.0584	mg/kg
SW8466010B	Dry	Selenium	0.26	mg/kg
SW8466010B	Dry	Silver	0.0012	mg/kg
SW8466010B	Dry	Sodium	0.2769	mg/kg
SW8466010B	Dry	Thallium	0.01	mg/kg
SW8466010B	Dry	Vanadium	0.0034	mg/kg
SW8466010B	Dry	Zinc	2.00	mg/kg
Inorganics 7000 Series				
EPA 7041	Liquid	Antimony, Furnace-GW	0.0009305	mg/L
EPA 7470A	Liquid	Mercury by Cold Vapor GW	0.037	mg/L
EPA 7471A	Solid	Mercury Total	0.033	mg/kg
EPA 7740	Liquid	Selenium Furnace GW	0.0013299	mg/L
EPA 7841	Liquid	Thallium, Furnace, Groundwater	0.0004041	mg/L
Pesticides 8081A - Aqueous				
SW8468081	Aqueous	4,4'-DDD	0.0096	ug/L
SW8468081	Aqueous	4,4'-DDE	0.010	ug/L
SW8468081	Aqueous	4,4'-DDT	0.0074	ug/L
SW8468081	Aqueous	Aldrin	0.0070	ug/L
SW8468081	Aqueous	alpha-BHC	0.0062	ug/L
SW8468081	Aqueous	Alpha-chlordane	0.0056	ug/L
SW8468081	Aqueous	beta-BHC	0.0089	ug/L
SW8468081	Aqueous	Chlordane	0.22	ug/L
SW8468081	Aqueous	Delta-BHC	0.013	ug/L
SW8468081	Aqueous	Dieldrin	0.00679	ug/L
SW8468081	Aqueous	Endosulfan-I	0.0089	ug/L
SW8468081	Aqueous	Endosulfan-II	0.0081	ug/L
SW8468081	Aqueous	Endosulfan sulfate	0.0093	ug/L
SW8468081	Aqueous	Endrin	0.013	ug/L
SW8468081	Aqueous	Endrin aldehyde	0.0083	ug/L
SW8468081	Aqueous	Endrin ketone	0.0094	ug/L
SW8468081	Aqueous	gamma-BHC (Lindane)	0.0099	ug/L
SW8468081	Aqueous	Heptachlor	0.0090	ug/L
SW8468081	Aqueous	Heptachlor epoxide	0.0089	ug/L
SW8468081	Aqueous	Methoxychlor	0.0074	ug/L

Analytical Method	Matrix	Analyte	MDL	Units
Pesticides 8081A - Solids				
SW8468081	Dry	4,4'-DDD	0.19	ug/kg
SW8468081	Dry	4,4'-DDE	0.18	ug/kg
SW8468081	Dry	4,4'-DDT	0.16	ug/kg
SW8468081	Dry	Aldrin	0.18	ug/kg
SW8468081	Dry	alpha-BHC	0.14	ug/kg
SW8468081	Dry	beta-BHC	0.14	ug/kg
SW8468081	Dry	Chlordane	0.75	ug/kg
SW8468081	Dry	Delta-BHC	0.30	ug/kg
SW8468081	Dry	Dieldrin	0.22	ug/kg
SW8468081	Dry	Endosulfan-I	0.16	ug/kg
SW8468081	Dry	Endosulfan-II	0.17	ug/kg
SW8468081	Dry	Endosulfan sulfate	0.23	ug/kg
SW8468081	Dry	Endrin	0.19	ug/kg
SW8468081	Dry	Endrin aldehyde	0.30	ug/kg
SW8468081	Dry	gamma-BHC (Lindane)	0.15	ug/kg
SW8468081	Dry	Heptachlor	0.20	ug/kg
SW8468081	Dry	Heptachlor epoxide	0.26	ug/kg
SW8468081	Dry	Methoxychlor	0.16	ug/kg
Volatiles 8260B - Aqueous				
SW8468260B	Aqueous	1,1,1-Trichloroethane	0.40	ug/L
SW8468260B	Aqueous	1,1,2,2-Tetrachloroethane	0.69	ug/L
SW8468260B	Aqueous	1,1,2-Trichloroethane	0.67	ug/L
SW8468260B	Aqueous	1,1-Dichloroethane	0.67	ug/L
SW8468260B	Aqueous	1,1-Dichloroethene	1.0	ug/L
SW8468260B	Aqueous	1,2-Dichlorobenzene	0.65	ug/L
SW8468260B	Aqueous	1,2-Dichloroethane	0.63	ug/L
SW8468260B	Aqueous	1,2-Dichloroethene (total)	1.0	ug/L
SW8468260B	Aqueous	1,2-Dichloropropane	0.62	ug/L
SW8468260B	Aqueous	1,3-Dichlorobenzene	0.47	ug/L
SW8468260B	Aqueous	1,4-Dichlorobenzene	0.44	ug/L
SW8468260B	Aqueous	2-Butanone (MEK)	3.3	ug/L
SW8468260B	Aqueous	2-Hexanone	5.0	ug/L
SW8468260B	Aqueous	4-Methyl-2-pentanone (MIBK)	0.69	ug/L
SW8468260B	Aqueous	Acetone	1.0	ug/L
SW8468260B	Aqueous	Benzene	0.44	ug/L
SW8468260B	Aqueous	Bromodichloromethane	0.47	ug/L
SW8468260B	Aqueous	Bromoform	0.58	ug/L
SW8468260B	Aqueous	Bromomethane	1.1	ug/L

Analytical Method	Matrix	Analyte	MDL	Units
SW8468260B	Aqueous	Carbon disulfide	0.79	ug/L
SW8468260B	Aqueous	Carbon tetrachloride	0.81	ug/L
SW8468260B	Aqueous	Chlorobenzene	0.40	ug/L
SW8468260B	Aqueous	Chloroethane	1.3	ug/L
SW8468260B	Aqueous	Chloroform	0.59	ug/L
SW8468260B	Aqueous	Chloromethane	1.6	ug/L
SW8468260B	Aqueous	cis-1,3-Dichloropropene	0.50	ug/L
SW8468260B	Aqueous	Dibromochloromethane	0.65	ug/L
SW8468260B	Aqueous	Ethylbenzene	0.20	ug/L
SW8468260B	Aqueous	Methylene chloride	0.65	ug/L
SW8468260B	Aqueous	Styrene	0.60	ug/L
SW8468260B	Aqueous	Tetrachloroethene	0.54	ug/L
SW8468260B	Aqueous	Toluene	0.34	ug/L
SW8468260B	Aqueous	trans-1,3-Dichloropropene	0.50	ug/L
SW8468260B	Aqueous	Trichloroethene	0.74	ug/L
SW8468260B	Aqueous	Vinyl chloride	1.00	ug/L
SW8468260B	Aqueous	Xylene (total)	1.00	ug/L
Volatiles 8260B - Solids				
SW8468260B	Dry	1,1,1-Trichloroethane	0.33	ug/kg
SW8468260B	Dry	1,1,2,2-Tetrachloroethane	0.53	ug/kg
SW8468260B	Dry	1,1,2-Trichloroethane	0.76	ug/kg
SW8468260B	Dry	1,1-Dichloroethane	0.35	ug/kg
SW8468260B	Dry	1,1-Dichloroethene	0.42	ug/kg
SW8468260B	Dry	1,2-Dichlorobenzene	0.43	ug/kg
SW8468260B	Dry	1,2-Dichloroethane	0.22	ug/kg
SW8468260B	Dry	1,2-Dichloroethene (total)	0.63	ug/kg
SW8468260B	Dry	1,2-Dichloropropane	0.86	ug/kg
SW8468260B	Dry	1,3-Dichlorobenzene	0.40	ug/kg
SW8468260B	Dry	1,4-Dichlorobenzene	0.38	ug/kg
SW8468260B	Dry	2-Butanone (MEK)	1.2	ug/kg
SW8468260B	Dry	2-Hexanone	0.43	ug/kg
SW8468260B	Dry	4-Methyl-2-pentanone (MIBK)	0.31	ug/kg
SW8468260B	Dry	Acetone	0.32	ug/kg
SW8468260B	Dry	Benzene	0.40	ug/kg
SW8468260B	Dry	Bromodichloromethane	0.27	ug/kg
SW8468260B	Dry	Bromoform	0.30	ug/kg
SW8468260B	Dry	Bromomethane	0.95	ug/kg
SW8468260B	Dry	Carbon disulfide	0.85	ug/kg
SW8468260B	Dry	Carbon tetrachloride	0.35	ug/kg

Analytical Method	Matrix	Analyte	MDL	Units
SW8468260B	Dry	Chlorobenzene	0.42	ug/kg
SW8468260B	Dry	Chloroethane	0.49	ug/kg
SW8468260B	Dry	Chloroform	0.30	ug/kg
SW8468260B	Dry	Chloromethane	0.78	ug/kg
SW8468260B	Dry	cis-1,3-Dichloropropene	0.34	ug/kg
SW8468260B	Dry	Dibromochloromethane	0.53	ug/kg
SW8468260B	Dry	Ethylbenzene	0.26	ug/kg
SW8468260B	Dry	Methylene chloride	0.46	ug/kg
SW8468260B	Dry	Styrene	0.27	ug/kg
SW8468260B	Dry	Tetrachloroethene	0.90	ug/kg
SW8468260B	Dry	Toluene	0.74	ug/kg
SW8468260B	Dry	trans-1,3-Dichloropropene	0.33	ug/kg
SW8468260B	Dry	Trichloroethene	0.38	ug/kg
SW8468260B	Dry	Vinyl chloride	0.87	ug/kg
SW8468260B	Dry	Xylene (total)	0.26	ug/kg
1,4 Dioxane - Aqueous				
EPA SOP-VOADIOX1	Aq	1,4-Dioxane	0.22	ug/L

[2] Maine Department of Human Services, Environmental and Occupational Health Program, Center for Disease Control, "Maine CDC Maximum Exposure Guidelines (MEGs) for drinking water," (August 7, 2006).

Table D-1
Field Duplicate Results
Aqueous Samples

Field Sample Id	Analyte	Analytical Method	Result	Units	Qualifier	Field Duplicate Id	Result	Units	Qualifier	Results Difference	FD RPD (%)
BN-1&3-29-SW4	Lead	SW8466020	0.49	ug/l		BN-1&3-29-SW-XD1	0.42	ug/l		0.07	15.4
	Thallium	SW8466020	1		UJ		0.57		J	0.43	**NC**
	Antimony	SW8466020	0.84		J		0.57		J	0.27	**38.3**
	Aluminum	SW8466010B	91.2				90.6			0.6	0.7
	Iron	SW8466010B	983				1060			-77	7.5
	Magnesium	SW8466010B	2040				2100			-60	2.9
	Manganese	SW8466010B	203				204			-1	0.5
	Potassium	SW8466010B	1890				1940			-50	2.6
	Sodium	SW8466010B	20100				20500			-400	2
	Barium	SW8466010B	25.4				26.3			-0.9	3.5
	Zinc	SW8466010B	7.4				7.5			-0.1	1.3
	Calcium	SW8466010B	10100				10400			-300	2.9
BN-1&3-29-SEEP9	Iron	SW8466010B	2640000	ug/l	J	BN-1&3-29-SEEP-XD1	1680000	ug/l	J	960000	**44.4**
	Manganese	SW8466010B	76800				58500			18300	27.1
	4,4'-DDT	SW8468081	0.2		J		0.62		J	-0.42	**102.4**
	4,4'-DDD	SW8468081	0.19		J		0.37		J	-0.18	**64.3**
	4,4'-DDE	SW8468081	0.24				0.29			-0.05	18.9
	Barium	SW8466010B	2450		J		2070		J	380	**139.2**
	Thallium	SW8466020	4.9		J		10.7		J	-5.8	**74.4**
	Arsenic	SW8466020	83.5		J		706		J	-622.5	**166.6**
	Lead	SW8466020	54.7		J		439		J	-384.3	**171.2**
	Antimony	SW8466020	3.3		J		7.6		J	-4.3	**149.6**
	Selenium	SW8466020	50		UJ		22.9		J	27.1	**NC**
	Aluminum	SW8466010B	371000		J		273000		J	98000	**145.5**
	Magnesium	SW8466010B	71200		J		58500		J	12700	**196.3**
	Nickel	SW8466010B	878		J		667		J	211	**188.6**
	Potassium	SW8466010B	39200		J		29900		J	9300	**199.9**
	Silver	SW8466010B	5.8		J		5.7		J	0.1	**199.9**
	Sodium	SW8466010B	25000		J		25900		J	-900	**169.4**
	Beryllium	SW8466010B	26.4				20.7			5.7	24.2
	Cadmium	SW8466010B	83.9		J		8.8		J	75.1	**162**
	Chromium	SW8466010B	387				287			100	29.7
	Cobalt	SW8466010B	2060				1690			370	19.7
	Copper	SW8466010B	576		J		358		J	218	**46.7**
	Vanadium	SW8466010B	737				576			161	24.5
	Zinc	SW8466010B	1540				1190			350	25.6
	Calcium	SW8466010B	290000				301000			-11000	3.7
	Mercury	SW8467470A	10.8				12.4			-1.6	13.8
	Endosulfan-I	SW8468081	0.029		UJ		0.014		J	0.015	**NC**
BN-1&3-29-MW1302S	Lead	SW8466020	0.19	ug/l		BN-1&3-29-MWXD1	0.16	ug/l		0.03	17.1
	Thallium	SW8466020	0.22		J		1		UJ	-0.78	NC
	Antimony	SW8466020	0.48				0.5			-0.02	4.1
	Arsenic	SW8466020	2		UJ		2		J	0	NC
	Selenium	SW8466020	1.3				1.2			0.1	8
	Iron	SW8466010B	1380				1530			-150	10.3
	Magnesium	SW8466010B	5490				5370			120	2.2
	Manganese	SW8466010B	384				373			11	2.9
	Nickel	SW8466010B	14.3				14			0.3	2.1
	Potassium	SW8466010B	14800				14800			0	0
	Sodium	SW8466010B	3460				3450			10	0.3
	Barium	SW8466010B	31.5				31.1			0.4	1.3
	Copper	SW8466010B	1.6				1.2			0.4	28.6
	Zinc	SW8466010B	7.4				8.9			-1.5	18.4
	Calcium	SW8466010B	83500				80900			2600	3.2
	Chlorobenzene	SW8468260B	0.4		J		1		UJ	-0.6	NC
	Chloroethane	SW8468260B	35.6				39.8			-4.2	11.1
	1,1-Dichloroethane	SW8468260B	2.7				2.6			0.1	3.8
	1,1,2,2-Tetrachloroethane	SW8468260B	1		UJ		0.74		J	0.26	NC

Table D-1
Field Duplicate Results
Aqueous Samples

Field Sample Id	Analyte	Analytical Method	Result	Units	Qualifier	Field Duplicate Id	Result	Units	Qualifier	Results Difference	FD RPD (%)
BN-EP-29-SEEP11	Tetrachloroethene	SW8468260B	1.4	ug/l		BN-EP-29-SEEP-XD1	1.4	ug/l		0	0
	1,1,1-Trichloroethane	SW8468260B	1.1				1.1			0	0
	Trichloroethene	SW8468260B	1.6				1.7			-0.1	6.1
BN-EP-29-COMB EFFLUENT	1,4-Dioxane	SW8468260BBYSIM	6.6	ug/l		BN-EP-29-EFFLUENT-XD1	5.8	ug/l		0.8	12.9
BN-EP-29-MW313	1,4-Dioxane	SW8468260BBYSIM	69	ug/l		BN-EP-29-MW-XD3	70.6	ug/l		-1.6	2.3
BN-EP-29-P106	Tetrachloroethene	SW8468260B	7	ug/l		BN-EP-29-MW-XD5	6.9	ug/l		0.1	1.4
	1,2-Dichloroethene (total)	SW8468260B	8.3				8.5			-0.2	2.4
	1,1,1-Trichloroethane	SW8468260B	352				377			-25	6.9
	1,1-Dichloroethane	SW8468260B	13.9				14.8			-0.9	6.3
	1,1-Dichloroethene	SW8468260B	56.9				60.9			-4	6.8
	Trichloroethene	SW8468260B	245				254			-9	3.6
	1,4-Dioxane	SW8468260BBYSIM	16.1				19			-2.9	16.5
BN-EP-29-MW224	Total 1,2-dichloroethene	SW8468260B	2.6	ug/l	J	BN-EP-29-MW-XD1	1	ug/l	J	1.6	88.9
BN-EP-29-MW311-D	Tetrachloroethene	SW8468260B	17	ug/l		BN-EP-29-MW-XD2	15.3	ug/l		1.7	10.5
	1,1,1-Trichloroethane	SW8468260B	4.5				4.6			-0.1	2.2
	Trichloroethene	SW8468260B	3.4				3.8			-0.4	11.1

Table D-2
Field Duplicate Results
Sediment Samples

Field Sample Id	Analyte	Analytical Method	Result	Units	Qualifier	Field Duplicate Id	Result	Units	Qualifier	Results Difference	FD RPD (%)
BN-1&3-29-LT9	Iron	SW8466010B	127000	mg/kg	J	BN-1&3-29-LT-XD1	495000	mg/kg	J	-368000	**118.3**
	Aluminum	SW8466010B	7200		J		1670		J	5530	**124.7**
	Lead	SW8466010B	21.4		J		8.5		J	12.9	**86.3**
	Magnesium	SW8466010B	2190		J		509		J	1681	**124.6**
	Manganese	SW8466010B	774				939			-165	19.3
	Nickel	SW8466010B	32.3		J		3.6		J	28.7	**159.9**
	Potassium	SW8466010B	812		J		800		UJ	12	**NC**
	Silver	SW8466010B	0.81		UJ		0.18		J	0.63	**NC**
	Sodium	SW8466010B	209		J		800		UJ	-591	**NC**
	Thallium	SW8466010B	3.1		J		7.9		J	-4.8	**87.3**
	Arsenic	SW8466010B	363		J		792		J	-429	**74.3**
	Barium	SW8466010B	51.6				53.2			-1.6	3.1
	Beryllium	SW8466010B	0.59		J		0.64		UJ	-0.05	**NC**
	Chromium	SW8466010B	12.2		J		8		UJ	4.2	**NC**
	Cobalt	SW8466010B	80.7		J		11.7		J	69	**149.4**
	Copper	SW8466010B	17		J		2.3		J	14.7	**152.3**
	Vanadium	SW8466010B	27.5				28.3			-0.8	2.9
	Zinc	SW8466010B	73.8		J		18.6		J	55.2	**119.5**
	Calcium	SW8466010B	10100		J		2710		J	7390	**115.4**
	Selenium	SW8466010B	2.4		J		4		UJ	-1.6	**NC**
	Mercury	SW8467471A	0.081		J		0.035		J	0.046	**79.3**
	1,4-Dichlorobenzene	SW8260	143	ug/kg	J		62.4	ug/kg	J	80.6	**78.5**
	Toluene	SW8260	45		UJ		5.7		J	39.3	**NC**
	Acetone	SW8260	5620		J		3480		J	2140	47
	Carbon disulfide	SW8260	255		J		485		J	-230	**62.2**
	1,2-Dichlorobenzene	SW8260	320		J		148		J	172	**73.5**
BN-1&3-29-SED19	Total Organic Carbon	CORPENG81M	1510	mg/kg	J	BN-1&3-29-SED-XD1	1300	mg/kg	UJ	210	**NC**
	Endosulfan-I	SW8468081	2				3.1			-1.1	43.1
	Aluminum	SW8466010B	1700				2170			-470	24.3
	Iron	SW8466010B	5790				7450			-1660	25.1
	Lead	SW8466010B	2.9				3.8			-0.9	26.9
	Magnesium	SW8466010B	582				821			-239	34.1
	Manganese	SW8466010B	506				720			-214	34.9
	Nickel	SW8466010B	4.1				5.5			-1.4	29.2
	Potassium	SW8466010B	220				251			-31	13.2
	Silver	SW8466010B	0.096				0.076			0.02	23.3
	Sodium	SW8466010B	69.7				59.5			10.2	15.8
	Arsenic	SW8466010B	3.1				4.1			-1	27.8
	Barium	SW8466010B	19.1				26.1			-7	31
	Beryllium	SW8466010B	0.19				0.26			-0.07	31.1
	Chromium	SW8466010B	2.5		J		4.5		J	-2	**57.1**
	Cobalt	SW8466010B	2.8				3.8			-1	30.3
	Copper	SW8466010B	1.6				2			-0.4	22.2
	Vanadium	SW8466010B	4.4				5.7			-1.3	25.7
	Zinc	SW8466010B	17.6				22			-4.4	22.2
	Calcium	SW8466010B	287				463			-176	46.9
	Selenium	SW8466010B	0.68		UJ		0.46		J	0.22	**NC**
	Mercury	SW8467471A	0.014				0.0085			0.0055	48.9
BN-EP-29-SED11	4,4'-DDT	SW8468081	2.4	ug/kg		BN-EP-29-SED-XD1	3.9	ug/kg		-1.5	NC
	4,4'-DDD	SW8468081	11.5				14.4			-2.9	22.4
	4,4'-DDE	SW8468081	2.4				0.96			1.44	NC
	Endosulfan-I	SW8468081	2.4				7.6			-5.2	NC
	Aluminum	SW8466010B	5070	mg/kg			5560	mg/kg		-490	9.2
	Iron	SW8466010B	18300				20900			-2600	13.3
	Lead	SW8466010B	22.9				25			-2.1	8.8
	Magnesium	SW8466010B	1600				1770			-170	10.1
	Manganese	SW8466010B	505				518			-13	2.5
	Nickel	SW8466010B	8.4				9.2			-0.8	9.1
	Potassium	SW8466010B	691				767			-76	10.4
	Sodium	SW8466010B	68.3				81			-12.7	17
	Arsenic	SW8466010B	3.7				5			-1.3	29.9
	Barium	SW8466010B	36.7				38.8			-2.1	5.6
	Beryllium	SW8466010B	0.37				0.4			-0.03	7.8
	Chromium	SW8466010B	9.3				10			-0.7	7.3
	Cobalt	SW8466010B	5.3				5.7			-0.4	7.3
	Copper	SW8466010B	7				7.7			-0.7	9.5
	Vanadium	SW8466010B	17.3				19.1			-1.8	9.9
	Zinc	SW8466010B	51.3				57			-5.7	10.5
	Calcium	SW8466010B	866				943			-77	8.5
	Selenium	SW8466010B	0.55				0.69			-0.14	22.6
	Mercury	SW8467471A	0.022		J		0.037		J	-0.015	**50.8**

APPENDIX E

Field Monitoring and Sampling Forms

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APPENDIX E.1

Sites 1 and 3

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CHAIN OF CUSTODY

Job #:

Control #:

Client Information

ame Environmental Chemical Corporation

idress 33 Boston Post Road West

ty Marlborough, MA State 01752 Zip

end Report to: Jackson Kiker

hone #: 508-229-2270

Facility Information

Project Name: SITES 1&3

Location: NASB Brunswick, Maine

Project No.: 5700.007

FAX #:

Analytical Information

Field ID / Point of Collection	Collection Date	Collection Time	Sampled By	Matrix	# of bottles	Preservation: voc hcl	NaOH	HNO3	H2So4	None	TCL VOC	TAL METALS
N-1&3-29-MW1302D	9/13/06	1457		GW	3	X		X			X	X
N-1&3-29-MW1301S	9/13/06	1420		GW	3	X		X			X	X
N-1&3-29-MW1301D	9/13/06	1145		GW	3	X		X			X	X
N-1&3-29-MW1303AD	9/13/06	1526		GW	3	X		X			X	X
N-1&3-29-MW217B	9/13/06	1033		GW	2	X					X	
N-1&3-29-MW217B-D	9/13/06	0947		GW	2	X					X	
N-1&3-29-MW1302S MS/MSD	9/13/06	1113		GW	9	X		X			X	X
N-1&3-29-MWXD1	9/13/06	0000		GW	3	X		X			X	X

Turnaround Information

- ☐ 21 Day Standard — Approved By:
- ☐ 14 Day
- ☐ 7 Days *EMERGENCY*
- ☐ Other _____ (Days)

RUSH TAT is for FAX data Data unless previously approved.

Data Deliverable Information

- ☐ NJ Reduced
- ☐ NJ Full
- ☐ FULL CLP
- ☐ Disk Deliverable
- ☐ Other (Specify) _____
- ☐ Commercial "A"
- ☐ Commercial "B"
- ☐ ASP Category B
- ☐ State Forms

Comments / Remarks

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

Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
1	9/18/06 1300	1	2		2
Relinquished by Sampler: 3	Date Time:	Received By: 3	Seal #	Preserved where applica ☐	On Ice: ☐

CHAIN OF CUSTODY

ACCUTEST

495 Technology Center West
Building One, Marlbourough, MA 01752
508-481-6200 FAX: 508-481-7753

Accutest Job #:

Accutest Control #:

Client Information

ame Environmental Chemical Corporation

ddress 33 Boston Post Road West

ity Marlborough, MA State 01752 Zip

end Report to: Jackson Kiker

hone #: 508-229-2270

Facility Information

Project Name: SITES 1&3

Location: NASB Brunswick, Maine

Project No.: 5700.007

FAX #:

Analytical Information

Field ID / Point of Collection	Collection Date	Collection Time	Sampled By	Matrix	# of bottles	Preservation: voc hcl	NaOH	HNO3	NaSo4	None	TCL VOC	TAL METALS	PESTICIDES	TOTAL SOLIDS	PESTICIDES, GRAIN SIZE, TOC
3N-1&3-29-SED19 MSMSD	9/14/06	1205		SED	5		X		X	X		X		X	X
3N-1&3-29-SED-XD1	9/14/06	0000		SED	2		X		X	X		X		X	X
~~3N-1&3-29-SED15~~	9/14/06	1335		SED	2					X		X		X	X
~~3N-1&3-29-SED16~~	9/14/06	1340		SED	2					X		X		X	X
~~3N-1&3-29-SW-XD1~~	~~9/14/06~~	~~0000~~		~~SW~~	~~3~~										
~~3N-1&3-29-SED17~~	9/14/06	1010		SED	2					X		X		X	X
~~3N-1&3-29-SED19 MSMSD~~	9/14/06	1205		SED	5		X		X	X		X		X	X
~~3N-1&3-29-SED-XD1~~	9/14/06	0000		SED	2		X		X	X		X		X	X
3N-1&3-29-SED17	9/14/06	1010		SED	2					X		X		X	X
3N-1&3-29-SED15	9/14/06	1335		SED	2					X		X		X	X
3N-1&3-29-SED16	9/14/06	1340		SED	2					X		X		X	X
~~3N-1&3-29-SW16~~	~~9/14/06~~	~~1335~~		~~SW~~	~~3~~										
3N-1&3-29-SED18	9/14/06	1125		SED	2					X		X		X	X
3N-1&3-29-QT1	9/18/06	0800			3		X		X		X				

Turnaround Information

- ☐ 21 Day Standard
- ☐ 14 Day
- ☐ 7 Days *EMERGENCY*
- ☐ Other _____ (Days)

Approved By:

RUSH TAT is for FAX data
Data unless previously approved.

Data Deliverable Information

- ☐ NJ Reduced
- ☐ NJ Full
- ☐ FULL CLP
- ☐ Disk Deliverable
- ☐ Other (Specify) _____
- ☐ Commercial "A"
- ☐ Commercial "B"
- ☐ ASP Category B
- ☐ State Forms

Comments / Remarks

No Dup or MS/MSD required for TOC and Grain Size.

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

Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
1	9/18/06 1300	1	2		2
Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
3		3	4		4
Relinquished by Sampler:	Date Time:	Received By:	Seal #	Preserved where applicat	On Ice:
5		5		☐	☐

CHAIN OF CUSTODY

ACCUTEST

495 Technology Center West
Building One, Marlbourough, MA 01752
508-481-6200 FAX: 508-481-7753

Accutest Job #:

Accutest Control #:

Client Information

Name: Environmental Chemical Corporation
Address: 33 Boston Post Road West
City: Marlborough, MA State: 01752 Zip:
Send Report to: Jackson Kiker
Phone #: 508-229-2270

Facility Information

Project Name: SITES 1&3
Location: NASB Brunswick, Maine
Project No.: 5700.007
FAX #:

Analytical Information

Field ID / Point of Collection		Collection Date	Collection Time	Sampled By	Matrix	# of bottles	Preservation: voc hcl	NaOH	HNO3	NaSo4	None	TCL VOC	TAL METALS		TOTAL SOLIDS						
BN-1&3-29-LT9	MSMSD	9/14/06	1200		SED	12		X		X	X	X	X		X						
BN-1&3-29-LT-XD1		9/14/06	0000		SED	4		X		X	X	X	X		X						
BN-1&3-29-LT1		9/14/06	0925		SED	4		X		X	X	X	X		X						
BN-1&3-29-LT4		9/14/06	1115		SED	4		X		X	X	X	X		X						
BN-1&3-29-LT5		9/14/06	1045		SED	4		X		X	X	X	X		X						
BN-1&3-29-LT3		9/14/06	0950		SED	4		X		X	X	X	X		X						

Turnaround Information

- ☐ 21 Day Standard — Approved By:
- ☐ 14 Day
- ☐ 7 Days *EMERGENCY*
- ☐ Other _____ (Days)

RUSH TAT is for FAX data
Data unless previously approved.

Data Deliverable Information

- ☐ NJ Reduced
- ☐ NJ Full
- ☐ FULL CLP
- ☐ Disk Deliverable
- ☐ Other (Specify)
- ☐ Commercial "A"
- ☐ Commercial "B"
- ☐ ASP Category B
- ☐ State Forms

Comments / Remarks

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

Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
1	9/14/06 1500	1	2		2
Relinquished by Sampler: 3	Date Time:	Received By: 3	Relinquished By: 4	Date Time:	Received By: 4
Relinquished by Sampler: 5	Date Time:	Received By: 5	Seal #	Preserved where applica ☐	On Ice: ☑ 3.0 °C

CHAIN OF CUSTODY

ACCUTEST®

495 Technology Center West
Building One, Marlbourough, MA 01752
508-481-6200 FAX: 508-481-7753

Accutest Job #:

Accutest Control #:

Client Information

ame Environmental Chemical Corporation

ddress 33 Boston Post Road West

ty Marlborough, MA State 01752 Zip

nd Report to: Jackson Kiker

hone #: 508-229-2270

Facility Information

Project Name: SITES 1&3

Location: NASB Brunswick, Maine

Project No.: 5700.007

FAX #:

Analytical Information

Field ID / Point of Collection	Collection Date	Collection Time	Sampled By	Matrix	# of bottles	Preservation: voc hcl	NaOH	HNO3	NaSo4	None	TCL VOC	TAL METALS	PESTICIDES								
N-1&3-29-SEEP1	9/14/06	0910		GW	5	X		X			X	X	X								
N-1&3-29-SEEP3	9/14/06	1000		GW	5	X		X			X	X	X								
N-1&3-29-SEEP5	9/14/06	1045		GW	5	X		X			X	X	X								
N-1&3-29-SEEP4	9/14/06	1110		GW	5	X		X			X	X	X								
N-1&3-29-SW4 MSMSD	9/14/06	1020		SW	9	X		X			X	X									
N-1&3-29-SW-XD1	9/14/06	0000		SW	3	X		X			X	X									
N-1&3-29-SW16	9/14/06	1335		SW	3	X		X			X	X									
N-1&3-29-SW8	9/14/06	1255		SW	3	X		X			X	X									
N-1&3-29-SW9	9/14/06	1320		SW	3	X		X			X	X									
N-1&3-29-SW15	9/14/06	1330		SW	3	X		X			X	X									
N-1&3-29-SW7	9/14/06	1130		SW	3	X		X			X	X									
N-1&3-29-SEEP9 MSMSD	9/14/06	1150		GW	15		X		X	X	X	X	X								
N-1&3-29-SEEP-XD1	9/14/06	0000		GW	5		X		X	X	X	X	X								

Turnaround Information

- ☐ 21 Day Standard — Approved By:
- ☐ 14 Day
- ☐ 7 Days *EMERGENCY*
- ☐ Other _____ (Days)

RUSH TAT is for FAX data
Data unless previously approved.

Data Deliverable Information

- ☐ NJ Reduced
- ☐ NJ Full
- ☐ FULL CLP
- ☐ Disk Deliverable
- ☐ Other (Specify) _____
- ☐ Commercial "A"
- ☐ Commercial "B"
- ☐ ASP Category B
- ☐ State Forms

Comments / Remarks

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

Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
1	9/18/04 1300	1	2		2
Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
3		3	4		4
Relinquished by Sampler:	Date Time:	Received By:	Seal #	Preserved where applica	On Ice:
5		5		☐	☐

FIELD RECORD OF WELL GAUGING

Project Name:	NASB, ME LTM Sites 1 & 3	Weather:	overcast/ cool	Gauge Date:	9/8/2006
Project Number:	5700.007.015.620	Sounding Method:	Slope Indicator	Gauge Time:	0900-1200
ECC Personnel:	MAC/ GC				

Well Identification Number	Well Lock Status	Stick Up or F.M.	Well Physical Condition	VOC Concentrations Ambient Air (ppm)	VOC Concentrations Well Mouth (ppm)	PVC Casing Elevation (ft)	Well Diameter (inches)	Total Depth of Well (ft)	Depth to Water (ft)	Depth to to Liquid (ft)	Water Table Elevation (ft)	Dedicated Pump
Sites 1 & 3												
MW-201R	Good	Stick Up	Good	ND	ND	58.88	2	49.68	12.23	ND	46.65	
MW-202A	Good	Stick Up	Good	ND	ND	52.4	2	Pump	22.18	ND	30.22	Yes
MW-203	Good	Stick Up	Good	ND	ND	52.75	2	Pump	30.50	ND	22.25	Yes
MW-204	Good	Stick Up	Good	ND	ND	50.5	2	Pump	29.08	ND	21.42	Yes
MW-210B	Good	Stick Up	Good	ND	ND	54.72	2	40.85	26.23	ND	28.49	
MW-211B	Good	Stick Up	Good	ND	ND	65.44	2	35.87	33.52	ND	31.92	
MW-215R	Good	Stick Up	Good	ND	ND	62.26	2	Pump	29.97	ND	32.29	Yes
MW-217B	Good	Stick Up	Good	ND	ND	61.25	2	PDB	29.08	ND	32.17	PDB
MW-234R	Good	Stick Up	Good	ND	ND	68.55	2	59.10	37.00	ND	31.55	
MW-240	Good	Stick Up	Good	ND	ND	52.21	2	Pump	29.68	ND	22.53	Yes
MW-2101	Good	Stick Up	Good	ND	ND	61.05	2	Pump	11.60	ND	49.45	Yes
MW-216A	Good	Stick Up	Good	ND	ND	71.17	2	47.75	38.95	ND	32.22	
MW-217A	Good	Stick Up	Loose	ND	ND	61.78	2	10.39	30.72	ND	31.06	Yes
MW-218	Good	Stick Up	Good	ND	ND	54.16	2	Pump	33.34	ND	17.56	Yes
MW-219	Good	Stick Up	Good	ND	ND	51.87	2	Pump	28.76	ND	23.11	Yes
MW-220	Good	Stick Up	Good	ND	ND	47.2	2	51.43	23.37	ND	23.83	
MW-232A	Good	Stick Up	Good	ND	ND	71.18	2	34.78	39.36	ND	31.82	
MW-233R	Good	Stick Up	Good	ND	ND	63.94	2	38.72	32.44	ND	31.50	
MW-210A	Good	Stick Up	Good	ND	ND	52.17	2	100+	16.15	ND	36.02	
MW-210R	Good	Stick Up	Good	ND	ND	55.9	2	100+	19.14	ND	36.76	
MW-211A	Sticky	Stick Up	Good	ND	ND	65.59	2	100+	22.85	ND	42.74	
EW-6	Good	Vault	Good	ND	ND	57.74	6	59.93	22.95	ND	34.79	
EW-7	Good	Vault	Good	ND	ND	51.13	6	48.90	22.81	ND	28.32	
EP-16	Good	Stick Up	Good	ND	ND	58.92	2	59.52	30.12	ND	28.80	
EP-17	Good	Stick Up	Good	ND	ND	69.73	2	42.70	37.66	ND	32.07	
EP-18	Good	Stick Up	Good	ND	ND	68.58	2	38.93	36.60	ND	31.98	
EP-19	Good	Stick Up	Good	ND	ND	68.22	2	46.59	36.47	ND	31.75	
EP-20	Good	Stick Up	Good	ND	ND	69.55	2	47.25	37.58	ND	31.97	

Comments: Total depth of wells not measured this round. Data presented is carried over from prior gauging round.

FIELD RECORD OF WELL GAUGING

Project Name:	NASB, ME LTM Sites 1 & 3	Weather:	cloudy/ warm	Gauge Date:	9/8/2006
Project Number:	5700.007.015.620	Sounding Method:	Slope Indicator	Gauge Time:	0900-1200
ECC Personnel:	MAC, JP				

Well Identification Number	Well Lock Status	Stick Up or F.M.	Well Physical Condition	VOC Concentrations Ambient Air (ppm)	VOC Concentrations Well Mouth (ppm)	PVC Casing Elevation (ft)	Well Diameter (inches)	Total Depth of Well (ft)	Depth to Water (ft)	Depth to to Liquid (ft)	Water Table Elevation (ft)	Dedicated Pump
Sites 1 & 3												
MW-1301 shallow	Good	Stick Up	Good	ND	ND		2	31.18	28.50	ND		No
MW-1301 deep	Good	Stick Up	Good	ND	ND		2	43.05	31.99	ND		No
MW-1303A shallov	Good	Stick Up	Good	ND	ND		2	39.96	31.38	ND		No
MW-1303A deep	Good	Stick Up	Good	ND	ND		2	59.30	27.95	ND		No
MW-1302 shallow	Good	Stick Up	Good	ND	ND		2	25.30	19.96	ND		No
MW-1302 deep	Good	Stick Up	Good	ND	ND		2	39.94	20.48	ND		No

Comments: Total depth of wells not measured this round. Data presented is carried over from prior gauging round.

FIELD RECORD OF WELL GAUGING

Project Name:	NASB, ME LTM Sites 1 & 3	Weather:	overcast/ cool	Gauge Date:	9/8/2006
Project Number:	5700.007.015.610	Sounding Method:	Slope Indicator	Gauge Time:	1000-1130
ECC Personnel:	MAC/ GC	Equipment:			

Well Identification Number	Well Lock Status	Well Physical Condition	PVC Casing Elevation (ft MSL)	Installed Depth of Well (ft)	Depth to Water 14-Sep-05 (ft)	Water Table Elevation (ft MSL)	Depth to Water 5-Jan-06 (ft)	Water Table Elevation (ft MSL)	Depth to Water April 17 06 (ft)	Water Table Elevation (ft MSL)	Depth to Water July 12 06 (ft)	Water Table Elevation (ft MSL)	Depth to Water Sept 7 06 (ft)	Water Table Elevation (ft)	Trigger Elev (ft MSL)
MW-201R	Good	Good	58.88	49.08	12.64	46.24	10.62	48.26	11.58	47.30	11.49	47.39	12.23	46.65	NA
MW-234R	Good	Good	68.55	59.52	37.65	30.90	37.03	31.52	37.00	31.55	36.88	31.67	37.00	31.55	33.00
EW-6	Good	Good	57.74	39.05	23.07	34.67	22.56	35.18	22.04	35.70	22.35	35.39	22.95	34.79	39.00
EW-7	Good	Good	51.13	38.90	24.53	26.60	24.01	27.12	22.51	28.62	22.08	29.05	22.81	28.32	35.00
EP-17	Good	Good	69.73	42.85	38.37	31.36	37.83	31.90	37.73	32.00	37.61	32.12	37.66	32.07	35.00
EP-18	Good	Good	68.58	38.10	37.27	31.31	36.73	31.85	36.62	31.96	36.52	32.06	36.60	31.98	35.00
EP-19	Good	Good	68.22	47.30	37.11	31.11	36.60	31.62	36.51	31.71	37.39	30.83	36.47	31.75	35.00
EP-20	Good	Good	69.55	47.25	38.21	31.34	37.74	31.81	37.64	31.91	37.52	32.03	37.58	31.97	35.00

Comments:

Monitoring well MW-201R is located outside of the Sites 1& 3 slurry wall; therefore, trigger elevation is not applicable for this well.

Depth to water measurement is feet below top of well casing.

All elevations are in feet mean sea level (MSL).

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: Sites 143
Location: NASB, Brunswick, ME
Well ID: MW-217B

Date: 9/13/06
Sampler: MAC
PID Reading: —

Start Time: _____ **End Time:** _____
Well Construction: 2" PVC
Depth to water: 29.11
Well Depth: 32.21
Water Column: _____
Total Volume Removed (L) _____

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	02H1015AB
YSI	600XL	02D1015AB
Lamotte	2020	5729-0905

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm^c	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1035	200	100	29.11	13.18	5.66	659	3.77	9.6	750	
1037		100	29.50	13.89	5.57	648	3.03	16.0	170	
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1033	BN-143-29-MW217B	500ML Poly	1	HNO3	TAL Metals

Comments Due to low water history - filled sample jar first then flowed to flow cell. Put Grundfos on well bottom + pumped dead slow

Mark A. Co
Signature

9/13/06
Date

1040 - Well ran dry

Environmental Chemical Corporation

Aqueous Diffusion Sampling Log

Project: Sites 1+3
Location: NASB, Brunswick, ME
Well ID: MW-217B

Date: 9/13/06
Sampler: MAC
PID Reading:

Well Construction: 2" PVC
Depth to water: 29.11
Well Depth: 32.21
Water Column:

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	02H1015AB
YSI	600XL	02D1015AB
~~Lamotte~~		

Time	Temp (celsius)	pH (STD) MAC	SPC uS/cm^C	DO (mg/L)	ORP (mV)
0955	10.28	~~6.57~~ 5.97	657	1.89	-27.4

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
0947	BN-1+3-29-MW217B-D	40ML	2	HCL	VOC

Comments

Mark A. Co
Signature

9/13/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: BN site 143
Location: NASB, Brunswick, ME
Well ID: MW 1301S

Date: sept 13 2006
Sampler: P Gym
PID Reading: 0.0

Start Time: 1155 **End Time:** 1435
Well Construction: 2" PVC
Depth to water: 28.58
Well Depth: 31.2
Water Column: 2.6' ≈ 3 L
Total Volume Removed (L)

Field Testing Equipment

Make	Model	Serial #
YSI	650 MDS	04D8002 YC
YSI	600XL	01J0849
Lamotte	2020	0837-3898

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1155	0	.100	28.58	13.64	5.80	1173	0.97	129.1	23	
1405	1		28.70	13.80	6.04	1206	0.90	39.4	7.1	
1415	2		28.70	13.23	5.83	1153	0.86	69.7	3.9	
1418			28.71	13.39	5.84	1158	0.84	68.6	3.7	
1420	3		28.71	13.40	5.80	1160	0.83	67.2	3.1	
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1420	BN site 143 29 MW 1301S	.5L Poly	1	HNO_3	Metals
1420	BN site 143 29 MW 1301S	40ml VOA	2	HCl	VOC

Comments

sampled using Peristaltic Pump
Paused sampling @ 1200 resumed @ 1405

Signature

9/13/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: Sites 1+3
Location: NASB, Brunswick, ME
Well ID: MW-1303A-Deep

Date: 9/13/06
Sampler: MAC
PID Reading: –

Start Time: _____ **End Time:** _____
Well Construction: 2" PVC
Depth to water: 28.03
Well Depth: 59.04
Water Column:
Total Volume Removed (L)

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	02H1015AB
YSI	600XL	02D1015AB
Lamotte	2020	5729-0905

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm^c	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1110	4.5	300	28.35	13.61	6.28	782	10.75	-40.9	↑750	
1125	7.5	300	28.77	16.19	6.10	793	1.68	-66.8	1000	
1135	12.0	300	28.90	14.83	6.02	725	1.23	-64.8	130	
1150		300	28.98	15.66	5.99	759	1.02	-64.6	45	
1405		300	28.68	12.98	6.29	797	5.13	-66.7	50	
1415	15.0	300	28.59	15.35	5.95	710	2.19	-58.2	36	
1430	19.5	300	28.85	15.04	6.19	753	1.38	-65.5	30	
1445	24	300	28.89	15.03	6.25	771	1.08	-68.3	31	
1505		300	28.81	15.31	6.34	764	0.90	-68.1	25	
1525		300		15.29	6.38	758	0.82	67.3	29	
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1526	BN-1+3-29-MW1303AD	40ML	2	HCL	VOC
		500ML Poly	1	HNO_3	TAL Metals

Comments Shut pump down @ 1155 to attend safety meeting
Restarted @ 1405

Mark A. Ca
Signature

9/13/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: BN- EP Site 183
Location: NASB, Brunswick, ME
Well ID: MW 1301 D

Date: Sept 13 2006
Sampler: PC
PID Reading: 0.0

Start Time: 0940 **End Time:**
Well Construction: 2" PVC
Depth to water: 31.02
Well Depth:
Water Column:
Total Volume Removed (L) 12.0

Field Testing Equipment

Make	Model	Serial #
YSI	650 MDS	01J0849
YSI	600 XL	04D8002 AC
LaMotte	2020	0837-3898

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
0945	0	.160	31.29	17.48	7.31	2027	5.25	162.9	>1000	
0955	1.0	.100	31.60	14.95	6.10	2618	0.94	166.3	>1000	
1005	2.0		31.62	15.30	6.10	2552	0.93	167.6	900	
1015	3.0		31.63	17.32	6.16	2192	0.93	184.1	850	
1025	4.0		31.69	15.97	5.96	2276	0.90	209.3	700	
1045	6.0		31.69	15.65	6.20	2138	0.94	206.8	260	
1105	8.0		31.69	15.89	6.17	2132	0.91	210.7	220	
1125	10.0		31.69	15.87	6.14	2104	0.80	219.9	180	
1145	12.0		31.69	15.90	6.17	2111	0.81	216.6	160	
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1145	BN-Sites 183-29-MW1301D	500ml Poly	1	HNO3	Metals
1145	BN-Sites 183-29-MW1301D	40ml VOA	2	HCl	VOC

Comments

Signature

Sept 13 2006
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: Site 1 & 3
Location: NASB, Brunswick, ME
Well ID: MW13025

Date: 9/13/06
Sampler: Geoff Cokinos
PID Reading: 0

Start Time: 0950 **End Time:** 1115
Well Construction: 2" PVC
Depth to water: 20.02
Well Depth: 25.34
Water Column: 5.32
Total Volume Removed (L) 16

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	05F1983
YSI	600XLBM	01J0849
LaMotte	2020 turbidimeter	4002-0703

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1000	2	200	20.05	15.25	5.08	459	4.22	183.6	15	Clear
1010	2	200	20.05	16.72	5.29	446	4.40	173.8	9.5	Clear
1020	2	200	~~[illegible]~~ 20.05	18.63	5.24	484	3.62	156.1	7.5	Clear
1030	2	200	20.05	15.26	5.23	488	2.72	161.5	5.3	Clear
1035	1	200	20.05	14.90	5.23	484	2.87	138	5.0	Clear
1045	2	200	20.05	11.20	5.21	481	2.11	93.1	5	Clear
1055	2	200	20.06	14.65	5.31	480	2.10	101.8	6.6	Clear
1100	1	200	20.06	10.20	5.04	461	2.10	83.4	5	Clear
1105	1	200	20.08	10.30	5.04	461	2.10	83.4	5	Clear
1110	1	200	20.07	10.30	5.04	461	2.10	83.4	5	Clear
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1113	BN-1&3-29-MW13025	40ml vial	2	HCL	VOC
1113	BN-1&3-29-MW13025-MSD	40ml vial	2	HCL	VOC
1113	BN-1&3-29-MW13025-MS	40ml vial	2	HCL	VOC
0000	BN-1&3-29-MWXD1	40ml vial	2	HCL	VOC (DUP)
1115	BN-1&3-29-MW13025	500ml poly	1	HNO_3	Metals
1115	BN-1&3-29-MW13025MSD	500ml poly	1	HNO_3	Metals
1115	BN-1&3-29-MW13025MS	500ml poly	1	HNO_3	Metals
	BN-1&3-29-MWXD1	500ml poly	1	HNO_3	Metals

Comments TIME = 0000

Signature

9/13/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: Site 1&3
Location: NASB, Brunswick, ME
Well ID: MW1302D

Date: 9/13/06
Sampler: Geoff Cotnos
PID Reading: 0

Start Time: 1405 **End Time:** 1502
Well Construction: 2" PVC
Depth to water: 20.58
Well Depth: 39.81
Water Column: 19.23
Total Volume Removed (L) 20

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	05F1983
YSI	600XLBM	01J0849
LaMotte	2020+turbid.meter	4002-0703

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1415	4	400	20.94	12.10	5.69	704	3.34	60.6	39	Clear
1425	4	400	20.93	12.28	5.91	717	3.34	47.2	16	Clear
1430	2	400	20.93	12.38	5.97	719	3.37	41	16	Clear
1440	4	400	20.93	12.60	6	720	3.33	36.8	13	Clear
1445	2	400	20.93	12.64	6	720	3.45	33.6	9.8	clear
1450	2	400	20.93	12.66	6	720	3.45	33.6	9.8	Clear
1455	2	400	20.93	12.66	6	720	3.44	33.6	8.3	Clear
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1457	BN-1&3-29-MW1302D	40ml vial	2	HCL	VOC
1500	BN-1&3-29-MW1302D	500ml poly	1	HNO3	Metals

Comments

Signature

9/13/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: ~~EPI~~ S 1+3
Location: NASB
Well ID: MW-1303A-S

Date: 9/20/06
Sampler: MAC
PID Reading: —

Start Time: _____ **End Time:** _____
Well Construction: 2" PVC
Well Condition: OK
Depth to water: 31.54
Total Volume Removed (L) _____

39.95 STD

Field Testing Equipment

Make	Model	Serial #
YSI	650 MDS	04D8002-AC
YSI	600 XL	01J0849AA
Lamotte	2020	0837-3898

Time	volume removed (liters)	Flow Rate (ml/min)	drawdown (ft)	Temp (celsius)	pH (STD)	Cond (uS/cm)	DO (mg/L)	ORP (mV)	Turbidity (NTU)
0945	—	200	31.56	14.72	6.06	255	3.70	58.2	120
0955	2.0	200	31.58	18.40	5.53	264	2.46	90.7	140
1005	4.0	200	31.60	19.72	5.58	280	1.54	100.1	75
1015	6.0	200	31.55	18.36	5.59	292	1.41	104.1	45
1025	8.0	200	31.58	20.30	5.59	283	1.38	106.3	24
1035	10.0	200	31.60	16.08	5.52	288	1.25	122.6	18
1045	13.0	300	31.60	17.75	5.51	294	1.21	132.1	12
1050	14.5	300	31.60	17.78	5.50	291	1.20	136.9	8
1053	15.4	300	31.60	17.78	5.49	292	1.19	139.1	8
1056	16.3	300	31.60	17.74	5.48	291	1.18	141.7	5
Acceptance Criteria:					10%	10%	10%	10%	<10

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1100	BN-1+3-29-MW1303AS	40ML	2	HCL	VOC
		500ML	1	HNO_3	TAL Metal

Comments Peristaltic won't lift 31'. Grundfos acting like it's running out of H_2O but no drawdown.

Signature

9/20/06
Date

FIELD RECORD OF SURFACE WATER AND SEDIMENT SAMPLING

Project Name: NASB, ME LTM
Site: S 143
Project Number: 5700.007
Sample Location ID: SW7 / Sed 19
Date / Time: 9/14/06
ECC Personnel:

SURFACE WATER / LEACHATE SEEP INFORMATION

Type of S.W. ( ) Stream ( ) River ( ) Seep

Water Depth: 1.5'	Dissolved Oxygen (mg/L): 9.76
Velocity of Water: 1 fps	ORP (mV) -28.3
Temperature (C): 14.50	Specific Conductance (uS/cm^c): 193
pH (units): 6.72	Turbidity (NTU) 9.2

Sample Observations:
( ) Odor
( ) Color
( ) Other

SEDIMENT / LEACHATE SEEP SEDIMENT INFORMATION

Sed. Type: ( ) Organic ( ) Gravel ( ) Clay ( ) Silt ( ) Sand ( ) Other _____

Type of Samp. Collected: ( ) Discrete ( ) Composite

Sample Observations:
( ) Odor
( ) Color
( ) Other

SAMPLES COLLECTED

Sample Identification	Sample Location	Date / Time	Matrix Aqueous	Matrix Solid	Preservative	Number of Containers
BN-143-29-SW7	SW-7	9/14/06 1130	X		HCL/HNO3	3
BN-143-29-Sed19	Sed19	9/14/06 1205		X	None	5 MS/MSD
BN-143-29-Sed XD1	Sed	9/14/06 0000		X	None	2

Notes / Comments:

FIELD RECORD OF SURFACE WATER AND SEDIMENT SAMPLING

Project Name: NASB, ME LTM
Site: BN- 183 - SW 8
Project Number: 5700.007
Sample Location ID: BN 183-29 SW 8
Date / Time: 9/14/06 1255
ECC Personnel: MC PC

SURFACE WATER / LEACHATE SEEP INFORMATION

Type of S.W. (X) Stream ( ) River ( ) Seep

Water Depth: 12"	Dissolved Oxygen (mg/L): 9.86
Velocity of Water: 6" /sec	ORP (mV) -23.1
Temperature (C): 16.33	Specific Conductance (uS/cm^c): 184
pH (units): 6.64	Turbidity (NTU) 6.1

Sample Observations:
( ) Odor
( ) Color
( ) Other

SEDIMENT / LEACHATE SEEP SEDIMENT INFORMATION

Sed. Type: ( ) Organic ( ) Gravel ( ) Clay ( ) Silt ( ) Sand ( ) Other

Type of Samp. Collected: ( ) Discrete ( ) Composite

Sample Observations:
( ) Odor
( ) Color
( ) Other

SAMPLES COLLECTED

Sample Identification	Sample Location	Date / Time	Matrix Aqueous	Matrix Solid	Preservative	Number of Containers
BN 183 29 SW8	183 SW8	9/14/06 1255	X		HNO_3	1
BN 183 29 SW8	183 SW8	9/14/06 1255	X		HCl	3

Notes / Comments:

Locat.on Flooded

Page____ of____

FIELD RECORD OF SURFACE WATER AND SEDIMENT SAMPLING

Project Name: NASB, ME LTM
Site: 1.3
Project Number: 5700.007
Sample Location ID: SW9
Date / Time: 9/14/06 1305
ECC Personnel: Mark Carver, Geoff C. Paul L. (NES)

SURFACE WATER / LEACHATE SEEP INFORMATION

Type of S.W. (x) Stream ( ) River ( ) Seep

Water Depth: 1'	Dissolved Oxygen (mg/L): 10.32
Velocity of Water: 0	ORP (mV) -38.7
Temperature (C): 15.72	Specific Conductance (uS/cm^c): 300
pH (units): 6.74	Turbidity (NTU) 5.9

Sample Observations:
( ) Odor
( ) Color
( ) Other

SEDIMENT / LEACHATE SEEP SEDIMENT INFORMATION

Sed. Type: ( ) Organic ( ) Gravel ( ) Clay ( ) Silt ( ) Sand ( ) Other _____

Type of Samp. Collected: ( ) Discrete ( ) Composite

Sample Observations:
( ) Odor
( ) Color
( ) Other

SAMPLES COLLECTED

Sample Identification	Sample Location	Date / Time	Matrix Aqueous	Matrix Solid	Preservative	Number of Containers
BN 1.3 29 SW9	1.3 SW9	9/14/06 1320	X		HCl	2
BN 1.3 29 SW9	1.3 SW9	9/14/06 1320	X		HNO3	1

Notes / Comments:
- sample site flooded, sample taken from closest point

FIELD RECORD OF SURFACE WATER AND SEDIMENT SAMPLING

Project Name: NASB, ME LTM
Site: S 1+3
Project Number: 5700.007
Sample Location ID: SW 16 Sed 16
Date / Time: 9/14/06
ECC Personnel: MAC

SURFACE WATER / LEACHATE SEEP INFORMATION

Type of S.W. (X) Stream ( ) River ( ) Seep

Water Depth: 1' ±	Dissolved Oxygen (mg/L): 7.95
Velocity of Water: 2 fps	ORP (mV) -33.9
Temperature (C): 14.76	Specific Conductance (uS/cm^c): 171
pH (units): 6.82	Turbidity (NTU) 6

Sample Observations:
( ) Odor
( ) Color
( ) Other

SEDIMENT / LEACHATE SEEP SEDIMENT INFORMATION

Sed. Type: ( ) Organic ( ) Gravel ( ) Clay ( ) Silt (X) Sand ( ) Other _____

Type of Samp. Collected: ( ) Discrete ( ) Composite

Sample Observations:
( ) Odor
( ) Color Lt brown
( ) Other

SAMPLES COLLECTED

Sample Identification	Sample Location	Date / Time	Matrix Aqueous	Matrix Solid	Preservative	Number of Containers
BN-1+3-29-SW16	9/14/06 1335		X		HCL/HNO3	3
BN-1+3-29-Sed16	9/14/06 1340			X	None	2

Notes / Comments:

FIELD RECORD OF SURFACE WATER AND SEDIMENT SAMPLING

Project Name: NASB, ME LTM
Site: 1 & 3
Project Number: 5700.007
Sample Location ID: Sed 17
Date / Time: 9/14/06 10:05
ECC Personnel: Mark Carver, Geoff Cottines, Paul L (WeL)

SURFACE WATER / LEACHATE SEEP INFORMATION

Type of S.W. ( ) Stream ( ) River ( ) Seep

Water Depth: 1'	Dissolved Oxygen (mg/L): 9.56
Velocity of Water: 10 ft/min	ORP (mV) -43.4
Temperature (C): 13.64	Specific Conductance (uS/cm^c): 174
pH (units): 6.90	Turbidity (NTU) 30

Sample Observations:
( ) Odor
( ) Color
( ) Other

SEDIMENT / LEACHATE SEEP SEDIMENT INFORMATION

Sed. Type: ( ) Organic ( ) Gravel ( ) Clay ( ) Silt ( ) Sand ( ) Other _____

Type of Samp. Collected: (X) Discrete ( ) Composite

Sample Observations:
( ) Odor
( ) Color
( ) Other

SAMPLES COLLECTED

Sample Identification	Sample Location	Date / Time	Matrix Aqueous	Matrix Solid	Preservative	Number of Containers
BN-29-1&3-Sed 17	Sed 17	9/14/06 1010		X	None	2

Notes / Comments:

FIELD RECORD OF SURFACE WATER AND SEDIMENT SAMPLING

Project Name: NASB, ME LTM
Project Number: 5700.007
Date / Time: 9/14/06 10:17

Site: 1&3
Sample Location ID: SW4
ECC Personnel: Mark Carver, Geoff Cotkins, Paul C (Nel)

SURFACE WATER / LEACHATE SEEP INFORMATION

Type of S.W. (✓) Stream ( ) River ( ) Seep

Water Depth: 2"	Dissolved Oxygen (mg/L): 8.77
Velocity of Water: 10 ft/min	ORP (mV) -63.9
Temperature (C): 13.74	Specific Conductance (uS/cm°): 195
pH (units): 6.80	Turbidity (NTU) 9

Sample Observations:
( ) Odor
( ) Color
( ) Other

SEDIMENT / LEACHATE SEEP SEDIMENT INFORMATION

Sed. Type: ( ) Organic ( ) Gravel ( ) Clay ( ) Silt ( ) Sand ( ) Other

Type of Samp. Collected: ( ) Discrete ( ) Composite

Sample Observations:
( ) Odor
( ) Color
( ) Other

SAMPLES COLLECTED

Sample Identification	Sample Location	Date / Time	Matrix Aqueous	Matrix Solid	Preservative	Number of Containers
BN-1&3-29-SW4	SW4	9/14/06 1020	X		HNO_3	1
BN-1&3-29-SW-XD1	" "	9/14/06 0000	X		" "	1
BN-1&3-29-SW4/MS/MSD	" "	9/14/06 1020	X		" "	1
BN-1&3-29-SW4	" "	9/14/06 1020	X		HCl	2
BN-1&3-29-XD1	" "	9/14/06 0000	X		HCl	2
~~Notes / Comments:~~						
BN-1&3-29-SW4/MS/MSD	" "	9/14/06 1020	X		HCl	2

FIELD RECORD OF SURFACE WATER AND SEDIMENT SAMPLING

Project Name: NASB, ME LTM
Site: S1+3
Project Number: 5700.007
Sample Location ID: LT Seep 4
Date / Time: 9/14/06
ECC Personnel: PL, GC, MAC

SURFACE WATER / LEACHATE SEEP INFORMATION

Type of S.W. ( ) Stream ( ) River (X) Seep

Water Depth:	Dissolved Oxygen (mg/L):
Velocity of Water:	ORP (mV)
Temperature (C):	Specific Conductance (uS/cm^c):
pH (units):	Turbidity (NTU)

Sample Observations:
( ) Odor
( ) Color
( ) Other

SEDIMENT / LEACHATE SEEP SEDIMENT INFORMATION

Sed. Type: ( ) Organic ( ) Gravel ( ) Clay ( ) Silt (X) Sand ( ) Other

Type of Samp. Collected: ( ) Discrete ( ) Composite

Sample Observations:
( ) Odor
(X) Color dark brown
( ) Other

SAMPLES COLLECTED

Sample Identification	Sample Location	Date / Time	Matrix Aqueous	Matrix Solid	Preservative	Number of Containers
BN-1+3-29-Seep4	LT 4	9/14/06-1110	x		HCL, HNO3 + NONE	5
BN-1+3-29-LT4	LT 4	9/14/06 1115		x	MeOH, Na2 + NONE	MAC ~~5~~ 4

Notes / Comments:

No surface water at all ∴ no W.Q. readings

Water sample pumped from piezometer. Piezometer

FIELD RECORD OF SURFACE WATER AND SEDIMENT SAMPLING

Project Name: NASB, ME LTM
Site: S 1+3
Project Number: 5700.007
Sample Location ID: Leachate Seep 5
Date / Time: 9/14/06
ECC Personnel: PL, GC, MAC

SURFACE WATER / LEACHATE SEEP INFORMATION

Type of S.W. ( ) Stream ( ) River (x) Seep

Water Depth: 2"	Dissolved Oxygen (mg/L): 2.69
Velocity of Water:	ORP (mV) -113.7
Temperature (C): 11.79	Specific Conductance (uS/cm^c): 563
pH (units): 6.68	Turbidity (NTU) 110

Sample Observations:
( ) Odor
(x) Color Orange
( ) Other

SEDIMENT / LEACHATE SEEP SEDIMENT INFORMATION

Sed. Type: (x) Organic ( ) Gravel ( ) Clay ( ) Silt ( ) Sand ( ) Other

Type of Samp. Collected: ( ) Discrete ( ) Composite

Sample Observations:
( ) Odor
(x) Color orange
( ) Other

SAMPLES COLLECTED

Sample Identification	Sample Location	Date / Time	Matrix Aqueous	Matrix Solid	Preservative + None	Number of Containers
BN-1+3-29 LT-5	LT5	9/14/06 1040		x	Na2+MeOH	4
BN-1+3-29-Seep5	LT5	9/14/06 1045	x		HCl, HNO3 +None	5

Notes / Comments:

Piezometer dry - dipped liquid sample using dedicated jar

FIELD RECORD OF SURFACE WATER AND SEDIMENT SAMPLING

Project Name: NASB, ME LTM
Project Number: 5700.007
Date / Time: 9/14/06 1330

Site: 13 3
Sample Location ID: Sed / SW 15
ECC Personnel: Geoff C.
Paul L. (NES)

SURFACE WATER / LEACHATE SEEP INFORMATION

Type of S.W. (X) Stream ( ) River ( ) Seep

Water Depth: 1'	Dissolved Oxygen (mg/L): 9.92
Velocity of Water: 20 ft/Min	ORP (mV) -2.0
Temperature (C): 14.84	Specific Conductance (uS/cm°): 188
pH (units): 6.70	Turbidity (NTU) 38

Sample Observations:
( ) Odor
( ) Color
( ) Other

SEDIMENT / LEACHATE SEEP SEDIMENT INFORMATION

Sed. Type: ( ) Organic ( ) Gravel ( ) Clay ( ) Silt (X) Sand ( ) Other

Type of Samp. Collected: ( ) Discrete ( ) Composite

Sample Observations:
( ) Odor
( ) Color
( ) Other

SAMPLES COLLECTED

Sample Identification	Sample Location	Date / Time	Matrix Aqueous	Matrix Solid	Preservative	Number of Containers
BN-13-29-SW15	13 SW15	9/14/06 1330	X		HCL	2
" "	" "	" "	X		HNO3	1
BN-13-29-Sed15	" "	9/14/06 1335		X	NONE	2

Notes / Comments:

1335

FIELD RECORD OF SURFACE WATER AND SEDIMENT SAMPLING

Project Name: NASB, ME LTM
Site: 1 & 3
Project Number: 5700.007
Sample Location ID: Seep 3
Date / Time: 9/14/06 0945
ECC Personnel: Mark Carver, Geoff Cotkins, Paul L (Neil)

SURFACE WATER / LEACHATE SEEP INFORMATION

Type of S.W. ( ) Stream ( ) River (X) Seep

Water Depth: 0.1"	Dissolved Oxygen (mg/L): 0.88
Velocity of Water: 0	ORP (mV) ~114.5
Temperature (C): 12.82	Specific Conductance (uS/cm°): 565
pH (units): 6.50	Turbidity (NTU) 45

Sample Observations:
( ) Odor
( ) Color
( ) Other

SEDIMENT / LEACHATE SEEP SEDIMENT INFORMATION

Sed. Type: (X) Organic ( ) Gravel ( ) Clay ( ) Silt ( ) Sand ( ) Other _____

Type of Samp. Collected: (X) Discrete ( ) Composite

Sample Observations:
( ) Odor
( ) Color
( ) Other

SAMPLES COLLECTED

Sample Identification	Sample Location	Date / Time	Matrix Aqueous	Matrix Solid	Preservative	Number of Containers
BN-29-1&3-LT3	Seep 3	9/14/06 0950		X	None	1
" "	" "	" "		X	Sod Bi	2
" "	" "	" "		X	Meoh	1
BN-29-1&3-Seep 3	" "	9/14/06 1000	X		HCL	2 VOC
" "	" "	" "	X		None	2 pesticide
Notes / Comments: " "		" "	X		HNO_3	1 metal

- Peizometer ran dry - pesticide samples taken directly from seep

1000

FIELD RECORD OF SURFACE WATER AND SEDIMENT SAMPLING

Project Name: NASB, ME LTM
Site: BN- Site 143
Project Number: 5700.007
Sample Location ID: Site 143 Sed 18
Date / Time: 9/14/06 11 25
ECC Personnel: MC RC

SURFACE WATER / LEACHATE SEEP INFORMATION

Type of S.W. ( ) Stream ( ) River ( ) Seep

Water Depth: 12"	Dissolved Oxygen (mg/L): 9.99
Velocity of Water: 1' / sec	ORP (mV) -28.0
Temperature (C): 14.12	Specific Conductance (uS/cm^c): 185
pH (units): 6.51	Turbidity (NTU) 23

Sample Observations:
( ) Odor
( ) Color
( ) Other

SEDIMENT / LEACHATE SEEP SEDIMENT INFORMATION

Sed. Type: ( ) Organic ( ) Gravel (X) Clay ( ) Silt (X) Sand ( ) Other _____

Type of Samp. Collected: (X) Discrete ( ) Composite

Sample Observations:
( ) Odor
( ) Color
( ) Other

SAMPLES COLLECTED

Sample Identification	Sample Location	Date / Time	Matrix Aqueous	Matrix Solid	Preservative	Number of Containers
BN-143-29 Sed 18	BN 143 Sed 18	9/14/06/1125		X	None	2

Notes / Comments:

Page____ of ____

FIELD RECORD OF SURFACE WATER AND SEDIMENT SAMPLING

Project Name: NASB, ME LTM | Site: S1+3
Project Number: 5700.007 | Sample Location ID: LT Seep 9
Date / Time: 9/14/06 8e | ECC Personnel: MAC/EC/PL

SURFACE WATER / LEACHATE SEEP INFORMATION

Type of S.W. ( ) Stream ( ) River (X) Seep

Water Depth: .5"	Dissolved Oxygen (mg/L): 2.51
Velocity of Water: --	ORP (mV) -77.9
Temperature (C): 13.46	Specific Conductance (uS/cm°): 442
pH (units): 6.29	Turbidity (NTU) > 1000

Sample Observations:
( ) Odor
( ) Color
( ) Other

SEDIMENT / LEACHATE SEEP SEDIMENT INFORMATION

Sed. Type: (X) Organic ( ) Gravel ( ) Clay ( ) Silt ( ) Sand ( ) Other _____

Type of Samp. Collected: (X) Discrete ( ) Composite

Sample Observations:
( ) Odor
( ) Color
( ) Other

SAMPLES COLLECTED

Sample Identification	Sample Location	Date / Time	Matrix: Aqueous	Matrix: Solid	Preservative	Number of Containers
BN-1+3-29-Seep9	9/14/06 1150		x		NONE HCL, HNO_3	15
BN-1+3-29-XD1	9/14/06 0000		x		NONE HCL, HNO_3	5
BN-1+3-29-LT+9 ~~Sed~~ 9	9/14/06 1200			x	MeOH, Na_2, NONE	12

Notes / Comments: MAC

BN-1+3-29-LTXD1 9/14/06 0000 x MeOH, Na_2, NONE 4

These syringes suck out load!!!

FIELD RECORD OF SURFACE WATER AND SEDIMENT SAMPLING

Project Name: NASB, ME LTM
Site: 1 & 3
Project Number: 5700.007
Sample Location ID: Seep 1
Date / Time: 9/14/06
ECC Personnel: Mark Calver, Geoff Cotinos
Paul L (NEI)

SURFACE WATER / LEACHATE SEEP INFORMATION

Type of S.W. ( ) Stream ( ) River (X) Seep

Water Depth: 0.5"	Dissolved Oxygen (mg/L): 3.34
Velocity of Water: 0	ORP (mV) -21.5
Temperature (C): 12.65	Specific Conductance (uS/cm^c): 631
pH (units): 6.46	Turbidity (NTU) 2.7

Sample Observations:
( ) Odor
( ) Color
( ) Other

SEDIMENT / LEACHATE SEEP SEDIMENT INFORMATION

Sed. Type: (X) Organic ( ) Gravel ( ) Clay ( ) Silt ( ) Sand ( ) Other _____

Type of Samp. Collected: (X) Discrete ( ) Composite

Sample Observations:
( ) Odor
(X) Color - orange / Brown
( ) Other

SAMPLES COLLECTED

Sample Identification	Sample Location	Date / Time	Matrix Aqueous	Matrix Solid	Preservative	Number of Containers
BN1&3-29-seep1	seep 1	9/14/06 0910	X		HCL	2 VOC
BN-1&3-29-seep1	seep 1	9/14/06 0910	X		NONE	2 pesticide
BN-1&3-29-seep1	seep 1	9/14/06 0910	X		HNO3	1 Metals
BN-1&3-29-LT1	Seep 1	9/14/06 0925		X	NONE	1 metals
BN-1&3-29-LT1	Seep 1	9/14/06 0925		X	SOLOI	2
" "	Seep 1	9/14/06 0925		X	MeOH	1

Notes / Comments:

INSTRUMENT CALIBRATION LOG

Site 1 & 3

Project/Site Name ~~Eastern Plume~~ **Date** 9/14/06 **Weather** 70°, overcast

Calibrated By Geoff C. **Instrument** YSI 650 MDS, YSI 600 XLM **Serial Number** 05F1983 AC, 0150549 AC

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.448	20.02	
pH (7)	7.00	6.87	20.44	
pH (4)	4.00	3.93	20.41	
pH (10)	10.00	10.00	20.36	
ORP	240	241.5	20.19	
Dissolved Oxygen	100.2%	100.8%	19.98	
Barometric Pressure	770.2			

INSTRUMENT CALIBRATION LOG

Project/Site Name ~~Easter Plume~~ Site 1 & 3 **Date** 9/13/06 **Weather** 60's partly cloudy

Calibrated By Geoff C. **Instrument** YSI 650MDS YSI 6000XLM **Serial Number** 02H1015 AB 02D1015 AB

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.416	17.87	
pH (7)	7.00	6.98	19.21	
pH (4)	4.00	3.96	19.34	
pH (10)	10.00	10.08	18.22	
ORP	240.0	238.9	16.92	
Dissolved Oxygen	103.4	100.2 %	19.95	
Barometric Pressure	760.2			

INSTRUMENT CALIBRATION LOG

Project/Site Name ~~Eastern Plume~~ Site 193 **Date** 9/14/06 **Weather** 60's, Partly Cloudy

Calibrated By Geoff C. **Instrument** YSI 650MDS / YSI 600XLM **Serial Number** 04D8002AC / 01J0549AA

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.420	16.15	
pH (7)	7.00	6.95	16.26	
pH (4)	4.00	4.06	16.77	
pH (10)	10.00	10.01	16.98	
ORP	240	238.2	15.97	
Dissolved Oxygen	100.8%	101.0%	16.05	
Barometric Pressure	764.7			

INSTRUMENT CALIBRATION LOG

Project/Site Name_____ **Date** 9/14/06 **Weather**_____

Calibrated By Geoff C **Instrument** YSI 650MDS / YSI 600XLBM **Serial Number** 04D8002AC / 01J0849AA

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.382	23.22	
pH (7)	7.00	6.88	22.53	
pH (4)	4.00	3.83	22.41	
pH (10)	10.00	10.05	22.87	
ORP	240	240.8	22.81	
Dissolved Oxygen	100%	100.5%	22.56	
Barometric Pressure	761	764.1	19.98	

INSTRUMENT CALIBRATION LOG

Project/Site Name NASB ME **Calibrated By** Geoff Cotkins

Instrument/Serial Number	Pre-cal 1.0 (NTU)	Pre-cal 10 (NTU)	Post-cal 0 (NTU)	Post-cal 10 (NTU)	Date
Lamotte Turbidimeter 04168	1.0	10	1.0	10	9/8/06
Lamotte Turbidimeter 06075	1.0	10	1.0	10	9/8/06
Lamotte Turbidimeter 00568	1.0	10	1.0	10	9/8/06
Lamotte Turbidimeter 0837-3898	1.0	10	0.95	11	9/11/06
Lamotte Turbidimeter 4002-0703	1.0	10	1.0	11	9/11/06
Lamotte Turbidimeter 5729-0905	1.0	10	1.1	10	9/11/06
Lamotte Turbidimeter 5291-3504	1.0	10	0.95	9.6	9/12/06
Lamotte Turbidimeter 5729-0905	1.0	10	1.1	10	9/12/06
Lamotte Turbidimeter 0837-3898	1.0	10	1.0	10	9/12/06
Lamotte Turbidimeter 4002-0703	1.0	10	1.1	11	9/12/06
Lamotte Turbidimeter 5729-0905	1.0	10	1.1	10	9/13/01
Lamotte Turbidimeter 0837-3898	1.0	10	0.99	9.9	9/13/01

INSTRUMENT CALIBRATION LOG

Project/Site Name NASB Mt **Calibrated By** Geoff C.

Instrument/Serial Number	Pre-cal 1.0 (NTU)	Pre-cal 10 (NTU)	Post-cal 1.0 (NTU)	Post-cal 10 (NTU)	Date
Lamotte Turbidimeter 5291-3504	1.0	10	0.95	9.8	9/13/06
Lamotte Turbidimeter 4002-0703	1.0	10	1.0	10	9/13/06
Lamotte Turbidimeter 5291-3504	1.0	10	0.90	10	9/14/06
Lamotte Turbidimeter 4002-0703	1.0	10	1.3	9.8	9/14/06
Lamotte Turbidimeter 5729-0905	1.0	10	1.1	11	9/14/06
Lamotte Turbidimeter 0837-3898	1.0	10	1.0	10	9/14/06
Lamotte Turbidimeter 5291-3504	1.0	10	1.0	10	9/15/06
Lamotte Turbidimeter 4002-0703	1.0	10	Not	used	9/15/06
Lamotte Turbidimeter 5729-0905	1.0	10	1.0	11	9/15/06
Lamotte Turbidimeter 0837-3898	1.0	10	0.95	10	9/15/06
Lamotte Turbidimeter 0837-3898	1.0	10	1.0	9.8	9/18/06
Lamotte Turbidimeter 5729-0905	1.0	10	1.1	10	9/18/06

APPENDIX E.2

Eastern Plume

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CHAIN OF CUSTODY

Job #:

Control #:

Client Information

ıme Environmental Chemical Corporation

ldress 50 D'Angelo Drive

ty Marlborough, MA State 01752 Zip

ınd Report to: Jackson Kiker

ıone #: 508-229-2270

Facility Information

Project Name: Eastern Plume

Location: NASB Brunswick, Maine

Project No.: 5700.007

FAX #:

Analytical Information

Field ID / Point of Collection	Collection Date	Collection Time	Sampled By	Matrix	# of bottles	Preservation: voc hcl	NaOH	HNO3	H2So4	None	TCL VOC	GRAIN SIZE	TAL METALS, PESTICIDES	TOC
N-EP-29-SW10	9/8/06	1410		SW	2	X					X			
N-EP-29-SW11	9/8/06	1502		SW	2	X					X			
N-EP-29-SW13 MS/MSD	9/8/06	1448		SW	2	X					X			
N-EP-29-SW14	9/8/06	1445		SW	2	X					X			
N-EP-29-SW-XD1	9/8/06	0000		SW	2	X					X			
N-EP-29-SED11 *MS/MSD	9/8/06	1512		SED						X		X	*X	X
N-EP-29-SED-XD1	9/8/06	0000		SED	1					X			X	
N-EP-29-SEEP11 MS/MSD	9/8/06	1401		GW	6	X					X			
N-EP-29-SEEP-XD1	9/8/06	0000		GW	2	X					X			
N-EP-29-SEEP10	9/8/06	1400		GW	2	X					X			

Turnaround Information

- ☐ 21 Day Standard
- ☐ 14 Day
- ☐ 7 Days *EMERGENCY*
- ☐ Other _____ (Days)

Approved By: _____

RUSH TAT Is for FAX data

Data unless previously approved.

Data Deliverable Information

- ☐ NJ Reduced
- ☐ NJ Full
- ☐ FULL CLP
- ☐ Disk Deliverable
- ☐ Other (Specify) _____
- ☐ Commercial "A"
- ☐ Commercial "B"
- ☐ ASP Category B
- ☐ State Forms

Comments / Remarks

* MS/MSD FOR METALS AND PESTICIDES ONLY

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

Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
1	9/12/06 1210	1	2		2
Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
3		3	4		4
Relinquished by Sampler:	Date Time:	Received By:	Seal #	Preserved where applica	On Ice:
5		5		☐	☐

CHAIN OF CUSTODY

Job #:

Control #:

Client Information

ame Environmental Chemical Corporation

ddress 33 Boston Post Road West

ity Marlborough, MA State 01752 Zip

end Report to: Jackson Kiker

hone #: 508-229-2270

Facility Information

Project Name: Eastern Plume

Location: NASB Brunswick, Maine

Project No.: 5700.007

FAX #:

Analytical Information

Field ID / Point of Collection	Collection Date	Collection Time	Sampled By	Matrix	# of bottles	Preservation: voc hcl	NaOH	HNO3	H2So4	None	TCL VOC	1,4, DIOXANE
N-EP-29-MW338B	9/11/06	1507		GW	2	X					X	
N-EP-29-MW338B-M	9/11/06	1110		GW	2	X					X	
N-EP-29-MW338A	9/11/06	1312		GW	4	X				X	X	X
N-EP-29-MW338A-S	9/11/06	1105		GW	2	X					X	
N-EP-29-MW339	9/11/06	1450		GW	2	X					X	
N-EP-29-MW339-D	9/11/06	1300		GW	2	X					X	
N-EP-29-MW338C-M	9/11/06	1115		GW	2	X					X	
N-EP-29-MW338C	9/11/06	1230		GW	2					X		X
N-EP-29-RAW INFLUENT	9/7/06	1550		GW	2	X					X	
N-EP-29-COMB EFFLUENT ms/msd	9/7/06	1445		GW	12	X				X	X	X
N-EP-29-EFFLUENT-XD1	9/7/06	0000		GW	4	X				X	X	X

Turnaround Information

- ☐ 21 Day Standard — Approved By:
- ☐ 14 Day
- ☐ 7 Days *EMERGENCY*
- ☐ Other _____ (Days)

RUSH TAT is for FAX data
Data unless previously approved.

Data Deliverable Information

- ☐ NJ Reduced
- ☐ NJ Full
- ☐ FULL CLP
- ☐ Disk Deliverable
- ☐ Other (Specify)
- ☐ Commercial "A"
- ☐ Commercial "B"
- ☐ ASP Category B
- ☐ State Forms

Comments / Remarks

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

Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
1	9/12/06 1210	1	2		2
Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
3		3	4		4
Relinquished by Sampler:	Date Time:	Received By:	Seal #	Preserved where applica	On Ice:
5		5		☐	☐

CHAIN OF CUSTODY

Job #:

Control #:

Client Information

ıme Environmental Chemical Corporation

ıdress 33 Boston Post Road West

ty Marlborough, MA State 01752 Zip

ınd Report to: Jackson Kiker

ıone #: 508-229-2270

Facility Information

Project Name: Eastern Plume

Location: NASB Brunswick, Maine

Project No.: 5700.007

FAX #:

Analytical Information

Field ID / Point of Collection	Collection Date	Collection Time	Sampled By	Matrix	# of bottles	Preservation: voc hcl	NaOH	HNO3	H2So4	None	TCL VOC	1,4, DIOXANE
N-EP-29-MW331	9/12/06	1500		GW	2					X		X
N-EP-29-MW331-M	9/12/06	1400		GW	2	X					X	
N-EP-29-P111	9/12/06	1315		GW	2	X					X	
N-EP-29-MW330	9/12/06	1125		GW	2					X		X
N-EP-29-MW313-D	9/12/06	0945		GW	2	X					X	
N-EP-29-MW333-M	9/12/06	1245		GW	2	X					X	
N-EP-29-MW335-M	9/12/06	1310		GW	2	X					X	
N-EP-29-MW337-M	9/12/06	1256		GW	2	X					X	
N-EP-29-MW313 MS/MSD	9/12/06	1225		GW	6					X		X
N-EP-29-MW-XD3	9/12/06	0000		GW	2					X		X
N-EP-29-MW333	9/12/06	1430		GW	2					X		X
N-EP-29-MW335	9/12/06	1508		GW	2	X					X	
N-EP-29-MW337	9/12/06	1512		GW	2	X					X	

Turnaround Information

- ☐ 21 Day Standard — Approved By:
- ☐ 14 Day
- ☐ 7 Days *EMERGENCY*
- ☐ Other _____ (Days)

RUSH TAT is for FAX data

Data unless previously approved.

Data Deliverable Information

- ☐ NJ Reduced
- ☐ NJ Full
- ☐ FULL CLP
- ☐ Disk Deliverable
- ☐ Other (Specify) _____
- ☐ Commercial "A"
- ☐ Commercial "B"
- ☐ ASP Category B
- ☐ State Forms

Comments / Remarks

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

Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
1	9/14/06 1530	1	2		2
Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
3		3	4		4
Relinquished by Sampler:	Date Time:	Received By:	Seal #	Preserved where applica	On Ice:
5		5		☐	☐

CHAIN OF CUSTODY

Job #:

Control #:

Client Information

lame Environmental Chemical Corporation

ddress 33 Boston Post Road West

ity Marlborough, MA State 01752 Zip

end Report to: Jackson Kiker

hone #: 508-229-2270

Facility Information

Project Name: Eastern Plume

Location: NASB Brunswick, Maine

Project No.: 5700.007

FAX #:

Analytical Information

Field ID / Point of Collection	Collection Date	Collection Time	Sampled By	Matrix	# of bottles	Preservation: voc hcl	NaOH	HNO3	H2So4	None	TCL VOC	1,4, DIOXANE
3N-EP-29-MW229A	9/12/06	1051		GW	2					X		X
3N-EP-29-MW229B	9/12/06	1237		GW	2					X		X
3N-EP-29-EW1	9/12/06	0940		GW	2	X					X	
3N-EP-29-EW2A	9/12/06	1010		GW	2	X					X	
3N-EP-29-SW12	9/12/06	0925		SW	2	X					X	
3N-EP-29-MW306	9/13/06	1145		GW	2					X		X
3N-EP-29-P106	9/13/06	1000		GW	4	X				X	X	X
3N-EP-29-MW-XD5	9/13/06	0000		GW	4	X				X	X	X
3N-EP-29-QT1	9/14/06	0800		W	4	X				X	X	X

Turnaround Information

- ☐ 21 Day Standard — Approved By:
- ☐ 14 Day
- ☐ 7 Days *EMERGENCY*
- ☐ Other _____ (Days)

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Data unless previously approved.

Data Deliverable Information

- ☐ NJ Reduced
- ☐ NJ Full
- ☐ FULL CLP
- ☐ Disk Deliverable
- ☐ Other (Specify) _____
- ☐ Commercial "A"
- ☐ Commercial "B"
- ☐ ASP Category B
- ☐ State Forms

Comments / Remarks

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

Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
1	9/14/06 1530	1	2		2
Relinquished by Sampler: 3	Date Time:	Received By: 3	Relinquished By: 4	Date Time:	Received By: 4
Relinquished by Sampler: 5	Date Time:	Received By: 5	Seal #	Preserved where applica ☐	On Ice: ☐

CHAIN OF CUSTODY

Job #:

Control #:

Client Information

ame Environmental Chemical Corporation

ddress 33 Boston Post Road West

ity Marlborough, MA State 01752 Zip

end Report to: Jackson Kiker

hone #: 508-229-2270

Facility Information

Project Name: Eastern Plume

Location: NASB Brunswick, Maine

Project No.: 5700.007

FAX #:

Analytical Information

Field ID / Point of Collection	Collection Date	Collection Time	Sampled By	Matrix	# of bottles	Preservation: voc hcl	NaOH	HNO3	H2So4	None	TCL VOC	1,4, DIOXANE	TAL METALS, PESTICIDES
N-EP-29-MW212	9/18/06	1540		GW	2					X		X	
N-EP-29-MW212-S	9/18/06	1400		GW	2	X					X		
N-EP-29-MW332	9/18/06	1400		GW	2					X		X	
N-EP-29-MW319	9/18/06	1120		GW	2	X					X		
N-EP-29-MW332-M	9/18/06	1240		GW	2	X					X		
N-EP-29-MW-XD1	9/18/06	0000		GW	2	X					X		
N-EP-29-MW311-M MS/MSD	9/18/06	1200		GW	6	X					X		
N-EP-29-MW311-D	9/18/06	1210		GW	2	X					X		
N-EP-29-MW-XD2	9/18/06	0000		GW	2	X					X		
N-EP-29-QT2	9/19/06	0800		W	3	X				X	X	X	
N-EP-29-MW-QS1	9/19/06	0800		W	7	X		X	X	X	X	X	X

Turnaround Information

- [ ] 21 Day Standard — Approved By:
- [ ] 14 Day
- [ ] 7 Days *EMERGENCY*
- [ ] Other _____ (Days)

RUSH TAT is for FAX data
Data unless previously approved.

Data Deliverable Information

- [ ] NJ Reduced
- [ ] NJ Full
- [ ] FULL CLP
- [ ] Disk Deliverable
- [ ] Other (Specify)
- [ ] Commercial "A"
- [ ] Commercial "B"
- [ ] ASP Category B
- [ ] State Forms

Comments / Remarks

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

Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
1	9/19/06 1432		2		2
Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
3		3	4		4
Relinquished by Sampler:	Date Time:	Received By:	Seal #	Preserved where applica	On Ice:
5		5		☑	☑ 5.1°C

CHAIN OF CUSTODY

Accutest Job #:

Accutest Control #:

Client Information

Name: ECC

Address: 33 Boston Post Rd. West, Suite 340

City: Marlborough, MA State: 01752 Zip:

Send Report to: Jackson Kiker

Phone #: 508-229-2270

Facility Information

Project Name: Eastern Plume

Location: NASB Brunswick, Maine

Project No.: 5700.007.015.620

FAX #:

Analytical Information

Field ID / Point of Collection	Collection Date	Collection Time	Sampled By	Matrix	# of bottles	Preservation HCL	NaOH	HNO3	H2So4	None	VOC 8260B	TAL METALS	1,4-Dioxane								
BN-1&3-29-MW1303A-S	9/20/06	1100	MAC	GW	3	x		x			X	X									
BN-EP-29-MW336-S	9/20/06	1120	MAC	GW	2	x					X										
BN-EP-29-MW336	9/20/06	1212	MAC	GW	2	x					X										
BN-EP-29-MW315A-D	9/20/06	1228	MAC	GW	2	x					X										
BN-EP-29-MW230A-D	9/20/06	1300	MAC	GW	2	x					X										
BN-EP-29-MW205-D	9/20/06	1325	MAC	GW	2	x					X										
BN-EP-29-MW224-M	9/20/06	1355	MAC	GW	2	x					X										
BN-EP-29-MW224	9/20/06	1513	MAC	GW	8	x				x	X		X	MS/MSD on VOC only							
BN-EP-29-MW-XD1	9/20/06	0000	MAC	GW	2	x					X										
BN-EP-29-QT3	9/21/06	0940	MAC	Trip	4	x				x	X		X								
BN-EP-29-EW-5A	9/20/06	1540	MAC	GW	2	x					X										

Turnaround Information

- [ ] 21 Day Standard
- [x] 14 Day
- [ ] 7 Days *EMERGENCY*
- [ ] Other _____ (Days)

Approved By:

RUSH TAT is for FAX data

Data unless previously approved.

Data Deliverable Information

- [ ] NJ Reduced
- [ ] NJ Full
- [ ] FULL CLP
- [ ] Disk Deliverable
- [ ] Other (Specify)
- [ ] Commercial "A"
- [ ] Commercial "B"
- [ ] ASP Category B
- [ ] State Forms

Comments / Remarks

Temp Blank Included

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

Relinquished by Sampler:	Date Time:	Received By:	Relinquished By:	Date Time:	Received By:
1 Mark Q. Co	9/21/06 1600	1	2		2
Relinquished by Sampler: 3	Date Time:	Received By: 3	Relinquished By: 4	Date Time:	Received By: 4
Relinquished by Sampler:	Date Time:	Received By:	Seal #	Preserved where applica	On Ice:

EASTERN PLUME MONITORING WELL GAUGING SUMMARY FOR SEPTEMBER 2006

Well Designation	Well Riser Elevation (ft MSL)	Depth to Well Bottom (ft below top of well riser)	Depth to Water (ft below top of well riser)	Groundwater Elevation (ft MSL)
Shallow Monitoring Wells				
MW-105B	24.55	21.91	7.10	17.45
MW-106	51.26	37.27	16.90	34.36
MW-206B	42.77	27.17	14.88	27.89
MW-207B	22.9	9.21	6.60	16.3
MW-209	54.84	32.38	18.34	36.5
MW-222	57.43	45.34	21	36.43
MW-223	53.71	42.61	18.75	34.96
MW-224	57.63	46.01	20.18	37.45
MW-225B	46.25	42	15.10	31.15
MW-229B	30.08	33.14	15.13	14.95
MW-231B	46.31	37.99	22.50	23.81
MW-307	62.7	22.21	15.07	47.63
MW-318	24.28	25.14	6.03	18.25
MW-323 (F.M.)	55.9	39	13.1	42.8
MW-332	25.33	21.03	9.82	15.51
MW-1104	60.09	27.55	8.41	51.68
Deep Monitoring Wells				
MW-105A	24.19	47.75	artesian	#VALUE!
MW-205	45.99	79	21.32	24.67
MW-206A	43.02	74.36	15.01	28.01
MW-207A	Destroyed and replaced with MW-207AR			
MW-207AR	23.42	(a)	artesian	23.42
MW-208	49.4	102.8	14.78	34.62
MW-225A	45.95	76.03	13.88	32.07
MW-229A	33.83	64.97	11.11	22.72
MW-230A	36.32	81.49	12.94	23.38
MW-231A	45.41	61.19	18.63	26.78
MW-303	44.28	72.75	10.8	33.48
MW-305	43.09	53.51	12.41	30.68
MW-306	52.12	56.98	13.06	39.06
MW-310	53.39	73.25	23.67	29.72
MW-311	21.48	56.25	7.46	14.02
MW-312	35.97	71.15	10.51	25.46
MW-313	21.39	37.47	7.78	13.61
MW-315A			0.4	NA
MW-319	40.16	72.6	7.39	32.77
MW-330	35.71	36.36	2.04	33.67
MW-331	30.54	56.23	artesian	30.54
MW-333	27.25	42.85	9.25	18
MW-334	30.93	47.8	8.29	22.64
MW-335			17.36	NA

(a) MW-207AR has not been sounded for total depth.
NOTE: MSL = Mean sea level.

EASTERN PLUME (continued)
MONITORING WELL GAUGING SUMMARY FOR SEPT 2006

Well Designation	Well Riser Elevation (ft MSL)	Depth to Well Bottom (ft below top of well riser)	Depth to Water (ft below top of well riser)	Groundwater Elevation (ft MSL)	
Deep Monitoring Wells (continued)					
MW-336			11.14	NA	
MW-337			13.85	NA	
MW-338A			Artesian	NA	
MW-338B			Artesian	NA	
MW-338C			2.07	NA	
MW-339			1.23	NA	
MW-NASB-212	41.64	64.29	7.52	34.12	
Bedrock Monitoring Wells					
MW-308	37.7	73.25	2.01	35.69	
MW-309A	22.84	72.71	Artesian	22.84	
MW-309B	22.32	59.25	Artesian	22.32	
MW-316A	53.71	103.1	21.06	32.65	
MW-316B	54.4	57.85	11.65	42.75	
MW-317A	71.35	120.79	14.16	57.19	
MW-317B	70.1	96.95	12.93	57.17	
MW-323	55.9	39	7.52	48.38	
Shallow P-Series Piezometers					
P-103	60.35	28.75	19.35	41	
P-111	31.48	9.98	4.93	26.55	
P-121	50.78	17.35	15.40	35.38	
P-132	42.95	32.46	18.13	24.82	
Deep P-Series Piezometers					
PZ-1	47.88	58	23.37	24.51	
PZ-2	39.66	55.5	16.90	22.76	
PZ-6	33.14	55.6	12.90	20.24	
PZ-11	53.66	41.1	21.85	31.81	
P-105	42.08	70.35	5.87	36.21	
P-106	38.83	72.4	5.52	33.31	
P-123	ice damage to PVC riser, cannot gauge				
Extraction Wells					
EW-01	25.34	99.66	15.16	10.18	-3.96
EW-02A	22.27	66	27.27	-5	-3.61
EW-04	37.13	69.37	11.13	26	-7.01
EW-05A	37.63	82	10.27	27.36	-6.61

EASTERN PLUME (continued)
MONITORING WELL GAUGING SUMMARY FOR SEPT 2006

Well Designation	Well Riser Elevation (ft MSL)	Depth to Well Bottom (ft below top of well riser)	Depth to Water (ft below top of well riser)	Groundwater Elevation (ft MSL)
Deep EP-Series Piezometers				
EP-01	31.67	101.22	7.73	23.94
EP-02	29.74	99	6.18	23.56
EP-03	27.91	89.21	3.80	24.11
EP-04	32.59	91.11	1.80	30.79
EP-05	34.61	79.85		34.61
EP-06	40.14	83.51	8.10	32.04
EP-07	48.49	70.2	13.50	34.99
EP-08	47.31	80.38	12.11	35.2
EP-09	37.84	62.46	2.40	35.44
EP-10	37.78	57.73	2.62	35.16
EP-11	41.59	65.03	4.94	36.65
EP-12	49.38	69.61	12.22	37.16
EP-13	38.96	70.93	1.40	37.56
EP-14	43.46	80.05	6.05	37.41
EP-15	45.37	82.68	8.15	37.22
Surface Water Gauging Stations				
Well Designation	Gauging Point Elevation (ft MSL)		Depth to Water (ft below gauging point)	Surface Water Elevation (ft MSL)
GP-1A	25.39		2.22	27.61
GP-2A	23.92		1.50	25.42
GP-3B	31.15		0.22	31.15
GP-4A	17.68		submerged	#VALUE!
GP-5B	12.09		submerged	#VALUE!
GP-6A	7.46		2.6	10.06

Note: I assume GP-3B gauge point elevation is erroneous!

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: E. Plume
Location: NASB
Well ID: MW-224

Date: 9/20/06
Sampler: MAC
PID Reading: _____

Start Time: _____ **End Time:** _____
Well Construction: 2" PVC
Well Condition: OK
Depth to water: 20.60
Total Volume Removed (L) _____

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	04D8602AC
YSI	600XL	01J0849AA
LaMotte	2020	0837-3898

Time	volume removed (liters)	Flow Rate (ml/min)	drawdown (ft)	Temp (celsius)	pH (STD)	Cond (uS/cm)	DO (mg/L)	ORP (mV)	Turbidity (NTU)
1415	—	300	20.62	13.02	5.00	63	11.26	284.0	7
1425	3.0	300	20.60	12.04	5.57	66	11.29	194.4	10
1435	6.0	300	20.60	14.35	5.53	91	9.51	152.1	10
1445	9.0	300	20.60	15.05	5.45	118	8.45	148.4	7
1455	12.0	300	20.60	15.26	5.29	132	7.91	172.6	7
1505	15.0	300	20.60	15.33	5.33	135	7.66	175.8	6
1508	15.9	300	20.60	15.34	5.33	135	7.62	175.3	6
1511	16.8	300	20.60	15.37	5.34	136	7.56	174.5	6
Acceptance Criteria:					10%	10%	10%	10%	<10

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1513	BN-EP-29-MW 224	40ML	6	HCL	VOC MS/MSD
			2	NONE	1,4-DIOXANE
—	BN-EP-29-MW-XD1	40ML	2	HCL	VOC
	~~BN-EP-29-~~ MAC				

Comments

_____

Mark A. Co
Signature

9/20/06
Date

Environmental Chemical Corporation

Aqueous Diffusion Sampling Log

Project: Eastern Plume
Location: NASB, Brunswick, ME
Well ID: MW-311

Date: 9/18/06
Sampler: David C.
PID Reading: 0.0ppm

Well Construction: 2" PVC
Depth to water: 7.64'
Well Depth: 55.00'
Water Column: 47.36'

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	02A0841 AH
YSI	600XLM	00 61301 AB
Solinst	water meter	30016

Time	Temp (celsius)	pH (STD)	SPC uS/cm^c	DO (mg/L)	ORP (mV)	
12:20	8.72	6.62	283	0.68	-28	M
12:25	8.15	6.68	297	0.35	-66	D

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
12:00	BN-EP-29-MW311-M	40ml vial	2	HCl	VOC
12:10	BN-EP-29-MW311-D	40ml vial	2	HCl	VOC
12:00	BN-EP-29-MW311-MS	40ml vial	2	HCl	VOC
12:00	BN-EP-29-MW311-MSD	40ml vial	2	HCl	VOC
00:00	BN-EP-29-MW-XD2	40ml vial	2	HCl	VOC

Comments * MS, MSD, Field Dup collected at middle

Signature

9/18/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: E.P.
Location: NASB, Brunswick, ME
Well ID: Comb. Effluent

Date: 9/7/06
Sampler: MAC
PID Reading:

Start Time: **End Time:**
Well Construction:
Depth to water: —
Well Depth: —
Water Column:
Total Volume Removed (L)

Field Testing Equipment

Make	Model	Serial #
YSI	650 MDS	02H015AB
YSI	600XLBM	01J0849AC

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1545				14.64	7.43	173	10.05	64	<1	
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1445	BN-EP-29-Comb. Effluent	40ML	~~3~~ 6	HCL	VOC MS/MSD
	"	40 ML	6	None	1,4-Dioxane MS/MSD
—	BN-EP-29-Effluent XD1	40 ML	2	HCL	VOC
—	BN-EP-29-Effluent XD1	40ML	2	None	1,4-Dioxane

Comments

Mark A C
Signature

9/7/06
Date

Environmental Chemical Corporation

Aqueous Diffusion Sampling Log

Project: Eastern Plume
Location: NASB, Brunswick, ME
Well ID: MW-332

Date: 9/18/06
Sampler: David C.
PID Reading: 0.0ppm

Well Construction: 2" PVC
Depth to water: 9.97'
Well Depth: 21.05'
Water Column: 11.08'

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	02A0841 AH
YSI	600XLM	00G1301 AB
Solinst	water meter	30016

Time	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)
12:50	12.30	6.50	45	7.19	85

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
12:40	BN-EP-29-MW332-M	40ml vial	2	HCl	VOC
00:00	BN-EP-29-MW-XD4	40ml vial	2	HCl	VOC

Comments

Signature

9/18/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: Eastern Plume
Location: NASB, Brunswick, ME
Well ID: MW 212

Date: 9/18/06
Sampler: Geoff C.
PID Reading: 0

Start Time: 1430 **End Time:** 1530
Well Construction: 2" PVC
Depth to water: 8.09
Well Depth: 67.25
Water Column: 59.16
Total Volume Removed (L) 24

Field Testing Equipment

Make	Model	Serial #
YSI	650 MDS	04D8002AC
YSI	600 XLBM	01J0849
Lamotte	2020	5729-0905
Grundfos	Rediflo2	P19321377/

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1440	4	400	8.1	12.16	6.32	339	0.85	-33.7	52.8	Cloudy
1450	4	400	8.1	12.67	6.07	331	0.69	53.9	28.4	Cloudy
1500	4	400	8.1	12.72	5.97	328	0.59	53.6	19	clear
1510	4	400	8.1	12.81	6.02	329	0.51	94.5	12.2	clear
1520	4	400	8.1	12.85	6.02	330	0.48	102	4.16	Clear
1530	4	400	8.1	12.76	6.02	330	0.49	102.1	7.37	Clear
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1540	BNEP29MW212	40ml vial	2	NONE	Dioxane

Comments

Signature

9/18/06
Date

Environmental Chemical Corporation

Aqueous Diffusion Sampling Log

Project: Eastern Plume
Location: NASB, Brunswick, ME
Well ID: MW212

Date: 9/18/06
Sampler: Geoff C.
PID Reading: 0

Well Construction: 2" PVC
Depth to water: 8.09
Well Depth: 67.25
Water Column: 59.16

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	04D8002AC
YSI	600 XLM	01J0849

Time	Temp (celsius)	pH (STD)	SPC uS/cm^c	DO (mg/L)	ORP (mV)
1405	9.54	7.02	338	0.36	-41.4

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1400	~~BNA9~~				
	BNEP29MW212	40ml vial	2	HCL	VOC

Comments

Signature

9/18/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: Eastern Plume
Location: NASB, Brunswick, ME
Well ID: MW-332

Date: 9/18/06
Sampler: David C.
PID Reading: 0.0ppm

Start Time: 1258 **End Time:** 1400
Well Construction: 2" Grundfos
Depth to water: 9.98'
Well Depth: 21.05'
Water Column: 11.07'
Total Volume Removed (L) 19.84

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	02A0841 AH
YSI	600XLM	00G1301 AB
Lamotte	Turbidimeter	0837-3898
Redi-FIO	Controller	4740

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1300	0.64	320	10.35	14.37	6.71	60	7.82	88	95	cloudy
1310	3.2	320	10.36	14.44	6.05	49	7.00	128	14	clear
1320	3.2	320	10.36	14.78	5.92	47	6.90	153	3	clear
1330	3.2	320	10.36	14.66	5.90	48	6.82	163	1	clear
1340	3.2	320	10.36	14.57	5.87	47	6.78	168	1	clear
1350	3.2	320	10.36	14.86	5.88	47	6.78	173	1	clear
1355	1.6	320	10.36	15.00	5.87	47	6.75	182	1	clear
1400	1.6	320	10.36	15.01	5.86	47	6.76	182	1	clear
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1400	BN-EP-29-MW332	40ml vial	2	NONE	1,4 Dioxane

Comments

Signature

9/18/06
Date

Environmental Chemical Corporation

Aqueous Diffusion Sampling Log

Project: Eastern Plume
Location: NASB, Brunswick, ME
Well ID: MW-319

Date: 9/18/06
Sampler: David C.
PID Reading: 0.0ppm

Well Construction: 2" PVC
Depth to water: 7.71'
Well Depth: 72.09'
Water Column: 64.38'

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	02A0841 AH
YSI	600XLM	00G1301 AB
Solinst	water meter	30016

Time	Temp (celsius)	pH (STD)	SPC uS/cm^c	DO (mg/L)	ORP (mV)
11:30	8.39	6.31	350	1.44	160

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
11:20	BN-EP-29-MW319-D	40ml vial	2	HCl	VOC

Comments

Signature

9/18/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: Eastern Plume
Location: NASB, Brunswick, ME
Well ID: MW-306

Date: 9/13/06
Sampler: David C.
PID Reading: 0.0 ppm

Start Time: 1020 **End Time:** 1145
Well Construction: 2" Grundfos
Depth to water: 13.32'
Well Depth: 56.80'
Water Column: 43.48'
Total Volume Removed (L) 29.85

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	01A1431 AC
YSI	600XLM	02B30815 AB
Lamotte	Turbidimeter	5291-3504
Redi-Flo	Controller	220041

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1025	1.85	370	13.43	10.96	6.89	49	12.49	219	7	clear
1035	3.5	350	13.45	10.23	5.88	55	11.62	324	40	cloudy
1045	3.5	350	13.45	10.48	5.80	55	11.30	338	14	clear
1055	3.5	350	13.46	10.54	5.77	55	11.24	346	15	clear
1105	3.5	350	13.46	10.49	5.74	54	11.21	352	13	clear
1115	3.5	350	13.46	10.50	5.71	54	11.16	358	11	clear
1125	3.5	350	13.46	10.51	5.64	53	11.16	364	9	clear
1135	3.5	350	13.47	10.54	5.60	53	11.09	370	6	clear
1140	1.75	350	13.47	10.60	5.59	53	11.13	373	5	clear
1145	1.75	350	13.47	10.62	5.58	53	11.11	374	4	clear
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1145	BN-EP-29-MW306	40ml vial	2	None	1,4 Dioxane

Comments

Signature

9/13/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: BN-EP-29
Location: NASB, Brunswick, ME
Well ID: MW 333

Date: Sept 12 2006
Sampler: PC
PID Reading: 0.0

Start Time: 1255 **End Time:** 1435
Well Construction: 2" PVC
Depth to water: 9.59
Well Depth:
Water Column:
Total Volume Removed (L) 8.5

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	04D 8002AC
YSI	600XL	01J0849
Lamotte	2020	5729-0905

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm^c	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1305	0	.100	9.59	14.85	7.73	236	5.34	-50.2	14	
1315	1		10.16	11.92	7.51	233	3.30	-67.8	9.8	
1325	2		10.16	11.77	7.49	237	2.11	-85.5	23	
1345	4		10.16	11.85	7.62	245	1.74	-99.0	31	
1355	5		10.16	11.79	7.70	247	1.70	-115.5	21	
1405	6		10.16	11.74	7.74	240	0.97	-130.6	15	
1415	7		10.16	11.78	7.74	228	0.90	-133.1	11	
1425	8		10.16	11.78	7.72	219	0.89	-132.4	9.8	
1427			10.16	11.71	7.73	218	0.87	-131.2	9.7	
1430	8.5		10.16	11.73	7.74	217	0.88	-130.7	9.5	
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1430	BN-EP-29-MW333	40ml VOA	2	4°C	Dioxane

Comments

Signature

9/12/06
Date

Environmental Chemical Corporation

Aqueous Diffusion Sampling Log

Project: BN- EP- 29
Location: NASB, Brunswick, ME
Well ID: MW 333

Date: 12 Sept 2006
Sampler: [illegible]
PID Reading: 0.0

Well Construction: 2" PVC
Depth to water: 9.59
Well Depth:
Water Column:

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	04D8002AC
YSI	600XL	01J0849

Time	Temp (celsius)	pH (STD)	SPC uS/cm^c	DO (mg/L)	ORP (mV)
1250	7.82	8.18	296	0.56	-125.3

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1245	BN-EP-29-MW333M	40ml VOA	2	HCl	VOC

Comments

[illegible]
Signature

9/12/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: Eastern Plume
Location: NASB, Brunswick, ME
Well ID: MW-330

Date: 9/12/06
Sampler: David C.
PID Reading: 0.0ppm

Start Time: 10:32 **End Time:** 11:25
Well Construction: 2" Grund Fos
Depth to water: 1.40'
Well Depth: 36.69'
Water Column: 35.29'
Total Volume Removed (L) 21.1

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	01A1431 AC
YSI	600XLM	02B0815 AB
Lamotte	Turbidimeter	5291-3504
Grund Fos	Controller	9503

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
10:35	3.6	1200	6.22	9.98	7.62	106	1.18	220	16	clear
10:45	3.5	350	6.91	12.74	7.70	109	1.16	240	14	clear
10:55	3.5	350	6.94	13.78	7.77	110	0.91	252	12	clear
11:05	3.5	350	6.98	14.11	7.80	110	0.80	257	10	clear
11:15	3.5	350	7.05	14.40	7.83	111	0.71	259	8	clear
11:20	1.75	350	7.12	14.56	7.82	111	0.67	262	8	clear
11:25	1.75	350	7.16	14.64	7.81	111	0.65	264	7	clear
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
11:25	BN-EP-29-MW330	40ml vial	2	None	1,4 Dioxane

Comments

Signature

9/12/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: Eastern Plume
Location: NASB, Brunswick, ME
Well ID: P-106

Date: 9/13/06
Sampler: David C.
PID Reading: 0.0ppm

Start Time: 9:06 **End Time:** 10:00
Well Construction: 3/4" PVC
Depth to water: 5.76'
Well Depth: 72.08'
Water Column: 66.32'
Total Volume Removed (L) 12.96

Field Testing Equipment

Make	Model	Serial #
YSI	650mDS	01A1431 AC
YSI	600XLM	02B0815 AB
Lamotte	Turbidimeter	5291-3504
Geopump²	Peristaltic	06010

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm^c	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
9:10	0.96	240	—	10.75	7.86	128	10.73	-42	13	clear
9:20	2.40	240	—	10.28	7.12	117	9.99	119	36	cloudy
9:30	2.4	240	—	9.92	7.02	117	9.57	210	6	clear
9:40	2.4	240	—	9.70	6.99	117	9.32	245	2	clear
9:50	2.4	240	—	9.62	6.95	116	9.30	252	1	clear
9:55	1.2	240	—	9.59	6.94	116	9.26	258	1	clear
10:00	1.2	240	—	9.59	6.92	116	9.24	261	1	clear
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
10:00	BN-EP-29-P106	40ml vial	2	HCl	VOC
10:00	BN-EP-29-P106	40ml vial	2	None	1,4 Dioxane
00:00	BN-EP-29-MW-XD5	40ml vial	2	HCl	VOC
00:00	BN-EP-29-MW-XD5	40ml vial	2	None	1,4 Dioxane

Comments

- unable to collect Depth to water. water level probe will not fit in 3/4" well with tubing inside.

Signature

9/13/06
Date

Environmental Chemical Corporation

Aqueous Diffusion Sampling Log

Project: E. Plume
Location: NASB, Brunswick, ME
Well ID: MW-339

Date: 9/11/06
Sampler: MAC
PID Reading:

Well Construction: 2" PVC
Depth to water: 1.41
Well Depth:
Water Column:

Field Testing Equipment

Make	Model	Serial #
YSI	650 MDS	02H1015AB
YSI	600 XL	02D1015AB
Lamotte	2020	0837 3898

Time	Temp (celsius)	pH (STD)	SPC uS/cm^c	DO (mg/L)	ORP (mV)
1305	8.20	5.76	139	1.65	-51.7
1310	8.19	5.62	136	1.61	-53.7

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1300	BN-EP-29-MW-339-D	40 ML	3	HCL	VOC

Comments

Mark A. Co
Signature

9/11/06
Date

Environmental Chemical Corporation

Aqueous Diffusion Sampling Log

Project: E. Plume
Location: NASB, Brunswick, ME
Well ID: MW-338-C

Date: 9/11/06
Sampler: MAC
PID Reading: –

Well Construction: 2" PVC
Depth to water: 2.25'
Well Depth:
Water Column:

Field Testing Equipment

Make	Model	Serial #
YSI	650 MDS	02H1015AB
YSI	600XL	02D1015AB
Lamotte	2020	0837 3898

Time	Temp (celsius)	pH (STD)	SPC uS/cm^c	DO (mg/L)	ORP (mV)
1120	8.84	6.04	C1	8.80	105.3

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1115	BN-EP-29-MW338C	40ML	3	HCL	VOC

Comments

Signature

MAC ~~11/06/06~~ 9/11/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: E. Plume
Location: NASB, Brunswick, ME
Well ID: MW-338-C

Date: 9/11/06
Sampler: MAC
PID Reading: —

Start Time: _____ **End Time:** _____
Well Construction: 2" PVC
Depth to water: 0.50'
Well Depth: —
Water Column: _____
Total Volume Removed (L) _____

Field Testing Equipment

Make	Model	Serial #
YSI	650 MDS	02H1015 AB
YSI	600XL	02D1015 AB
Lamotte	2020	08370-3898

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm^c	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1200	4.3	430	2.39	10.33	6.19	61	9.75	165.6	23	
1210	~~12.98~~	430	2.39	10.43	6.43	62	9.73	167.7	22	
1220	9.9	430	2.39	10.42	6.52	61	9.74	176.0	13	
1223	11.28	430	2.39	10.43	6.63	62	9.71	180.6	9	
1226	12.47	430	2.39	10.41	6.66	62	9.62	182.0	7	
1229	13.76	430	2.39	10.42	6.69	61	9.64	186.2	9	
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1230	BN-EP-29-MW338C	40 ML	2	—	1,4 Dioxane

Comments At dead slow - pump is pumping 430 ML/MIN

Mark O Ca
Signature

9/11/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: E.P.
Location: NASB, Brunswick, ME
Well ID: GWETS Influent

Date: 9/7/06
Sampler: MAC
PID Reading: _____

Start Time: _____ **End Time:** _____
Well Construction: _____
Depth to water: _____
Well Depth: _____
Water Column: _____
Total Volume Removed (L) _____

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	02H615AB
YSI	600XLBM	01J0849 AC

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm^c	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1550				11.07	6.68	174	7.94	69	<2	
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1550	BN-EP-29-RAW INFLUENT	40ML	2	HCL	VOC

Comments

_____

Mark A Co
Signature

9/7/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: E. Plume
Location: NASB, Brunswick, ME
Well ID: MW-339

Date: 9/11/06
Sampler: MK
PID Reading: —

Start Time: _____ **End Time:** _____
Well Construction: 2" PVC
Depth to water: 1.41
Well Depth: _____
Water Column: _____
Total Volume Removed (L) _____

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	02H1015AB
YSI	600XL	02D1015AB
Lamotte	2020	0837 3898

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm^c	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1355	2.9	420	1.41	9.60	6.69	112	2.21	-76.8	130	
1400		420	1.77	10.21	6.26	109	1.14	-36.0	75	
1415		420	1.77	10.20	6.29	104	1.09	-32.1	19	
1425		420	1.77	10.40	6.09	104	0.97	-26.4	16	
1430		420	1.79	10.45	5.65	103	0.99	4.6	8	
1435		420	1.80	10.43	5.59	103	0.99	7.0	7	
1438		420	1.80	10.44	5.38	103	1.03	17.1	6	
1445		420	1.80	10.30	5.28	104	0.97	21.0	8	
1446		420	1.80	10.25	5.39	104	1.01	16.8	5	
1447		420	1.80	10.28	5.49	104	0.93	16.4	7	
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1450	BN-EP-29-MW339	40ML	2	HCL	VOC

Comments Pump Q = 420 ML/MIN @ slowest speed

Mark A. Cr
Signature

9/11/06
Date

Environmental Chemical Corporation

Aqueous Diffusion Sampling Log

Project: E. Plume
Location: NASB, Brunswick, ME
Well ID: MW-338AS

Date: 9/11/06
Sampler: MAC/GC
PID Reading: –

Well Construction: 2" PVC
Depth to water: 0.5'
Well Depth:
Water Column:

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	01B0583AR
YSI	600XL	01J0849
Lamotte	2020	Y0020703

Time	Temp (celsius)	pH (STD)	SPC uS/cm^C	DO (mg/L)	ORP (mV)
1100	8.34	8.55	1131	2.18	-129.6

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1105	BN-EP-29-MW-338AS	40ML	3	HCL	VOC

Comments

Signature

9/11/06
Date

Environmental Chemical Corporation

Aqueous Diffusion Sampling Log

Project: E. Plume
Location: NASB, Brunswick, ME
Well ID: MW-338-B

Date: 9/11/06
Sampler: MAC/GC
PID Reading:

Well Construction: 2" PVC
Depth to water: 0.5'
Well Depth:
Water Column:

Field Testing Equipment

Make	Model	Serial #
YSI	650 MDS	02H1015AB
YSI	600 XL	02D1015AB
Lamotte	2020	0837 3898

Time	Temp (celsius)	pH (STD)	SPC uS/cm[C]	DO (mg/L)	ORP (mV)
1107	8.00	8.24	122	0.21	-117.8

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1110	BN-EP-29-MW338B-M	40ML	3	HCL	VOC

Comments

Mark A Ca
Signature

9/11/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: Eastern Plume
Location: NASB, Brunswick, ME
Well ID: (EP) MW 338A

Date: 9/11/06
Sampler: Geoff Cokines
PID Reading: 0

Start Time: 1200 **End Time:** 1310
Well Construction: 2" PVC
Depth to water: 0.5"
Well Depth: ±100'
Water Column:
Total Volume Removed (L) 69

Field Testing Equipment

Make	Model	Serial #
YSI	650 MDS	01B0583AC
YSI	600 XL-D-TB	01J0849
LaMotte	2020 turbidimeter	4002 0703

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1210	~~2~~ 2	200	0.5	10.26	8.17	1085	1.82	-39.2	81.4	cloudy
1220	4	~~200~~	0.5	10.16	8.17	1089	1.64	-50.5	69.5	cloudy
1230	6	200	0.5	10.09	8.15	1088	1.74	-56.5	47.0	cloudy
1240	8	200	0.5	10.03	8.15	1088	1.84	-66.1	26.8	clear
1250	10	200	0.5	10.03	8.15	1088	1.84	-66.1	21.4	clear
1300	12	200	0.5	10.00	8.15	1088	1.69	-70.0	9	clear
1305	13	200	0.5	10.02	8.14	1088	1.68	-70.0	8.79	clear
1310	14	200	0.5	10.00	8.14	1088	1.68	-70.0	8.27	clear
~~1315~~	~~15~~	~~200~~ (GC)								
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1312	BN-EP-29-MW338A	40ml vial	2	None	Dioxane
1312	BN-EP-29-MW338A	40ml vial	2	HCL	VOC

Comments

Signature

9/11/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: Eastern Plume
Location: NASB, Brunswick, ME
Well ID: MW338B

Date: 9/11/06
Sampler: Geoff Cotchis
PID Reading: 0

Start Time: 1350 **End Time:** 1505
Well Construction: 2" pvc
Depth to water: 0.6
Well Depth:
Water Column:
Total Volume Removed (L) 84

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	01B0583AR
YSI	600 XL-B-M	01J0849
Lamotte	2020 Turbidimeter	4002 0703

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1400	2	200	0.6	10.42	7.43	120	0.51	-6.8	51.8	clear
1410	4	200	0.6	10.53	7.44	120	0.50	-78.7	45.9	Clear
1420	6	200	0.6	10.39	7.44	120	0.49	-104.0	26.8	Clear
1430	8	200	0.6	10.48	7.45	120	0.49	-104.0	26.0	Clear
1440	10	200	0.6	10.70	7.45	120	0.48	-71.0	14.2	clear
1450	12	200	0.6	10.50	7.45	120	0.48	-71.0	11.6	Clear
1455	13	200	0.6	10.61	7.44	120	0.48	-72.0	9.6	clear
1500	14	200	0.6	10.55	7.44	120	0.48	-72.0	9.2	Clear
1505	15	200	0.6	10.51	7.44	120	0.48	-72.0	8.48	Clear
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1507	BNJ-EP-29-MW338B	40ml vial	2	HCL	VOC

Comments

Signature

9/11/06
Date

Environmental Chemical Corporation

Aqueous Diffusion Sampling Log

Project: Eastern Plume
Location: NASB, Brunswick, ME
Well ID: MW-331

Date: 9/12/06
Sampler: David C.
PID Reading: 0.0ppm

Well Construction: 2" PVC
Depth to water: 0.0'
Well Depth: 54.63'
Water Column: 54.63'

Field Testing Equipment

Make	Model	Serial #
YSI	650MDS	01A1431 AC
YSI	600XLM	02B0815 AB
Solinst	water level	37389

Time	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)
unable to collect.					

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1400	BN-EP-29-MW331-M	40ml vial	2	HCl	VOC

Comments

* unable to collect parameters due to pvc well damage 1' below riser. water must of frozen between casing and well. YSI will not fit. Reference Low flow sheet for parameters.

* Artisian well.

Signature

9/12/06
Date

Environmental Chemical Corporation

Low Flow/Low Stress Groundwater Sampling Log

Project: Eastern Plume
Location: NASB, Brunswick, ME
Well ID: P-111

Date: 9/12/06
Sampler: David C.
PID Reading: 0.0ppm

Start Time: 1212 **End Time:** 1315
Well Construction: 3/4" Peristaltic
Depth to water: 5.33'
Well Depth: 9.88'
Water Column: 4.55'
Total Volume Removed (L) 11.58

Field Testing Equipment

Make	Model	Serial #
YSI	650 MDS	01A1431 AC
YSI	600XLM	02B0815 AB
Lamotte	Turbidimeter	5291-3504
Geopump[2]	Peristaltic	06010

Time	volume removed (liters)	Flow Rate (ml/min)	Depth To Water (ft)	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)	Turbidity (NTU)	color
1215	0.78	260	—	14.48	6.85	133	7.09	277	340	Grey
1225	1.8	180	—	13.78	6.52	130	2.85	281	24	clear
1235	1.8	180	—	13.72	6.50	128	1.56	290	9	clear
1245	1.8	180	—	13.77	6.50	127	1.15	297	5	clear
1255	1.8	180	—	13.65	6.50	126	0.85	304	3	clear
1305	1.8	180	—	13.63	6.50	125	0.72	312	2	clear
1310	0.9	180	—	13.68	6.47	125	0.70	315	2	clear
1315	0.9	180	—	13.67	6.45	125	0.66	316	2	clear
Acceptance Criteria:					10%	10%	10%	10%	<10	

2" screen volume = 0.163 gal/ft or 616 ml per foot

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
1315	BN-EP-29-P111	40ml vial	2	HCl	VOC

Comments

- unable to collect Depth to water due to well being 3/4". water level indicator will not fit with tubing inside.

Signature

9/12/06
Date

Environmental Chemical Corporation

Aqueous Diffusion Sampling Log

Project: BN- EP-29
Location: NASB, Brunswick, ME
Well ID: MW-313

Date: Sept 12 2006
Sampler: P Lynch
PID Reading: 0.0

Well Construction: 2" PVC
Depth to water: 8.26
Well Depth:
Water Column:

Field Testing Equipment

Make	Model	Serial #
YSI	650 MDS	04D8002 AC
YSI	600 XL	01J0849

Time	Temp (celsius)	pH (STD)	SPC uS/cm[c]	DO (mg/L)	ORP (mV)
0948	7.8	8.17	272	0.27	-114.9

Sample Collection

Time	Sample ID	Container	# of Bottles	Preservative	Analyses
0945	BN-EP-29-MW-313-D	40 ml VOA	2	HCl	VOC

Comments

Signature

Sept 12 2006
Date

INSTRUMENT CALIBRATION LOG

Project/Site Name Eastern Plume **Date** 9/11/06 **Weather** 60°, clear sky

Calibrated By David C. **Instrument** YSI 650 MDS, YSI 600 XLM **Serial Number** 01B0583 AR, ~~[illegible]~~ 0150849 AC

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.442	19.22	
pH (7)	7.00	6.88	19.30	
pH (4)	4.00	4.00	19.32	
pH (10)	10.00	10.05	19.11	
ORP	240	250	19.08	
Dissolved Oxygen	101.5%	101.7%	18.71	
Barometric Pressure	771.8			

INSTRUMENT CALIBRATION LOG

Project/Site Name NASB ME (easterly plume) **Date** 9/11/06 **Weather** 60°F, Clear Sky

Calibrated By Geoff Cokings **Instrument** YSI 650 MDS ~~0241015~~ CC 600XL-B-M ~~0150549~~ CC **Serial Number** 0241015 AB ~~[illegible]~~ 0201015

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.412	20.01	
pH (7)	7.00	6.90	19.20	
pH (4)	4.00	4.01	19.11	
pH (10)	10.00	10.02	18.05	
ORP	240.0	245.5	18.10	
Dissolved Oxygen	100%	101.2%	18.03	
Barometric Pressure	771.4			

INSTRUMENT CALIBRATION LOG

Project/Site Name Eastern Plume **Date** 9/12/06 **Weather** 70°, clear sky

Calibrated By Geoff Gokinos **Instrument** YSI 650 MDS / YSI 600 XLM **Serial Number** 01B058518 / ~~02D10154B~~ / 01J0849AC

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.410	20.09	
pH (7)	7.00	7.03	20.10	
pH (4)	4.00	3.97	20.15	
pH (10)	10.00	9.97	20.10	
ORP	240	237.4	20.10	
Dissolved Oxygen	100%	101.0%	20.18	
Barometric Pressure	770.2			

INSTRUMENT CALIBRATION LOG

Project/Site Name Eastern Plume **Date** 9/12/06 **Weather** 70°, clear sky

Calibrated By David C. **Instrument** YSI 650MDS, YSI 600XLM **Serial Number** 04D8002 AC, 01J0949 AA

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.406	20.53	
pH (7)	7.00	7.01	20.40	
pH (4)	4.00	4.03	20.73	
pH (10)	10.02	10.08	20.00	
ORP	240	239.7	23.22	
Dissolved Oxygen	102.1%	101.3%	20.87	
Barometric Pressure	775.9			

INSTRUMENT CALIBRATION LOG

Project/Site Name Eastern Plume **Date** 9/12/06 **Weather** 70°, clear sky

Calibrated By Geoff Cokinos **Instrument** YSI 650 MDS 600XL-BM **Serial Number** 02H1015 AB 02D1015

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.409	20.64	
pH (7)	7.00	7.05	20.15	
pH (4)	4.00	3.74	20.20	
pH (10)	10.00	9.93	20.20	
ORP	240.0	238.3	20.25	
Dissolved Oxygen	100 %	99.3%	20.68	
Barometric Pressure	770.1			

INSTRUMENT CALIBRATION LOG

Project/Site Name Eastern Plume **Date** 9/13/06 **Weather** 60's overcast

Calibrated By David C. **Instrument** YSI 650MDS / YSI 600XLM **Serial Number** 04D8002AC / 01J0849AA

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.391	20.38	
pH (7)	7.00	6.99	20.65	
pH (4)	4.00	4.16	20.86	
pH (10)	10.01	10.17	20.62	
ORP	240	242.5	20.27	
Dissolved Oxygen	101.3%	101.490	19.80	
Barometric Pressure	770.1			

INSTRUMENT CALIBRATION LOG

Project/Site Name Eastern Plume **Date** 9/13/06 **Weather** 60's overcast

Calibrated By David C. **Instrument** YSI 650 MDS / YSI 600XLM **Serial Number** 02H1015 AB / 02D1015 AB

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.417	20.51	
pH (7)	7.00	6.99	20.70	
pH (4)	4.00	4.13	20.62	
pH (10)	9.99	9.97	20.43	
ORP	240	239.4	20.51	
Dissolved Oxygen	100.5%	100.2%	20.37	
Barometric Pressure	764.2			

INSTRUMENT CALIBRATION LOG

Project/Site Name Eastern Plume **Date** 9/13/06 **Weather** 60's overcast

Calibrated By David C. **Instrument** YSI 650 MDS / YSI 600XLM **Serial Number** 05F1983AC / 01J0849 AC

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.425	20.08	
pH (7)	7.00	7.08	20.41	
pH (4)	4.00	4.15	20.32	
pH (10)	9.99	10.09	20.12	
ORP	240	240.1	20.16	
Dissolved Oxygen	101.3%	101.7%	19.76	
Barometric Pressure	770.2			

INSTRUMENT CALIBRATION LOG

Project/Site Name Eastern Plume **Date** 9/13/06 **Weather** 70°, Partly Cloudy

Calibrated By David C. **Instrument** YSI 650 MDS / YSI 600XLM **Serial Number** 01A1431 AC / 02B0815 AB

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.409	20.43	
pH (7)	7.00	6.98	20.73	
pH (4)	4.00	3.99	20.73	
pH (10)	10.00	10.07	20.71	
ORP	240	239.2	20.42	
Dissolved Oxygen	100.7%	101.2%	20.21	
Barometric Pressure	765.2			

INSTRUMENT CALIBRATION LOG

Project/Site Name Eastern Plume **Date** 9/18/06 **Weather** 60's partly Cloudy

Calibrated By Geoff C. **Instrument** YSI 650 MDS YSI 600XLBM **Serial Number** 04D8002AC 01J0849AA

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.360	20.49	
pH (7)	7.00	6.97	20.50	
pH (4)	4.00	3.98	20.42	
pH (10)	10.00	10.10	20.60	
ORP	240.0	238.2	20.66	
Dissolved Oxygen	~~[illegible]~~ 100.4%	100.0%	20.70	
Barometric Pressure	762.8			

INSTRUMENT CALIBRATION LOG

Project/Site Name Eastern Plume **Date** 9/18/06 **Weather** 60's partly Cloudy

Calibrated By Geoff C. **Instrument** YSI 650MDS, YSI 600 XLBM **Serial Number** 02H/015 AB, 02D/015 AB

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.421	20.49	
pH (7)	7.00	6.94	20.41	
pH (4)	4.00	4.06	20.45	
pH (10)	10.00	9.89	20.59	
ORP	240	236	20.64	
Dissolved Oxygen	100.6 %	100.9 %	20.70	
Barometric Pressure	756.6			

INSTRUMENT CALIBRATION LOG

Project/Site Name NASB ME **Calibrated By** Geoff Cotkins

Instrument/Serial Number	Pre-cal 1. 0 (NTU)	Pre-cal 10 (NTU)	Post-cal 0 (NTU)	Post-cal 10 (NTU)	Date
Lamotte Turbidimeter 04168	1.0	10	1.0	10	9/8/06
Lamotte Turbidimeter 06075	1.0	10	1.0	10	9/8/06
Lamotte Turbidimeter 00568	1.0	10	1.0	10	9/8/06
Lamotte Turbidimeter 0837-3898	1.0	10	0.95	11	9/11/06
Lamotte Turbidimeter 4002-0703	1.0	10	1.0	11	9/11/06
Lamotte Turbidimeter 5729-0905	1.0	10	1.1	10	9/11/06
Lamotte Turbidimeter 5291-3504	1.0	10	0.95	9.6	9/12/06
Lamotte Turbidimeter 5729-0905	1.0	10	1.1	10	9/12/06
Lamotte Turbidimeter 0837-3898	1.0	10	1.0	10	9/12/06
Lamotte Turbidimeter 4002-0703	1.0	10	1.1	11	9/12/06
Lamotte Turbidimeter 5729-0905	1.0	10	1.1	10	9/13/01
Lamotte Turbidimeter 0837-3898	1.0	10	0.99	9.9	9/13/01

INSTRUMENT CALIBRATION LOG

Project/Site Name NASB Mt **Calibrated By** Geoff C.

Instrument/Serial Number	Pre-cal 1.0 (NTU)	Pre-cal 10 (NTU)	Post-cal 1.0 (NTU)	Post-cal 10 (NTU)	Date
Lamotte Turbidimeter 5291-3504	1.0	10	0.95	9.8	9/13/06
Lamotte Turbidimeter 4002-0703	1.0	10	1.0	10	9/13/06
Lamotte Turbidimeter 5291-3504	1.0	10	0.90	10	9/14/06
Lamotte Turbidimeter 4002-0703	1.0	10	1.3	9.8	9/14/06
Lamotte Turbidimeter 5729-0905	1.0	10	1.1	11	9/14/06
Lamotte Turbidimeter 0837-3898	1.0	10	1.0	10	9/14/06
Lamotte Turbidimeter 5291-3504	1.0	10	1.0	10	9/15/06
Lamotte Turbidimeter 4002-0703	1.0	10	not	used	9/15/06
Lamotte Turbidimeter 5729-0905	1.0	10	1.0	11	9/15/06
Lamotte Turbidimeter 0837-3898	1.0	10	0.95	10	9/15/06
Lamotte Turbidimeter 0837-3898	1.0	10	1.0	9.8	9/18/06
Lamotte Turbidimeter 5729-0905	1.0	10	1.1	10	9/18/06

INSTRUMENT CALIBRATION LOG

Project/Site Name Eastern Plume **Date** 9/18/06 **Weather** 60's partly Cloudy

Calibrated By Geoff C. **Instrument** YSI 650 MDS / YSI 600XLBM **Serial Number** 04D8002AC / 01J0849AA

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.360	20.49	
pH (7)	7.00	6.97	20.50	
pH (4)	4.00	3.98	20.42	
pH (10)	10.00	10.10	20.60	
ORP	240.0	238.2	20.66	
Dissolved Oxygen	~~[illegible]~~ 100.4%	100.0%	20.70	
Barometric Pressure	762.8			

INSTRUMENT CALIBRATION LOG

Project/Site Name Eastern Plume **Date** 9/18/06 **Weather** 60's partly Cloudy

Calibrated By Geoff C. **Instrument** YSI 650MDS YSI 600 XLBM **Serial Number** 02H1015 AB 02D1015 AB

Parameters	Pre-calibration Reading	Post-calibration Reading	Temperature °C	Comments
Conductivity	1.413	1.421	20.49	
pH (7)	7.00	6.94	20.41	
pH (4)	4.00	4.06	20.45	
pH (10)	10.00	9.89	20.59	
ORP	240	236	20.64	
Dissolved Oxygen	100.6 %	100.9 %	20.70	
Barometric Pressure	756.6			

APPENDIX F

Engineering Inspection Report

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ENGINEERING INSPECTION REPORT
SITES 1 AND 3

Inspector: **Darren Gainer, Maine PG #371**

Weather: **Sunny, clear, breezy**

Date: **22 September 2006**

1. ***Inspection of ground surface for exposure of geotextile cover (cap erosion):***

   The existing vegetation is well-established grasses and there were no indications of erosion which would result in exposure of the geotextile cover.

2. ***Inspection of ground surface for differential settlement resulting in soil cracking or ponded water:***

   No depressions or soil cracking was noted during the inspection. The landfill cap is sloped and all drainage structures are intact and appear to be functioning as designed. Culverts and catch basins are functioning as designed with no evidence of ponded water. (See photo)

3. Identification of stressed vegetation:

There were no indications of stressed vegetation on or around the landfill cap. Vegetation, consisting mostly of long grasses and wild flowers, was thick and appeared healthy during the inspection. NASB public works department mowed the cap about mid-summer.

4. Identification of seeps, rooted vegetation (trees), and/or animal burrows:

Small shrubs and milkweeds were noted in mounding adjacent to landfill gas vent concrete encasements and on the surface of concrete encasements. There were no deeply rooted shrubs or trees on the slope of the landfill. There were no seeps observed. The number of small animal burrows (rodent holes) in the soil in and around monitoring well casings is increasing on the landfill cap. There were no obvious indications of large animal burrows on the cap. Because monitoring wells are encased in concrete above the ground surface the shrubs and burrows do not present an imminent risk to cap maintenance.

5. Identification of deteriorating equipment (i.e., gas probes, monitoring wells, piezometers, fencing, or drainage structures):

Three pairs of nested monitoring wells were installed this year by ECC. All wells are properly identified and protected from potential collision damage. (See photo)

The storm drain conducting Mere Brook under the main Weapons Area road remains partially blocked by accumulated flotsam and jetsam. The resultant ponding has impacted the LTM sampling effort, preventing access to at least one sample location during each of the last two sample events. NASB Environmental and Public Works have been informed of this condition.

All gas vent structures and gas probes are intact and appear to be functioning properly. There were no disruptions of the stone revetment.(see photo below)

6. Inspection of parking lots, access roads, and pavement structures.

The access road is in satisfactory condition. The previously reported deep tire tracks on the cap access ramp have been filled and the native grasses are thriving. (see picture below)

There are no other pavement structures or parking lots on the landfill cap.

7. ***Inspection of south slope along Mere brook for the presence of erosion or sloughing.***

   The slope along Mere Brook is in good shape. There were no indications of sloughing or erosion. Vegetation was thick and well established.

Summary: Overall landfill cap and appurtances are in good conditions. No corrective actions are recommended at this time.

Signature: _____ Date: 22 September 2006

DATA VALIDATION MEMORANDUM
NAS BRUNSWICK SITE EASTERN PLUME
SEPTEMBER 2006 SAMPLING ROUND 29 (SDG M59141)

TO: ENGINEERING FACILITY COMMAND NORTHEAST

FROM: JACKSON KIKER, ECC SENIOR CHEMIST, MARLBOROUGH, MA

SUBJECT: NAS BRUNSWICK SITE EASTERN PLUME MONITORING EVENT 29

DATE: 11/1/2006

Project data were validated using the following Validation Functional Guidelines, as modified for non-CLP methods and project-specific QAPP measurement performance criteria (MPC):

1. Region I, EPA-NE Data Validation Functional Guidelines for Evaluation of Environmental Analyses (Dec, 1996),

2. National Functional Guidelines for Evaluation Inorganic Analysis (1988), and

3. National Functional Guidelines for Evaluation Organic Analysis (October 1999).

The data were assessed against the MPC listed in the approved Site 1& 3 and Eastern Plume LTMP QAPP (May 2000). The QAPP MPC and validation guideline exceedences are assessed and documented on the method/QAPP specific data validation worksheets. On these data validation worksheets the data quality acceptance criteria are presented, analytes requiring qualification based on MPC and/or validation guidance criteria exceedences are listed, assigned qualifiers, qualifying rationale is documented, and any potential bias noted. The overall evaluation of the data generated by a method is presented in the data validation worksheet.

Standard EPA Region I data qualifiers are used to denote the assessment of data quality. The final and ranking assigned data qualifier for an analyte is presented in the data summary table. Ancillary qualifiers are noted on the data validation worksheets.

The USEPA Region I Organic Regional Data Assessment (ORDA) sheet displays the summarized results of the data validation assessment for all analytical methods reported in the SDG.

ACRONYMS AND ABBREVIATIONS

Following is a list of acronyms and abbreviations that may be used in the data validation reports.

Acronym or Abbreviation	Definition
%D	Percent difference
%R	Percent recovery
%M	Percent moisture
%S	Percent solids
Ug/L	Microgram per liter
BD	Breakdown
BEHP	2-bis(ethylhexyl)phthalate
BFB	Bromofluorobenzene
CCB	Continuing calibration Blank
CCC	Continuing Check Compound
CCV	Continuing Calibration Verfication
COC	Chain of custody
CRI	standard at RL for ICP
CVAA	Cold vapor atomic absorption
DFTPP	Decafluorotriphenylphosphine
DQO	Data quality objective
EB	Equipment blank
EPA	Environmental Protection Agency
FD	Field duplicate
GC	Gas Chromatography
GC/MS	Gas chromatography/mass spectrometry
HT	Holding time
ICAL	Initial calibration
ICS-A/AB	Interelement check standard A or AB
ICV	Initial calibration verification
IDL	Instrument detection limit
IS	Internal standards
LCL	Lower control limit
LCS	Laboratory control sample
LTMP	Long term monitoring plan
MeCl	Methylene chloride
MS	Matrix spike

Acronym or Abbreviation	Definition
MSD	Matrix spike duplicate
MPC	Measurement performance criteria
NA	Not applicable
NC	Not calculated.
PAH	Polycyclic aromatic hydrocarbon
PCB	Polychlorinated biphenyls
PQL	Practical quantitation limit
QAPP	Quality Assurance Project Plan
QC	Quality control
RF	Response Factor
RPD	Relative percent difference
RRF	Relative response factor
RSD	Relative standard deviation
RT	Retention time
SDG	Sample Delivery Group
SOP	Standard Operation Procedure
SVOC	Semi-volatile organic compound
SPCC	System performance check compound
SQL	Sample Quantitation Limit
TB	Tripblank
TCX	Tetrachloro-m-xylene
TIC	Tentatively identified compound
UCL	Upper control limit
VOC	Volatile organic compound

DATA QUALIFIER REFERENCE TABLE

Data validation reports will summarize the samples reviewed, elements reviewed, any nonconformances with the established criteria, validation actions (including data qualifiers). Data qualifiers will be consistent with EPA Region I – New England guidelines and will consist of the following:

USEPA Region I – Data Qualifier	USEPA Region I – Qualifier Definition
J	The analyte was positively identified; the associated numerical value is the approximate concentration of the analyte in the sample
UJ	The analyte was not detected above the sample reporting limit; and the reporting limit is approximate
U	The sample was analyzed for, but was not detected above the sample reporting limit.
R	The sample result is rejected due to serious deficiencies. The presence or absence of the analyte cannot be verified

Region I, EPA-NE ORGANIC REGIONAL DATA ASSESSMENT

LAB NAME: Northeast Laboratory/Air Toxics Lab
SDG #:_M59141
EPA-NE DV TIER LEVEL:___II___
SITE NAME: NAS Brunswick – Site Eastern Plume

# of SAMPLES/MATRIX: VOC 27, and 4 FD; Pesticides 1 and 1 FD; TOC 1; 1,4-Dioxane 11 and 3 FD, Metals 1 and 1 FD, 1 TB
VALIDATION CONTRACTOR:__ECC/ASW
VALIDATOR'S NAME: Sherri Pullar
DV Completion Date:_29 August, 2006
Date Sampled__7, 8, 11, 12, 13, & 14 September 2006.

ANALYTICAL DATA QUALITY SUMMARY

		VOC	Pesticides	TOC	1,4-Dioxane	Metals
1	Preservation and HT	M	O	O	O	O
2	Instrument Performance Check	-	-	-	O	O
3	Initial Calibration:	M	O	O	O	O
4	Continuing Calibration:	M	M	O	O	O
5	Blanks:	M	O	O	O	O
6	Surrogate Compounds:	O	-	-	M	-
7	Internal Standards	O	-	-	O	-
8	Matrix Spike/Matrix Spike Duplicate:	M	M	O	M	M
9	Sensitivity Check:	O	O	O	O	O
10	PE Samples- Accuracy Check	O	M	O	O	M
11	Target Compound Identification:	O	O	O	O	O
12	Compound Quantitation and Reported QLs	O	O	O	O	O
13	Tentatively Identified Compounds:	-	-	-	-	-
14	Semivolatile/Pesticide/PCB Cleanup:	-	-	-	-	-
15	Data Completeness	O	O	O	O	O
16	Overall Evaluation of Data:	O	O	O	O	O

O = Data had no problems or were qualified due to minor contractual problems; M = Data were qualified due to major/systemic MPC exceedences: Z = Data were rejected as unusable due to major contractual problems.

ACTION ITEMS: (Z items): None.

AREAS OF CONCERN: (M items):

VOC: Results in sample 20 were qualified J for detects and UJ for non-detects due to pH>2. Ethylbenzene in sample 20; toluene in samples 10 and 20; total xylene in sample 20; acetone in samples 10, 12, 14, 16, & 17; and methylene chloride in sample 16 were qualified U due to trip blank contamination. J for all samples with estimated results <MRL but >MDL. Results for 1,1,1-trichloroethane in samples 8 & 9 and MeCl in sample 16 were qualified J due to %R> MPC limits. Results for ethylbenzene in samples 15 & 17 and total xylene in samples 15 & 17 were qualified UJ due to %R> MPC limits. Non-detect results for chloromethane in samples 9, 41 and 42 were qualified as UJ due to ICV %D>MPC.

Non-detect results for bromoform were qualified UJ in samples 10, 11, 12, 13, 14, 15, 16, 17, 5, 8, & 9 due to CCV %D>MPC. Non-detect results for carbon tetrachloride were qualified UJ in samples 15 & 17 %D>MPC.

Metals: Hg qualified J for detects in samples 6 and 7 due to FD Pair RPD's outside MPC limits. Analytes <MRL but >IDL are qualified J. Results for SB were qualified UJ in samples 6 and 7 due to MS/MSD %R >MPC limits. Results for Se were qualified J in samples 6 and 7. Non-detect results for Tl were qualified UJ in samples 6 and 7 due to MS/MSD RPD >MPC limits. Results for mercury were qualified J in samples 6 & 7 due to laboratory RPD >MPC limits.

TOC: None.

1,4-Dioxane; Results for 1,4-dioxane in samples 22, 41, & 42 are qualified J due to surrogate recoveries outside MPC limits. Result for 1,4-dioxane was qualified J in sample 30 due to MS/MSD %R >MPC limits.

Pesticides: J for all samples with estimated results <MRL but >MDL. Results for 4,4'-DDE & 4,4'-DDT in sample 7 were qualified J due to MS/MSD recoveries outside MPC limits. Detected results in samples 6 and 7 were qualified J DDT breakdown outside MPC limits. Results for methoxychlor qualified UJ in samples 6 and 7. Result for 4,4'-DDT qualified UJ in sample 6 due to CCV %D > MPC limits.

ECC Region I Data Review Worksheet (rv 3) VOCs 5030B/5035/8260B
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance

Data Validation Level	Matrix	Preservation	Temp Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**HCl**	**1 cooler – Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59141**

Field Identification and Laboratory Number of Samples Evaluated:

Field ID	Lab Sample Number
BN-EP-29-SW10	M59141-1
BN-EP-29-SW11	M59141-2
BN-EP-29-SW13	M59141-3
BN-EP-29-SW14	M59141-4
BN-EP-29-SW-XD1	M59141-5 (field duplicate for M59141-3)
BN-EP-29-SEEP11	M59141-8
BN-EP-29-SEEP XD1	M59141-9 (field duplicate for M59141-8)
BN-EP-29-SEEP10	M59141-10
BN-EP-29-MW338B	M59141-11
BN-EP-29-MW388B-M	M59141-12
BN-EP-29-MW338A	M59141-13
BN-EP-29-MW338A-S	M59141-14
BN-EP-29-MW339	M59141-15
BN-EP-29-MW339-D	M59141-16
BN-EP-29-MW388C-M	M59141-17
BN-EP-29-RAW INFLUENT	M59141-19
BN-EP-29-COMB EFFLUENT	M59141-20
BN-EP-29-EFFLUENT-XD1	M59141-21 (field duplicate for M59141-20)
BN-EP-29-MW331-M	M59141-23
BN-EP-29-P111	M59141-24
BN-EP-29-MW313-D	M59141-26
BN-EP-29-MW333-M	M59141-27
BN-EP-29-MW335-M	M59141-28
BN-EP-29-MW337-M	M59141-29
BN-EP-29-MW335	M59141-33
BN-EP-29-MW337	M59141-34
BN-EP-29-EW1	M59141-37
BN-EP-29-EW2A	M59141-38
BN-EP-29-SW12	M59141-39
BN-EP-29-P106	M59141-41
BN-EP-29-MWXD5	M59141-42 (field duplicate for M59141-41)
BN-EP-29-MW-QT1	M59141-43

Note: Samples are described below in the data worksheets by reference to the last 2 digits of the Lab Sample Number.

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inventory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects preserved per method (amber bottles, temperature, HCl (aq), MeOH/NAHSO4 (soils) (J, UJ, or R (function of HT and compound)	Cooler temperatures < 6 ^oC. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. No samples qualified.	X	Results in sample 20 were qualified J for detects and UJ for non-detects.	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
	compound)	PH>2 for sample 20.			
Holding Time	1) 14 Days to analysis, if preserved 2) J –detects, UJ or R –nondetects (function of time) 3) *transcription errors	Analyzed within holding time.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made. 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	NA	-	-	
Lab Blanks (method blanks)	1) < 5x (<10x common) contaminants for aq samples- 2) <10X common contaminants – acetone, 2-butanone or Mecl. 1) TGT analytes <Lab QL 2) if linear range is exceeded, verify if a instrument blank was performed 3) *verify accurate transcription of times, Ids, are reported on forms 4) *verify from the raw data if the instrument blank was performed in the same vessel 5) *verify IS, RRT, and surrogate %R *check 10% of raw chromatograms for false +/-, check for transcription errors	Samples were analyzed in 6 batches: 14 Sep 06: Batch 1 with samples: 5, 8, 9, 10, 11, 12, 13, 14, & 16: No associated detection. 15 Sep 06: Batch 2 with samples: 15 & 17: No associated detection. 27 Sep 06: Batch 3 with samples: 41 & 42: No associated detection. 19 Sep 06: Batch 4 with samples: 19, 20, & 21: No associated detection. 20 Sep 06: Batch 5 with samples: 1, 2, 3, 4, 23, 24, 26, 27, 28, 29, 33, 34, 37, 38, & 39: No associated detection. 20 Sep 06: Batch 6 with sample: 43: No associated detection. All method blank results were non-detect for COCs. No samples qualified.	X	-	
Trip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate cross matrix TB (X rules apply to raw data) 4) MeCl & Acetone < 5 5) >RL report sample level U 6) <RL report PQL as U	Aqueous tripblank: BN-EP-29-MW-QT1 Non-detect for all LTMP TCL VOCs with the exception of ethylbenzene, toluene, total xylene, acetone, benzene, & MeCl. Ethylbenzene in sample 20; toluene in samples 10 and 20; total xylene in sample 20; acetone in samples 10, 12, 14, 16, & 17; and methylene chloride in sample 16 were qualified U due to trip blank contamination. Field samples were non-detect for benezene, no samples qualified.	X	Ethylbenzene in sample 20; toluene in samples 10 and 20; total xylene in sample 20; acetone in samples 10, 12, 14, 16, & 17; and methylene chloride in sample 16 were qualified U.	
Equip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate TB (X rules don't apply) 3) MeCl & Acetone < 5 *Check IS area (10% of them) * recalculate surrogate (%R – 10 % of them)	Not collected/analyzed with this SDG.	-	-	

ECC Region I Data Review Worksheet (rv 3) VOCs 5030B/5035/8260B
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
Results > Cal Range or <Cal Range	6) >Upper Cal Range J-detects - ensure instrument blank performed 7) <PQL but >MDL – J –detects (estimated) listed on data summary sheet.	Attached data summary table. Analytes with results >MDL but <MRL: were qualified J.	X	J for all samples with estimated results <MRL but >MDL.	
*TICs (if reported)	1) *verify library search for samples and blanks 2) verify TICs were not misreported compounds (different fraction or miss in search) 3) All TICs – J estimated 4) * verify blanks do not contain TIC peaks 5) * check TIC assignment spectra to STD spectra 6) *review blank and Samples for common lab contaminants	None Reported/not evaluated	-	-	
Surrogates	1,2-Dichloroethane-d4 76-114% Dibromofluoromethane 86-118% Toluene-d8 88%-110% 4-BFB 86%-115% *check raw data for surrogated (recalculate 10% of them). *Transcription errors Qualification: >UCL J –detects, %R<10% J –detects, R –Nods, %R >10% but <70% J-detects, UJ NDs	All surrogate recoveries were within QAPP MPC limits. No samples qualified.	X	-	
LCS Recovery	1) Attachment A-2 of LTMP 2) All VOCs 60-140% 3) 10% and <LCL% J detects, UJ –Nods 4) >UCL% J detects <10% R NDs, J-detects 7) *Recalculate the concentrations for one compound in the LCS 8) * Recalucate the %R (within 10% of lab) Note: Tier guidance as a zero blind	All LCS recoveries were within MPC limits, except LCS %R's for: 9/20/06; Samples 1, 2, 3, 4, 23, 24, 26, 27, 28, 29, 33, 34, 37, 38, & 39 - LCS %R>UCL – bromodichloromethane, carbon tetrachloride, 1,2-dichloroethane, 1,2-dichloropropane, 4-methyl-2-pentanone (MIBK), & 1,1,2,2-tetrachloroethane. These compounds were not detected in the native samples, therefore no sample were qualified.	X	-	
LCSD RPD	RPD ≤20% (aq) not a QAPP required QC check. Evaluated using MS/MSD RPD criteria. J- detects	All LCS/LCSD RPDs were within MPC limits.	X	-	
*MS/MSD/unspike sample RSD	1)For unspiked compounds if reported, Non- MS spike compounds <50% RSD calculated from MS/MSD/Unspiked Qualification: >50% RSD J-detects 2)*recalculate the RPD (within 10% of lab)	NA	-	-	
*Compound Quantitation (completed as part of other steps)	1) Check sensitivy (MDL< 1/3 PQL) 2) *Recalculate one detection and quantitation limit 3) *verify concentrations have been adjusted to account for DW, DF, 4) *verifiy correct IS and RRF were used	NA	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 8) *Matrix effects- MS/MSD, surrogated, PDS. 9) *System chromatography- evaluate RRTs, peaks shapes, system impacts on data, baseline shifts. 10) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
*TGT Compound Identification	1) *Within 0.06 (30 sec) of CCV RRT 2) * compare sample Mass spectra to standard spectra; a) all ions in std spectra (with 10% rel intensity) presnent in sample spectra. B) sample ion abundance within 20% of standard spectra. 3) *chromatogram: all peaks greater than 10% of nearest IS identified.	All detections are acceptable. No samples qualified.	X	-	
Single Blind PE	1) Qualify associated samples in PES batch PES = ND, Detects J – ND PE analytes in samples, NDs – R 11) PES > acceptance criteria – Detects in samples J, 12) PES<acceptance criteria – Detects J, NDs –R 13) VOA/SV-XI14 other criteria 14) *% of PES sample above and below criteria *Recalculate concentrations for one tgt compound per PES (10% of lab)	NA	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
MS/MSD Recovery	1) Attachment A-2 of LTMP 2) 60-140% for all VOCs (if MS > 4X native levels) Qualification of MS sample: <10% J detects, R NDs >10% and <LCL% J detects, UJ -NDs >UCL% J detects 3) *Recalculate the concentrations for one compound in the MS/MSD 5) * Recalculate the %R (within 10% of lab)	MS/MSD were run on the following samples: M59052-6, M59133-1, M59141-20, M59141-3, M59141-8, & M59443-9. All MS/MSD recoveries within MPC in sample M59141-8, except for acetone, carbon tetrachloride, chloroethane, chloroform, chloromethane, 1,1-dichloroethene, total 1,2-dichloroethene, MeCl, 1,1,1-trichloroethane, vinyl chloride, and total xylene had %R's>MPC. Results for 1,1,1-trichloroethane in samples 8 & 9 and MeCl in sample 16 were qualified J due to %R> MPC limits. All MS/MSD recoveries within MPC in sample M59052-6, except for acetone had %R's>MPC and ethylbenzene & total xylene had %R's < MPC limits. Results for ethylbenzene in samples 15 & 17 and total xylene in samples 15 & 17 were qualified UJ due to %R< MPC limits. All MS/MSD recoveries within MPC in sample M59443-9. No samples qualified. All MS/MSD recoveries within MPC in sample M59141-20. No samples qualified. All MS/MSD recoveries within MPC in sample M59141-3, except for carbon tetrachloride had %R's>MPC limits. Carbon tetrachloride was not detected in the native samples, no samples qualified. All MS/MSD recoveries within MPC in sample M59133-1. No samples qualified.	X	Results for 1,1,1-trichloroethane in samples 8 & 9 and MeCl in sample 16 were qualified J. Results for ethylbenzene in samples 15 & 17 and total xylene in samples 15 & 17 were qualified UJ.	-
MS/MSD RPD	RPD ≤20% (aq/S) (when MS >QL) J – detects in MS sample UJ-non detects * recalculate RPD	MS/MSD were run on the following samples: M59052-6, M59133-1, M59141-20, M59141-3, M59141-8, & M59443-9. All MS/MSD RPDs were inside MPC limits. No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 30% aq. ≤ 50 soil for Results > PQL (FD pair only) J-detects (both > PQL) 2) Note: FD RPD not specified in QAPP. 30% will be used as the MPC, to be consistent with other NASB QAPPs. 3) If one >PQL, other ND, J-detections, UJ non-detect 4) Other conditions use judgement 5) Determine RPD for detects only. *Recalculate the concentrations for one compound and the PQL	Field sample / Field duplicate 3 / 5 8 / 9 20 / 21 41 / 42 The FD pair 3/5; FD pair were both non-detect for VOC's. Acceptable precision. The FD pair 8/9 had RPD's inside MPC limits. Acceptable precision. The FD pair 20/21; FD pair were both non-detect for VOC's. Acceptable precision.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
		The FD pair 41/42 had RPD's inside MPC limits. Acceptable precision. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.			
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 6) * performed annually 7) *MDL is at least ½ of PQL 8) *tgt and surrogate 80-120% R *VOA/SV-X11 (recalcuate %RSD and %R for three compounds (10% of them).	NA	-	-	
Internal Stds	1) IS are –50% to 200% of last Ical, or CCV 3) RRT<0.06 (30 sec) 4) IS>100% J-detects 5) IS<20%CCV NDs – R 6) IS>20%CCV <50%CCV NDs – UJ 7) *check for IS transcription errors 8) FBZ = fluroobenzene 9) CBZ = chlorobenzene-d5 10) DCB = 1,4 dichlorobenzene-d4	Internal standards and RT's within MPC limits.	X	-	
Sensitivity	1) MDL study – 7 replicates (40 CFR) 2) Surrogates %in control limits. 3) %R <10 ND- (R) , J- detects 4) 10%> but <LCL% , judgement 5) %R>UCL% J-detects 6) QC, IS, RRT meet criteria, 7) %RSD < 20% 8) MDL< MQL (3x less ideal) 9) Lab fortitied blank (see VOA/SV Part II –section X). 10) *Check and recalculate %RSDs and %R for three compounds (with 10% of lab) <u>Dilution factors for samples – impacts to sensitivity</u>	Sensitivity is acceptable.	X	-	
Tune check	1) ion abundance with method limits 2) *check for co-elution /proper background subtraction 3) *compare reported data to raw data	All tunes within MPC limits.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
Initial Cal Multipoint (instrument evaluation)	1) correct calibration stds 2) within 12 hours of the tune check 3) CCCs %RSD: <30% (1,1 DCE, chloroform, 1,2dichloropropane, Toluene, EB, VC (J –detects, R or UJ NDs all samples associated with Ical) 4) SPCCs Average RRF: SPCCs Chloromethane >0.10, 1,1 DCA>0.10, bromoform >0.10, chlorobenzene>0.3, 1122TCA>0.3 (J –detects, R/UJ NDs) 5) RRF>0.05 all compounds 6) RRT < 0.06 units (all stds within 30 sec) 7) %RSD<15% for all non-CCCs or COD>0.99 *8) RRF exclusions: surrogates, acetone, MeCL, chloroethane/methane, CS, 1,/22/03 2-butanone, 1,2 dichloropropane, 2-hexanone (IV-8)./* 9) *verify that instrument parameters met method and that Ical and analysis used the same parameters 10) *recalculate RRF one tgt compound associated with each IS. Recalculated values within 10% of lab values. 11) *recalculate one tgt compound associated with each IS. Recalculated values within 10% 12) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 13) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument; 5973G 07 Sep 2006 All RRF's within MPC limits for all VOC's of concern. All CCCs are in MPC. All SPCC are in MPC. Instrument; 5973G 21 Sep 2006 All RRF's within MPC limits for all VOC's of concern. All CCCs are in MPC. All SPCC are in MPC. Instrument; MAMSN 18 Sep 2006 All RRF's within MPC limits for all VOC's of concern. All CCCs are in MPC. All SPCC are in MPC. Instrument; MAMSP 13 Sep 2006 All RRF's within MPC limits for all VOC's of concern. All CCCs are in MPC. All SPCC are in MPC.	X	-	
Initial Cal (Linearity)	%RSD < 15% use average RF for calibration %RSD> 15% use least squares COD (r2) > 0.990 or correlation coefficient r> 0.995 Qualification for compounds with : %RSD>30% and RRF>0.05 – J detects, UJ - NDs %RSD<30% and RRF<0.05; -J detects, R - ND %RSD>30% and RRF<0.05: J detects, R - ND (see VOA/SVIII-4)	Instrument; 5973G 07 Sep 2006 All %RSD < 30 or were fitted with linear or quadratic curves. These curves were provided by the laboratory for evaluation. No samples qualified. Instrument; 5973G 21 Sep 2006 All %RSD < 30 or were fitted with linear or quadratic curves. These curves were provided by the laboratory for evaluation. No samples qualified. Instrument; MAMSN 18 Sep 2006 All %RSD < 30 or were fitted with linear or quadratic curves. These curves were provided by the laboratory for evaluation. No samples qualified. Instrument; MAMSP 13 Sep 2006 All %RSD < 30 or were fitted with linear or	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
		quadratic curves. These curves were provided by the laboratory for evaluation. No samples qualified.			
2nd Source ICV	QC check nor criteria not specified in QAPP. %D<25% or %R (between ICV and Ical) analytes 80%--120% (+ or -) once per 5 pt cal used to evaluate data sets. Qualification: J detects, R or UJ NDs	Instrument; 5973G 07 Sep 2006 All %D's within MPC limits for all VOC's of concern. Instrument; 5973G 21 Sep 2006 All %D's within MPC limits for all VOC's of concern with the exception of chloromethane. Instrument; MAMSN 18 Sep 2006 All %D's within MPC limits for all VOC's of concern. Instrument; MAMSP 13 Sep 2006 All %D's within MPC limits for all VOC's of concern.	X	Non-detect results for chloromethane in samples 9, 41 and 42 were qualified as UJ.	
CCV	1) SPCCs Average RRF: SPCCs Chloromethane >0.10, 1,1 DCA>0.10, bromoform >0.10, chlorobenzene>0.3, 1122TCA>0.3 2) RRF all compounds > 0.05 3) CCC: (1,1 DCA, chloroform, 1,2dichloropropane, Toluene, EB, VC) %D<20% (or all analytes if no CCCs reported). 4) Qualification-J detects, R or UJ NDs 5) *verify same instrument and parameters 6) *Recalculate RRF for one tgt cmpd associated with each IS. (within 10%) 7) *Recalculate %D for one tgt cmpd associated with each IS (within 10%) 8) *IS RRT<0.06 units (30 sec) 9) * IS area -50 % to 100 % of last ICAL 10) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 11) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument; 5973G 14 Sep 2006 bromoform has %D>MPC. 15 Sep 2006 carbon tetrachloride & bromoform have %D>MPC. 27 Sep 2006 All %D's with MPC limits. Instrument; MAMSN 19 Sep 2006 All %D's with MPC limits. 20 Sep 2006 All %D's with MPC limits. Instrument; MAMSP 20 Sep 2006 All %D's with MPC limits.	X	Non-detect results for bromoform were qualified UJ in samples 10, 11, 12, 13, 14, 15, 16, 17, 5, 8, & 9. Non-detect results for carbon tetrachloride were qualified UJ in samples 15 & 17.	
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Results in sample 20 were qualified J for detects and UJ for non-detects due to high pH. Analytical Error Evaluation: Laboratory precision and accuracy are acceptable. LCS %R's inside MPC limits. All MS/MSD recoveries within MPC, except for acetone, carbon tetrachloride, chloroethane, chloroform, chloromethane, 1,1-dichloroethene, total 1,2-dichloroethene, MeCl, 1,1,1-	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
		trichloroethane, vinyl chloride, and total xylene had %R's>MPC and acetone had %R's>MPC and ethylbenzene & total xylene had %R's < MPC limits and carbon tetrachloride had %R's>MPC limits. Surrogates were inside MPC limits. J for all samples with estimated results <MRL but >MDL. The reported MRL's and MDL's provide adequate sensitivity to support evaluation against MEG and MCL's for all compounds except vinyl chloride. Tune checks within MPC limits. ICALs: SPCC was inside MPC limits. ICV: within limits with the exception of chlormethane. CCV: bromoform and carbon tetrachloride were outside the limits. Method blank samples were non-detect for all VOCs. Sampling Error Evaluation: Tripblank was non-detect for all VOCs with the exception of ethylbenzene, toluene, total xylene, acetone, benzene, & MeCl. Field sample / Field duplicate 3 / 5 8 / 9 20 / 21 41 / 42 The FD pair 3/5; FD pair were both non-detect for VOC's. Acceptable precision. The FD pair 8/9 had RPD's inside MPC limits. Acceptable precision. The FD pair 20/21; FD pair were both non-detect for VOC's. Acceptable precision. The FD pair 41/42 had RPD's inside MPC limits. Acceptable precision. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.			

* Tier III review items only.

Completeness Check: Inventory Check Sheet_____X__. Sample Quantitation Calculations (TIER III only):

Lab Correspondence: None.

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

5030/5035/8260BSIM 1,4 Dioxane
Review Criteria: Region I Tier II Guidance and EIASOP-VOADIOX1(5/21/03)

Data Validation Level	Matrix	Preservation	Temp Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**None**	**Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59141**

Field Identification and Laboratory Number of Samples Evaluated:

Field ID	Lab Sample Number
BN-EP-29-MW338C	M59141-18
BN-EP-29-MW331	M59141-22
BN-EP-29-MW330	M59141-25
BN-EP-29-MW313	M59141-30
BN-EP-29-MWXD3	M59141-31 (field duplicate for M59141-30)
BN-EP-29-MW333	M59141-32
BN-EP-29-MW229A	M59141-35
BN-EP-29-MW229B	M59141-36
BN-EP-29-MW306	M59141-40
BN-EP-29-MW338A	M59141-13A
BN-EP-29-COMB EFFLUENT	M59141-20A
BN-EP-29-EFFLUENT-XD1	M59141-21A (field duplicate for M59141-20A)
BN-EP-29-P106	M59141-41A
BN-EP-29-MWXD5	M59141-42A (field duplicate for M59141-41A)
BN-EP-29-MW-QT1	M59141-43A

Note: Samples are described below in the data worksheets by reference to the last three digits of the Lab Sample Number.

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° 3) Unpreserved 4) No headspace	Cooler temperatures < 6 ^oC. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. No samples qualified.	X	-	
Holding Time	1) 14 Days to analysis, 2) J –detects, UJ or R –nondetects (function of time) 3) *transcription errors	All samples analyzed within holding time. No samples qualified.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made. 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	Not applicable	-	-	
Surrogates	Surrogate; 1,4 dioxane-D8 : 60-140% *check raw data for surrogated (recalculate 10% of them). *Transcription errors Qualification: >UCL J –detects, %R<10% J –detects, R –Nods, %R >10% but <70% J-detects, UJ NDs	All reported surrogate recoveries for field samples within MPC limits with the exception of samples 22, 41, & 42. Samples were reanalyzed with the same results. Original results were reported by the laboratory and are qualified J in samples 22, 41, and 42.	X	Results for 1,4-dioxane in samples 22, 41, & 42 are qualified J.	

ECC Region I Data Review Worksheet (rv 3) **5030/5035/8260BSIM 1,4 Dioxane**
Project: NAS Brunswick ECC Job No. 5700 **Review Criteria: Region I Tier II Guidance and EIASOP-VOADIOX1(5/21/03)**

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
Lab Blanks (method blanks)	1) < 5x (<10x common) contaminants for aq samples- 2) <10X common contaminants – acetone, 2-butanone or Mecl. 1) TGT analytes <Lab QL 2) if linear range is exceeded, verify if a instrument blank was performed 3) *verify accurate transcription of times, Ids, are reported on forms 4) *verify from the raw data if the instrument blank was performed in the same vessel 5) *verify IS, RRT, and surrogate %R 6) *check 10% of raw chromatograms for false +/-, check for transcription errors	Associated method blanks were non-detect for 1,4 Dioxane.	X	-	
Trip Blank	1) < 5x contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate cross matrix TB (X rules apply to raw data) 4) MeCl & Acetone < 5 5) >RL report sample level U 6) <RL report PQL as U	Aqueous tripblank BN-EP-29-MW-QT1 Non-detect for 1,4-dioxane.	X	-	
Equip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate TB (X rules don't apply) 3) MeCl & Acetone < 5 *Check IS area (10% of them) * recalculate surrogate (%R – 10 % of them)	Not collected/analyzed with this SDG.	-	-	
Results > Cal Range or <Cal Range	7) >Upper Cal Range J-detects - ensure instrument blank performed 8) <PQL but >MDL – J –detects (estimated) listed on data summary sheet.	All sample detects were greater than the MRL.	X	-	
LCS Recovery	1) 1,4 Dioxane 60-140% 2) 10% and <LCL% J detects, UJ –Nods 3) >UCL% J detects <10% R NDs, J-detects 7) *Recalculate the concentrations for one compound in the LCS 8) * Recalucate the %R (within 10% of lab) Note: Tier guidance as a zero blind	All LCS %R's are within MPC limits. No samples qualified.	X	-	
LCS/LCSC RPD	RPD ≤20% (aq) (when MS >QL) Not a method specified QC check.	LCS/LCSD RPD <20%. Laboratory accuracy is acceptable	x	-	

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

5030/5035/8260BSIM 1,4 Dioxane
Review Criteria: Region I Tier II Guidance and EIASOP-VOADIOX1(5/21/03)

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
MS/MSD Recovery	1) 60-140% for all VOCs (if MS > 4X native levels) Qualification of MS sample: <10% J detects, R NDs >10% and <LCL% J detects, UJ -NDs >UCL% J detects 3) *Recalculate the concentrations for one compound in the MS/MSD 4) * Recalucate the %R (within 10% of lab)	Native sample was sample M59141-20. All MS/MSD recoveries within MPC. No sample qualifications. Native sample was sample M59141-30. MSD recoveries outside MPC limits (> MPC).	-	Result for 1,4-dioxane was qualified J in sample 30.	
MS/MSD RPD	RPD ≤20% (aq/S) (when MS >QL) J – detects in MS field sample UJ-non detects * recalculate RPD	Native sample was sample M59141-20. MS/MSD RPD inside MPC. Native sample was sample M59141-30. MS/MSD RPD inside MPC.	-	.	
Field Dup RPD	1) RPD ≤ 30% aq. soil for Results > PQL (FD pair only) J-detects (both > PQL) 2) Note: FD RPD not specified in QAPP. 30% will be used as the MPC, to be consistent with other NASB QAPPs. 3) If one >PQL, other ND, J-detections, UJ non-detect 4) Other conditions use judgement 5) Determine RPD for detects only. 5) *Recalculate the concentrations for one compound and the PQ	Field sample Field duplicate 20 21 30 31 41 42 All three FD pairs (20/21, 30/31, & 41/42) had RPD's within MPC limits. Overall precision is acceptable. For individual RPD values for detected results please see attached field duplicate worksheet.	-	-	
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 6) * performed annually 7) *MDL is at least ½ of PQL 8) *tgt and surrogate 80-120% R 9) *VOA/SV-X11 (recalcuate %RSD and %R for three compounds (10% of them).	NA	-	-	
Internal Stds	1) IS are –50% to 200% of last Ical, or CCV 3) RRT<0.06 (30 sec) 4) IS>100% J-detects 5) IS<20%CCV NDs – R 6) IS>20%CCV <50%CCV NDs – UJ 7) *check for IS transcription errors 8) FBZ = fluroobenzene 9) CBZ = chlorobenzene-d5 10) DCB = 1,4 dichlorobenzene-d4	All IS %R's are within MPC limits for all field samples. No field samples qualified.	X	-	
Sensitivity	1) MDL study – 7 replicates (40 CFR) 2) Surrogates %in control limits. 1) %R <10 ND- (R) , J- detects 2) 10%> but <LCL% , judgement 3) %R>UCL% J-detects 6) QC, IS, RRT meet criteria, 7) %RSD < 20% 8) MDL< MQL (3x less ideal)	The MRL is 1.00 ppb (ug/L) which is consistent with the EPA Region I method. Sensitivity is acceptable. The site action limit is not in the QAPP, but is ca. 35 ppb. The project sensitivity is acceptable.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
	9) Lab fortitied blank (see VOA/SV Part II –section X). 10) *Check and recalculate %RSDs and %R for three compounds (with 10% of lab) 11) <u>Dilution factors for samples – impacts to sensitivity</u>				
*Compound Quantitation (completed as part of other steps)	1) Check sensitivy (MDL< 1/3 PQL) 2) *Recalculate one detection and quantitation limit 3) *verify concentrations have been adjusted to account for DW, DF, 4) *verifiy correct IS and RRF were used	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 9) *Matrix effects- MS/MSD, surrogated, PDS. 10) *System chromatography- evaluate RRTs, peaks shapes, system impacts on data, baseline shifts. 11) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
*TGT Compound Identification	1) *Within 0.06 (30 sec) of CCV RRT 2) * compare sample Mass spectra to standard spectra; a) all ions in std spectra (with 10% rel intensity) presnent in sample spectra. B) sample ion abundance within 20% of standard spectra. 3) *chromatogram: all peaks greater than 10% of nearest IS identified.	NA	X	-	
Single Blind PE	1) Qualify associated samples in PES batch PES = ND, Detects J – ND PE analytes in samples, NDs – R 12) PES > acceptance criteria – Detects in samples J, 13) PES<acceptance criteria – Detects J, NDs –R 14) VOA/SV-XI14 other criteria 15) *% of PES sample above and below criteria 16) *Recalculate concentrations for one tgt compound per PES (10% of lab)	NA	-	-	
Tune check	1) ion abundance with method limits 2) *check for co-elution /proper background subtraction 3) *compare reported data to raw data	All tunes passed. No samples qualified.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
Initial Cal Multipoint (instrument evaluation)	1) correct calibration stds 2) within 12 hours of the tune check 3) RRF criteria not part of method. This VOC fall under the *RRF exclusions of Section (IV-8) Tier II guidance.* 4) %RSD<30% Qualification for compounds with : %RSD>30%	Instrument GCMSM 18 July 2006 Applies to all samples %RSD>30% calibration.	X	-	
2nd Source ICV	QC check nor criteria not specified in QAPP nor analytical SOP. %D<25% or %R (between ICV and Ical) analytes 80%--120% (+ or -) once per 5 pt cal used to evaluate data sets. Qualification: J detects, R or UJ NDs	Instrument GCMSM 18 July 2006 All %D's within MPC limits for all VOC's of concern.	X	-	
CCV	1) %D>30% 2) before analysis and every 12 hours. 3) Qualification-J detects, R or UJ NDs 4) *verify same instrument and parameters 5) *Recalculate RRF for one tgt cmpd associated with each IS. (within 10%) 6) *Recalculate %D for one tgt cmpd associated with each IS (within 10%) 7) *IS RRT<0.06 units (30 sec) 8) * IS area -50 % to 100 % of last ICAL 9) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 10) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument GCMSM 13 September 2006 All %D's with MPC limits. Instrument GCMSM 18 September 2006 All %D's with MPC limits. Instrument GCMSM 19 September 2006 All %D's with MPC limits.	X		
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Laboratory is accuracy acceptable, as the laboratory LCS/LCSD and MS/MSD are within limits. No matrix bias. Surrogates were outside MPC limits in samples 22, 41, & 42. Results for 1,4-dioxane were qualified as J in samples 22, 41, & 42 MS/MSD RPD's were inside MPC limits for 1,4-dioxane. Method blanks were non-detect for 1,4 Dioxane. Aqueous tripblank QT1 was non-detect for 1,4-dioxane. Tune check passed. ICAL; within MPC (linear calibration per laboratory notes). ICV: within MPC for %drift	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
		CCV: samples analyzed within 12-hours of ICal. Post CCV had acceptable %Drift for 1,4 dioxane. CCV Area% inside MPC limits for 1,4-dioxane. Field sample Field duplicate 20 21 30 31 41 42 All three FD pairs (20/21, 30/31, & 41/42) had RPD's within MPC limits. Overall precision is acceptable. For individual RPD values for detected results please see attached field duplicate worksheet.			

* Tier III review items only.

Completeness Check: Inventory Check Sheet_____X__. Sample Quantitation Calculations (TIER III only):

ECC Region I Data Review Worksheet (rv 3) Pesticides 3510C/3545/8081A
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance

Data Validation Level	Matrix	Preservation	Temperature Sample Receipt	Laboratory	SDG Number
Tier II	**Solid**	**-**	**1 batch – all temps < 6°C**	**Accutest Laboratories Marlborough, MA**	**SDG: M59141**

Field Identification of Samples Evaluated:

Field ID	Lab Sample Number
BN-EP-29-SED11	M59141-6
BN-EP-29-SED XD1	M59141-7 (field duplicate for M59141-6)

Note: Samples are described below in the data worksheets by reference to the last few digits of the Lab Sample Number

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects 3) preserved per method (amber bottles, temperature. J, UJ, or R (function of HT and compound)	Cooler temperatures < 6 °C. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. Sample preservation within limits. No samples qualified.	X	-	
Holding Time	1) 7 days to extract (14 days for solids) and 40 days to analysis J –detects, UJ or R – nondetects (function of time)	All samples extracted and analyzed within holding time. No samples qualified.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made (no USACE) 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	%Solids >30%. No samples qualified.	-	-	
Results > Cal Range or <Cal Range	1) >Upper Cal Range J-detects - ensure instrument blank performed 2) <PQL but >MDL – J –detects (estimated)	Attached data summary table. Analytes with results >MDL but <MRL: were qualified J. No results exceeding upper calibration range.	X	J for all samples with estimated results <MRL but >MDL.	
Equip Blank	< 5x (<10x common) contaminants for aq samples – for soil indicate EB (X rules don't apply)	Not collected/analyzed with this SDG.	-	-	
Surrogates	Surrogate acceptance limits not specified in the LTMP. Use laboratory statistical limits. TMX 30-150% DCB 30-150% Qualification: >UCL J –detects, %R<10% J –detects, R –NDs, %R >10% but <60% J-detects, UJ NDs	All surrogate recoveries within MPC limits. No sample qualifications.	X	-	
Lab Blanks (method blanks)	1) < 5x (<10x common) contaminants – U 2) analytes <lab PQL (contract lab)	Method blank was non-detect for pesticides. No sample qualifications.	X	-	

ECC Region I Data Review Worksheet (rv 3) Pesticides 3510C/3545/8081A
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
LCS Recovery	1) QAPP limits 10% and <LCL% J detects, UJ -NDs >UCL% J detects <10% R NDs, J-detects Attachment A-2 LTMP; Gamma-BHC (Lindane) 56-123% Heptachlor 40-131% Aldrin 40-120% Dieldrin 52-126% Endrin 56-121% 4,4'-DDT 38-127%	All LCS recoveries within MPC limits. No sample qualifications.	X	-	-
MS/MSD Recovery	1) QAPP limits (if MS > 4X native levels) Qualification of MS sample: <10% J detects, R NDs >10% and <LCL J detects, UJ -NDs >UCL J detects Attachment A-2 LTMP; Gamma-BHC (Lindane) 56-123% Heptachlor 40-131% Aldrin 40-120% Dieldrin 52-126% Endrin 56-121% 4,4'-DDT 38-127%	Native samples – M59141-6 All MS/MSD recoveries within MPC limits with the exception of dieldrin, 4,4'-DDE, 4,4'-DDT, endrin aldehyde, & methoxychlor. Results for 4,4'-DDE & 4,4'-DDT in sample 7 were qualified J due to MS/MSD recoveries outside MPC limits.	X	Results for 4,4'-DDE & 4,4'-DDT in sample 7 were qualified J.	-
MS/MSD RPD	MS/MSD RPD per QAPP Attachment A-2 Gamma-BHC (Lindane) <15% Heptachlor <20% Aldrin <22% Dieldrin <18% Endrin <21% 4,4'-DDT <27%% J –detects in MS sample UJ-non detects	Native samples – M59141-6 All MS/MSD RPD's within MPC limits. No sample qualifications.	X	-	
Cleanup Performance Check (if performed)	%R< 10% NDs-R detections J %R>10% <LCL (80%GPC) –detections J, NDs UJ %R>UCL (120%) – detections J Retention Time shift <5%, symmetrical peakshape. GPC check with interferants. Good surrogate recovery, GPC blank check – no carryover.(VOA/SV-IX-I6). Sulfur and High MW compounds removed. SW-846 clean-up not required	NA	-	-	
Retention times	Within 3X standard deviation for each analyte from 72-hour study Exceeds: R qualify data	No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 50% soil and <30% waters for Results >2X PQL (FD pair only) J-detects (both > X PQL) 2) If one >2X PQL, other ND, J-detections, UJ non-detect Other conditions use judgement	Field Duplicate pairs – Samples 6-7. All FD RPD's were within MPC limits. No sample qualifications. Overall sampling and analysis precision is acceptable. For individual RPD values for detected results please see attached field duplicate worksheet.	X		

ECC Region I Data Review Worksheet (rv 3) Pesticides 3510C/3545/8081A
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
DDT Degradation check	Degradation Breakdown (BD) Check every 12 hours and prior to sample analysis. DDT Breakdown: <15% for all checks associated with samples. Endrin Breakdown: <15% for check prior to sample analysis. If BD>15% J detects Endrin/DDT.	Instrument: GCBB. Endrin breakdown within MPC limits for all applicable samples. DDT breakdown outside MPC limits. Detected results in samples 6 and 7 were qualified J.	X	Detected results in samples 6 and 7 were qualified J.	
Initial Cal (Linearity)	Correct calibration stds %RSD < 20% use average RF for calibration %RSD> 20% use least squares COD (r2) > 0.990 or correlation coefficient r> 0.995 or alternatively mean %RSD <20% for all target analytes, with no analyte %RSD>40%	Instrument: GCBB. Dates: September 26, 2006. RSD<20% or COD >0.99 for both columns. No sample qualifications.	X	-	
2nd Source ICV	%R (between ICV and Ical) analytes %D ≤ 15%, (+ or -) once per 5 pt cal Qualification: J detects, R or UJ NDs	Instrument: GCBB. Dates: September 27, 2006. All %D's within MPC limits for all VOC's of concern.	X	-	
CCV	1) QAPP: 15% of initial calib. Curve (85%-115%) . J qualify data. 2) Qualification-J detects, R or UJ NDs	Instrument: GCBB. Dates: September 27, 2006. .All %D's were within MPC limits in both columns with the exception of methoxychlor (16.8% Dev) and 4,4'-DDT (119% area) on Signal #2.	X	Results for methoxychlor qualified UJ in samples 6 and 7. Result for 4,4'-DDT qualified UJ in sample 6.	
Compound Quantitation	1) Check sensitivy (MDL< 1/3 PQL or per QAPP 2) %D <25% primary and secondary column identification and quantitation 3) Target compounds by 8081 Lindane PQL 0.05 ug/L MCL/MEG 0.2 4,4' DDT PQL 0.02 ug/L MEG/0.83	No compounds detected. No sample qualifications.	X	-	
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	The laboratory results, as qualified, are usable for making project decisions. All surrogate, LCS, and MS/MSD RPD's were within MPC limits. Results for 4,4'-DDE & 4,4'-DDT in sample 7 were qualified J due to MS/MSD recoveries outside MPC limits. ICAL and ICV are within MPC limits for all samples. DDT breakdown outside MPC limits. Detected results in samples 6 and 7 were qualified J. ICAL: COD within limits. ICV: in limits CCV: Results for methoxychlor qualified UJ in samples 6 and 7. Result for 4,4'-DDT qualified UJ in sample 6. No method blank detections.	X	-	-

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
		Field Duplicate pairs – Samples 6-7. All FD RPD's were within MPC limits. No sample qualifications. Overall sampling and analysis precision is acceptable. For individual RPD values for detected results please see attached field duplicate worksheet.			

*(Tier III check items) Completeness Check: Inventory Check Sheet_____X__ Sample Quantitation Calculations (TIER III ONLY):

Lab Correspondence: None.

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

Metals 6010B/7041/7470A/7471A/7740/7841
Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

Data Validation Level	Matrix	Preservation	Temperature Sample Receipt	Laboratory	SDG Number
Tier II	**Sediment**	**-**	**1 cooler – Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59141**

Field Identification of Samples Evaluated:

Field ID	Lab Sample Number
BN-EP-29-SED11	M59141-6
BN-EP-29-SED XD1	M59141-7 (field duplicate for M59141-6)

Note: Samples are described below in the data worksheets by reference to the last three digits of the Lab Sample Number

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects 3) preserved per method (amber bottles, temperature. J, UJ, or R (function of HT and compound)	Cooler temperatures <6°C. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. Sample preservation within limits. No samples qualified.	X	-	
Holding Time	1) 180 days (6010), Hg 28 Days to analysis 2) J –detects, UJ or R –nondetects (function of time)	All samples analyzed within holding time. No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 30% water and ≤ 50 soil (no QAPP Criteria) for Results > X PQL (FD pair only) J-detects (both > X PQL) 2) If one >X PQL, other ND, J-detections, UJ non-detect	Field Sample Field Duplicate 6 7 FD Pair RPD's were within MPC with the exception of Hg. For individual RPD values for detected results please see attached field duplicate worksheet.	X	Hg qualified J for detects in samples 6 and 7.	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs –R	%solids >30%, no samples qualified.	X	-	
Results > Cal Range or <Cal Range	1) >Upper Cal Range J-detects - ensure instrument blank performed 2) <MRL but >MDL – J –detects (estimated)	Analytes <MRL but >IDL are qualified J	X	Analytes <MRL but >IDL are qualified J	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
Lab Blanks (method blank or preparation blank)	1) Once per sample batch 2) Results > QL; sample results <5X ; sample result U (nd) 3) Sample results >5X blank level; no action	Preparation blanks were non-detect for all metals.	X	-	
LCS Recovery	1) once per sample batch 2) 80-120% ICP metals and Hg. 3) <LCL% Reject 4) >UCL% detects J	All LCS %R's were within MPC limits. No samples qualified. Laboratory precision is acceptable.	X	-	
LCS/LCSD RPD	1) RPD<20%	All 6010B/Hg- LCS/LCSD RPDs are within MPC limits.	X		
MS Recovery	1) 75-125% ICP metals and Hg if MS > 4X native levels) Qualification of MS sample: 2) <30% J detects, R NDs 3) 30%--74%, detects J, NDs UJ 4) >125% J detects	Field samples M9141-6 used for MS. Sb MS %R<LCL but the matrix spike was not greater than 4X the field sample level. SB was qualified UJ due to LCS %R>MPC limits in samples 6 and 7. Al, Fe, & Mn MS%R>UCL but the native sample levels were >4X the MS, no qualified samples.	X	Results for SB were qualified UJ in samples 6 and 7.	
MS/MSD RPD	MS/MSD RPD<20%	All 6010B & Hg MS/MSD RPDs within limits with the exception of Se and Tl. Laboratory precision is acceptable.	X	Results for Se were qualified J in samples 6 and 7. Non-detect results for Tl were qualified UJ in samples 6 and 7.	
Laboratory Replicate RPD	RPD < 20% No QAPP criteria provided	Field sample: M9141-6 used for lab replicate. All RPDs within limits with the exception of mercury (27.5%). Laboratory precision is acceptable.	X	Results for mercury were qualified J in samples 6 & 7.	
Sensitivity*	1) MDL study – 7 replicates (40 CFR) 2) check and recalculate %RSDs and %R fir three compounds (with 10% of lab)	All results in calibration range. No dilutions required.	X	-	
Equip Blank	< 5x contaminants for aq samples – for soil indicate EB (X rules don't apply)	Not collected/analyzed with this SDG	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
Negative blanks	If negative values are reported for an analyte with absolute value >DL and sample value is <5X the absolute value of the blank or is nondetect Qualify detects as estimated (J) Nondetects as estimated (UJ)	No negative blank detections. No samples qualified.	X	-	
Initial Cal Multipoint	1) Blank and 3 standards covering range of instrument. 2) high standard verification +/- %5 3) Hg 5-point calibration COD>0.99	ICP-AES samples. All COD's > 0.99 in all initial calibration runs for all methods. No sample qualifications. Hg ICaL within limits.	X	-	
Initial Calibration Blanks (ICB)	1) Ical blank after Ical 2) Results > QL; sample results <5X ; sample result U (nd) 3) Blank concentrations < project RLs 4) Sample results >5X blank level; no action 5) ABS >RL then J qualify data	No 6010B/Hg ICB detections – no samples qualified.	X	-	
Continuing Calibration Blanks (CCB)	1) CCB every 10 samples end of run 2) Blank concentrations < project RLs 3) Results > QL; sample results <5X ; sample result U 4) Sample results >5X blank level; no action ABS >RL then J qualify data.	No 6010B/Hg CCB detections – no samples qualified.	X	-	
Serial Dilution	1) once per digestion batch 2) Not required per QAPP- no criteria provided. 3) %D<10% 4) %D not evaluated if element results is <50X IDL 5) J detects, UJ non-detects.	Field sample M59141-6 for SD. %D's within MPC limits with the exception of As, Be, Se, and Na. Native sample results for As, Be, Se, and Na were <50X IDL, no samples qualified.	X	-	
Interelement checks ICS-A, ICS-AB Instrument performance check	1) start of sequence 2) 80-120% target analytes 3) >120% ; detects J (ICS-AB) 4) 50%-79% R ICS-AB; detects J, NDs – UJ 5) <50% R – reject data 6) ICS-A response > DL and samples have <5X ICS-A response: detects J (if DL is <10 ug/l use 2X DL). 7) Absolute value of negative ICS-A response>DL and sample detects <5X ICS-A response: detects J, NDs as UJ 8) If the ICS-A is within limits, the ICS-AB may not be analyzed (USACE Shell)	Both ICS-A and ICS-AB %R's within MPC limits for all runs.	X	-	
2nd Source ICV	1) following calibration 2) 90- 110% Recovery (6010/7000) 3) 75%-89% R – detects J, NDs – UJ 4) 111-125% R – detects J 5) outside 75-125% R – reject data (R) Hg 80-120%	6010B/Hg ICV %R's within MPC limits the initial calibration. No samples qualified.	X	-	
CCV	1) every 10 samples and end of run 2) 90- 110% Recovery (6010) Hg; 80-120% 3) 6010: 75%-89% R Hg, 65-79% R; – detects J, NDs – UJ. 4) 6010: 111-125%, Hg: 121-135% detects J 6010: outside 75-125%, Hg; outside 65-135%;	6010B/Hg CCV %R's within MPC limits. No samples qualified.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
	R – reject data (R)				
Post Digestion Spike	1) Analyze if MS >MPC (QAPP) 2) 85- 115%R (QAPP Attachment A-1)	M59141-6 used for PDS. All %R within limits No apparent matrix bias. No samples qualified.	X	-	
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 3) * performed annually 4) *MDL is at least ½ of PQL *tgt and surrogate 80-120% R	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 3) *Matrix effects- MS/MSD, surrogated, PDS. 4) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
Tune Check	Within Method limits.	NA	-		
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Method 6010B; metals except for Hg. The LCS %R;s are within limits. Sb MS %R<LCL but the matrix spike was not greater than 4X the field sample level. SB was qualified UJ due to LCS %R>MPC limits in samples 6 and 7. Al, Fe, & Mn MS%R>UCL but the native sample levels were >4X the MS, no qualified samples. MS/MSD RPDs within limits with the exception of Se and Tl. The LCS/LCSD RPDs were within limits. All RPDs within limits with the exception of mercury. Laboratory precision is acceptable as determined by the laboratory duplicate. Hg. analytical precision and accuracy within MPC limits. Lab preparation blank; non-detected for all analytes. ICAL: COD within limits. ICV: in limits CCV: in limits	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
		Sampling Error Evaluation: Field Sample Field Duplicate 6 7 FD Pair RPD's were within MPC with the exception of Hg. For individual RPD values for detected results please see attached field duplicate worksheet.			

*TIER III DATA VALIDATION ONLY Completeness Check: Inventory Check Sheet___X_Sample Quantitation Calculations (TIER III DATA VALIDATION ONLY):

ECC Region I Data Review Worksheet (rv 1) **TOC**
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 **Review Criteria: Method SOPs**

Data Validation Level	Matrix	Preservation	Temperature Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**N/A**	**1 cooler – Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59141**

Field Identification of Samples Evaluated:

Field ID	Lab Sample Number
BN-EP-29-SED11	M59141-6

Note: Samples are described below in the data worksheets by reference to the last two digits of the Lab Sample Number

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative (samples listed on attached sheets)	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (J detects, R/UJ-nondetects 3) preserved per method (amber bottles, temperature. J, UJ, or R (function of HT and compound)	Cooler temperatures <6 ^oC. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. Sample preservation within limits and/or method requirements. No samples qualified.	X	-	
Holding Time	1) alk -14 days, Cl – 28 days, Fe(II) <24 hours, Nitrate/Nitrite 28 days, SO4 – 28 days, TOC – 28 days, & nitrite 2-days. Per methods 2) J –detects, UJ or R –nondetects (function of time)	All samples analyzed within holding time. No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 30% water (no QAPP Criteria) for Results > X PQL (FD pair only) J-detects (both > X PQL) 2) If one >X PQL, other ND, J-detections, UJ non-detect	No FD was collect for this analysis within this sample grouping.	-	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	%solids >30%, no samples qualified.	X	-	
Results > Cal Range or <Cal Range	1) >Upper Cal Range J-detects - ensure instrument blank performed 2) <MRL but >MDL – J –detects (estimated)	All reported data is greater than the MRL. No samples qualified.	X	-	
Lab Blanks (method blank or preparation blank)	1) Once per sample batch 2) Results > QL; sample results <5X ; sample result U (nd) 3) Sample results >5X blank level; no action	Associated TOC method blank non-detect. No samples qualified.	X	-	

ECC Region I Data Review Worksheet (rv 1) TOC
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Method SOPs

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative (samples listed on attached sheets)	Inven-tory	QUAL	BIAS
LCS Recovery	1) once per sample batch 2) 80-120% ICP metals and Hg. 3) <LCL% Reject 4) >UCL% detects J	Associated LCS %R's within MPC. No samples qualified.	X	-	
MS Recovery	1) 75-125% ICP metals and Hg if MS > 4X native levels) Qualification of MS sample: 2) <30% J detects, R NDs 3) 30%--74%, detects J, NDs UJ 4) >125% J detects	MS/MSD %R within MPC. No sample qualifications.	X	-	
Laboratory Replicate RPD	RPD < 20% No QAPP criteria provided	Laboratory replicate RPDs are within MPC. Lab precision is acceptable.	X	-	
Sensitivity*	1) MDL study – 7 replicates (40 CFR) 2) check and recalculate %RSDs and %R fir three compounds (with 10% of lab)	Acceptable sensitivity.	X	-	
Equip Blank	< 5x contaminants for aq samples – for soil indicate EB (X rules don't apply)	Not Collected/analyzed with this SDG	-	-	
Initial Cal Multipoint	1) Within laboratory MPC.	Calibrations were within linearity requirements. No samples qualified.	X	-	
Continuing Calibration Blanks (CCB)	2) Within laboratory MPC.	TOC: periodic method blanks non-detect, no samples qualified.	X	-	
2nd Source ICV	3) Within laboratory MPC.	Applicable ICV's were within limits. No samples qualified.	X	-	
CCV	4) Within laboratory MPC.	Applicable CCV's were within limits. No samples qualified.	X	-	
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Laboratory accuracy is acceptable. Accuracy is shown by the LCS being within limits. Laboratory precision is acceptable. No apparent matrix bias. ICAL: in limits. ICV: in limits CCV: in limits Sampling Error Evaluation: Sampling Error was not evaluated since no FD was collect. Overall precision is acceptable.	X	-	.

*TIER III DATA VALIDATION ONLY Completeness Check: Inventory Check Sheet___X_Sample Quantitation Calculations (TIER III DATA VALIDATION ONLY):

FIELD DUPLICATE WORKSHEET

SDG: M59141

Field Sample Id	Analyte	Analytical Method	Result	Units	Qualifier	Field Duplicate Id	Result	Units	Qaulifier	FD RPD (%)
BN-EP-29-SED11	4,4'-DDT	SW8468081	2.4	ug/kg		BN-EP-29-SED-XD1	3.9	ug/kg		NC
BN-EP-29-SED11	4,4'-DDD	SW8468081	11.5	ug/kg		BN-EP-29-SED-XD1	14.4	ug/kg		22.4
BN-EP-29-SED11	4,4'-DDE	SW8468081	2.4	ug/kg		BN-EP-29-SED-XD1	0.96	ug/kg		NC
BN-EP-29-SED11	Endosulfan-I	SW8468081	2.4	ug/kg		BN-EP-29-SED-XD1	7.6	ug/kg		NC
BN-EP-29-SED11	Aluminum	SW8466010B	5070	mg/kg		BN-EP-29-SED-XD1	5560	mg/kg		9.2
BN-EP-29-SED11	Iron	SW8466010B	18300	mg/kg		BN-EP-29-SED-XD1	20900	mg/kg		13.3
BN-EP-29-SED11	Lead	SW8466010B	22.9	mg/kg		BN-EP-29-SED-XD1	25.0	mg/kg		8.8
BN-EP-29-SED11	Magnesium	SW8466010B	1600	mg/kg		BN-EP-29-SED-XD1	1770	mg/kg		10.1
BN-EP-29-SED11	Manganese	SW8466010B	505	mg/kg		BN-EP-29-SED-XD1	518	mg/kg		2.5
BN-EP-29-SED11	Nickel	SW8466010B	8.4	mg/kg		BN-EP-29-SED-XD1	9.2	mg/kg		9.1
BN-EP-29-SED11	Potassium	SW8466010B	691	mg/kg		BN-EP-29-SED-XD1	767	mg/kg		10.4
BN-EP-29-SED11	Sodium	SW8466010B	68.3	mg/kg		BN-EP-29-SED-XD1	81.0	mg/kg		17
BN-EP-29-SED11	Arsenic	SW8466010B	3.7	mg/kg		BN-EP-29-SED-XD1	5.0	mg/kg		29.9
BN-EP-29-SED11	Barium	SW8466010B	36.7	mg/kg		BN-EP-29-SED-XD1	38.8	mg/kg		5.6
BN-EP-29-SED11	Beryllium	SW8466010B	0.37	mg/kg		BN-EP-29-SED-XD1	0.40	mg/kg		7.8
BN-EP-29-SED11	Chromium	SW8466010B	9.3	mg/kg		BN-EP-29-SED-XD1	10.0	mg/kg		7.3
BN-EP-29-SED11	Cobalt	SW8466010B	5.3	mg/kg		BN-EP-29-SED-XD1	5.7	mg/kg		7.3
BN-EP-29-SED11	Copper	SW8466010B	7.0	mg/kg		BN-EP-29-SED-XD1	7.7	mg/kg		9.5
BN-EP-29-SED11	Vanadium	SW8466010B	17.3	mg/kg		BN-EP-29-SED-XD1	19.1	mg/kg		9.9
BN-EP-29-SED11	Zinc	SW8466010B	51.3	mg/kg		BN-EP-29-SED-XD1	57.0	mg/kg		10.5
BN-EP-29-SED11	Calcium	SW8466010B	866	mg/kg		BN-EP-29-SED-XD1	943	mg/kg		8.5
BN-EP-29-SED11	Selenium	SW8466010B	0.55	mg/kg		BN-EP-29-SED-XD1	0.69	mg/kg		22.6
BN-EP-29-SED11	Mercury	SW8467471A	0.022	mg/kg	J	BN-EP-29-SED-XD1	0.037	mg/kg	J	**50.8**
BN-EP-29-SEEP11	Tetrachloroethene	SW8468260B	1.4	ug/l		BN-EP-29-SEEP-XD1	1.4	ug/l		0
BN-EP-29-SEEP11	1,1,1-Trichloroethane	SW8468260B	1.1	ug/l		BN-EP-29-SEEP-XD1	1.1	ug/l		0
BN-EP-29-SEEP11	Trichloroethene	SW8468260B	1.6	ug/l		BN-EP-29-SEEP-XD1	1.7	ug/l		6.1

Field Sample Id	Analyte	Analytical Method	Result	Units	Qualifier	Field Duplicate Id	Result	Units	Qaulifier	FD RPD (%)
BN-EP-29-COMB EFFLUENT	1,4-Dioxane	SW8468260BBYSIM	6.6	ug/l		BN-EP-29-EFFLUENT-XD1	5.8	ug/l		12.9
BN-EP-29-MW313	1,4-Dioxane	SW8468260BBYSIM	69.0	ug/l		BN-EP-29-MW-XD3	70.6	ug/l		2.3
BN-EP-29-P106	Tetrachloroethene	SW8468260B	7.0	ug/l		BN-EP-29-MW-XD5	6.9	ug/l		1.4
BN-EP-29-P106	1,2-Dichloroethene (total)	SW8468260B	8.3	ug/l		BN-EP-29-MW-XD5	8.5	ug/l		2.4
BN-EP-29-P106	1,1,1-Trichloroethane	SW8468260B	352	ug/l		BN-EP-29-MW-XD5	377	ug/l		6.9
BN-EP-29-P106	1,1-Dichloroethane	SW8468260B	13.9	ug/l		BN-EP-29-MW-XD5	14.8	ug/l		6.3
BN-EP-29-P106	1,1-Dichloroethene	SW8468260B	56.9	ug/l		BN-EP-29-MW-XD5	60.9	ug/l		6.8
BN-EP-29-P106	Trichloroethene	SW8468260B	245	ug/l		BN-EP-29-MW-XD5	254	ug/l		3.6
BN-EP-29-P106	1,4-Dioxane	SW8468260BBYSIM	16.1	ug/l		BN-EP-29-MW-XD5	19.0	ug/l		16.5

NAS BRUNSWICK- EASTERN PLUME – SEPTEMBER 2006
DATA SUMMARY TABLE –SDG M59141

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-SW10	M59141-1	SW8468260B	09/08/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Toluene	0.73	ug/l	U	0.34	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Acetone	22.2	ug/l	U	1.0	5.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-SEEP10	M59141-10	SW8468260B	09/08/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW338B	M59141-11	SW8468260B	09/11/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Acetone	9.9	ug/l	U	1.0	5.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW338B-M	M59141-12	SW8468260B	09/11/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Chloroform	1.0	ug/l	U	0.59	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW338A	M59141-13	SW8468260B	09/11/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW338A	M59141-13A	SW8468260BBYSIM	09/11/06	1	1,4-Dioxane	1.0	ug/l	U	0.22	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Acetone	10.4	ug/l	U	1.0	5.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW338A-S	M59141-14	SW8468260B	09/11/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Ethylbenzene	1.0	ug/l	UJ	0.20	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Xylene (total)	1.0	ug/l	UJ	1.0	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Carbon tetrachloride	1.0	ug/l	UJ	0.81	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW339	M59141-15	SW8468260B	09/11/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	1,2-Dichloroethane	1.2	ug/l		0.63	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Toluene	1.0	ug/l	U	0.34	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Acetone	10.0	ug/l	U	1.0	5.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Methylene chloride	2.0	ug/l	J	0.65	2.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW339-D	M59141-16	SW8468260B	09/11/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Ethylbenzene	1.0	ug/l	UJ	0.20	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Xylene (total)	1.0	ug/l	UJ	1.0	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Carbon tetrachloride	1.0	ug/l	UJ	0.81	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Acetone	13.6	ug/l	U	1.0	5.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW338C-M	M59141-17	SW8468260B	09/11/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW338C	M59141-18	SW8468260BBYSIM	09/11/06	1	1,4-Dioxane	1.0	ug/l	U	0.22	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Tetrachloroethene	3.7	ug/l		0.54	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	1,2-Dichloroethene (total)	9.5	ug/l		1.0	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	1,1,1-Trichloroethane	45.1	ug/l		0.40	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	1,1-Dichloroethane	5.0	ug/l		0.67	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	1,1-Dichloroethene	8.0	ug/l		1.0	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	Trichloroethene	26.9	ug/l		0.74	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-RAW INFLUENT	M59141-19	SW8468260B	09/07/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-SW11	M59141-2	SW8468260B	09/08/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Ethylbenzene	0.72	ug/l	U	0.20	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Styrene	5.0	ug/l	UJ	0.60	5.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	cis-1,3-Dichloropropene	0.50	ug/l	UJ	0.50	0.50
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	trans-1,3-Dichloropropene	0.50	ug/l	UJ	0.50	0.50
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	1,4-Dichlorobenzene	1.0	ug/l	UJ	0.44	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	1,2-Dichloroethane	1.0	ug/l	UJ	0.63	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	UJ	0.69	5.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Toluene	0.67	ug/l	U	0.34	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Chlorobenzene	1.0	ug/l	UJ	0.40	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Dibromochloromethane	1.0	ug/l	UJ	0.65	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Tetrachloroethene	1.0	ug/l	UJ	0.54	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Xylene (total)	3.3	ug/l	U	1.0	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	1,2-Dichloroethene (total)	1.0	ug/l	UJ	1.0	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	1,3-Dichlorobenzene	1.0	ug/l	UJ	0.47	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Carbon tetrachloride	1.0	ug/l	UJ	0.81	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	2-Hexanone	5.0	ug/l	UJ	5.0	5.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Acetone	5.0	ug/l	UJ	1.0	5.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Chloroform	1.0	ug/l	UJ	0.59	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Benzene	0.50	ug/l	UJ	0.44	0.50
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	1,1,1-Trichloroethane	1.0	ug/l	UJ	0.40	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Bromomethane	2.0	ug/l	UJ	1.1	2.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Chloroethane	2.0	ug/l	UJ	1.3	2.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Vinyl chloride	1.0	ug/l	UJ	1.0	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Methylene chloride	2.0	ug/l	UJ	0.65	2.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Carbon disulfide	5.0	ug/l	UJ	0.79	5.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Bromodichloromethane	1.0	ug/l	UJ	0.47	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	1,1-Dichloroethane	1.0	ug/l	UJ	0.67	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	1,1-Dichloroethene	1.0	ug/l	UJ	1.0	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	1,2-Dichloropropane	2.0	ug/l	UJ	0.62	2.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	2-Butanone (MEK)	5.0	ug/l	UJ	3.3	5.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	1,1,2-Trichloroethane	1.0	ug/l	UJ	0.67	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	Trichloroethene	1.0	ug/l	UJ	0.74	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	UJ	0.69	1.0
BN-EP-29-COMB EFFLUENT	M59141-20	SW8468260B	09/07/06	1	1,2-Dichlorobenzene	1.0	ug/l	UJ	0.65	1.0
BN-EP-29-COMB EFFLUENT	M59141-20A	SW8468260BBYSIM	09/07/06	1	1,4-Dioxane	6.6	ug/l		0.22	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21	SW8468260B	09/07/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-EFFLUENT-XD1	M59141-21A	SW8468260BBYSIM	09/07/06	1	1,4-Dioxane	5.8	ug/l		0.22	1.0
BN-EP-29-MW331	M59141-22	SW8468260BBYSIM	09/12/06	1	1,4-Dioxane	45.5	ug/l	J	0.22	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Tetrachloroethene	2.7	ug/l		0.54	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	1,2-Dichloroethene (total)	94.7	ug/l		1.0	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Benzene	0.50	ug/l	U	0.44	0.50

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	1,1,1-Trichloroethane	183	ug/l		0.40	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	1,1-Dichloroethane	19.6	ug/l		0.67	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	1,1-Dichloroethene	22.5	ug/l		1.0	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	Trichloroethene	100	ug/l		0.74	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW331-M	M59141-23	SW8468260B	09/12/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-P111	M59141-24	SW8468260B	09/12/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW330	M59141-25	SW8468260BBYSIM	09/12/06	1	1,4-Dioxane	1.0	ug/l	U	0.22	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	1,1-Dichloroethane	6.0	ug/l		0.67	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	1,1-Dichloroethene	5.4	ug/l		1.0	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW313-D	M59141-26	SW8468260B	09/12/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	1,1-Dichloroethane	7.2	ug/l		0.67	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	1,1-Dichloroethene	8.6	ug/l		1.0	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW333-M	M59141-27	SW8468260B	09/12/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW335-M	M59141-28	SW8468260B	09/12/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW337-M	M59141-29	SW8468260B	09/12/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-SW13	M59141-3	SW8468260B	09/08/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW313	M59141-30	SW8468260BBYSIM	09/12/06	1	1,4-Dioxane	69.0	ug/l	J	0.22	1.0
BN-EP-29-MW-XD3	M59141-31	SW8468260BBYSIM	09/12/06	1	1,4-Dioxane	70.6	ug/l		0.22	1.0
BN-EP-29-MW333	M59141-32	SW8468260BBYSIM	09/12/06	1	1,4-Dioxane	56.8	ug/l		0.22	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Bromoform	1.0	ug/l	U	0.58	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW335	M59141-33	SW8468260B	09/12/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW337	M59141-34	SW8468260B	09/12/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW229A	M59141-35	SW8468260BBYSIM	09/12/06	1	1,4-Dioxane	2.0	ug/l		0.22	1.0
BN-EP-29-MW229B	M59141-36	SW8468260BBYSIM	09/12/06	1	1,4-Dioxane	1.0	ug/l	U	0.22	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Tetrachloroethene	2.2	ug/l		0.54	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	1,2-Dichloroethene (total)	8.5	ug/l		1.0	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Benzene	0.50	ug/l	U	0.44	0.50

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	1,1,1-Trichloroethane	5.9	ug/l		0.40	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	Trichloroethene	15.6	ug/l		0.74	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-EW1	M59141-37	SW8468260B	09/12/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Tetrachloroethene	8.4	ug/l		0.54	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	1,2-Dichloroethene (total)	11.5	ug/l		1.0	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	1,1,1-Trichloroethane	54.0	ug/l		0.40	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	1,1-Dichloroethane	7.0	ug/l		0.67	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	1,1-Dichloroethene	11.6	ug/l		1.0	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	Trichloroethene	35.6	ug/l		0.74	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-EW2A	M59141-38	SW8468260B	09/12/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-SW12	M59141-39	SW8468260B	09/12/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-SW14	M59141-4	SW8468260B	09/08/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW306	M59141-40	SW8468260BBYSIM	09/13/06	1	1,4-Dioxane	1.0	ug/l	U	0.22	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Tetrachloroethene	7.0	ug/l		0.54	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	1,2-Dichloroethene (total)	8.3	ug/l		1.0	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	1,1,1-Trichloroethane	352	ug/l		0.40	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	1,1-Dichloroethane	13.9	ug/l		0.67	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	1,1-Dichloroethene	56.9	ug/l		1.0	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	Trichloroethene	245	ug/l		0.74	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-P106	M59141-41	SW8468260B	09/13/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-P106	M59141-41A	SW8468260BBYSIM	09/13/06	1	1,4-Dioxane	16.1	ug/l	J	0.22	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Styrene	5.0	ug/l	U	0.60	5.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Tetrachloroethene	6.9	ug/l		0.54	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	1,2-Dichloroethene (total)	8.5	ug/l		1.0	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	1,1,1-Trichloroethane	377	ug/l		0.40	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	1,1-Dichloroethane	14.8	ug/l		0.67	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	1,1-Dichloroethene	60.9	ug/l		1.0	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	Trichloroethene	254	ug/l		0.74	1.0
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW-XD5	M59141-42	SW8468260B	09/13/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW-XD5	M59141-42A	SW8468260BBYSIM	09/13/06	1	1,4-Dioxane	19.0	ug/l	J	0.22	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Ethylbenzene	0.46	ug/l	J	0.20	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Toluene	2.6	ug/l		0.34	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Xylene (total)	1.6	ug/l		1.0	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Acetone	6.9	ug/l		1.0	5.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Benzene	0.52	ug/l		0.44	0.50
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Methylene chloride	2.3	ug/l		0.65	2.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW-QT1	M59141-43	SW8468260B	09/14/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW-QT1	M59141-43A	SW8468260BBYSIM	09/14/06	1	1,4-Dioxane	1.0	ug/l	U	0.22	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-SW-XD1	M59141-5	SW8468260B	09/08/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-SED11	M59141-6	CORPENG81M	09/08/06	1	Total Organic Carbon	28900	mg/kg		1900	1900
BN-EP-29-SED11	M59141-6	EPA1603M	09/08/06	1	Solids, Percent	53.4	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	% Gravel	0.28	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	% Sand	82.1	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	% Silt, Clay, Colloids	17.6	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	0.0015 mm (Hydrometer)	4.8	%	U	4.8	4.8
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	0.005 mm (Hydrometer)	6.5	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	0.030 mm (Hydrometer)	15.0	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	0.375 Inch Sieve	100	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	0.75 Inch Sieve	100	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	1.5 Inch Sieve	100	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	3 Inch Sieve	100	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	No.10 Sieve (2.00 mm)	99.5	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	No.100 Sieve (0.15 mm)	47.4	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	No.16 Sieve (1.18 mm)	98.9	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	No.200 Sieve (0.075 mm)	17.6	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	No.30 Sieve (0.60 mm)	97.1	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	No.4 Sieve (4.75 mm)	99.7	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	No.50 Sieve (0.30 mm)	90.0	%			
BN-EP-29-SED11	M59141-6	ASTMD42263	09/08/06	1	No.8 Sieve (2.36 mm)	99.5	%			
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	Heptachlor epoxide	2.4	ug/kg	U	0.49	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	Endosulfan sulfate	2.4	ug/kg	U	0.43	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	Chlordane	24	ug/kg	U	1.4	24
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	Aldrin	2.4	ug/kg	U	0.33	2.4

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	alpha-BHC	2.4	ug/kg	U	0.25	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	beta-BHC	2.4	ug/kg	U	0.44	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	delta-BHC	2.4	ug/kg	U	0.55	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	Endosulfan-II	2.4	ug/kg	U	0.31	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	4,4'-DDT	2.4	ug/kg	UJ	0.29	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	gamma-BHC (Lindane)	2.4	ug/kg	U	0.27	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	Dieldrin	2.4	ug/kg	U	0.41	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	Endrin	2.4	ug/kg	U	0.36	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	Methoxychlor	2.4	ug/kg	UJ	0.29	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	4,4'-DDD	11.5	ug/kg	J	0.35	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	4,4'-DDE	2.4	ug/kg	U	0.34	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	Endrin aldehyde	2.4	ug/kg	U	0.55	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	Heptachlor	2.4	ug/kg	U	0.37	2.4
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	Toxaphene	120	ug/kg	U	3.0	120
BN-EP-29-SED11	M59141-6	SW8468081	09/08/06	1	Endosulfan-I	2.4	ug/kg	U	0.30	2.4
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Aluminum	5070	mg/kg		2.1	18
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Iron	18300	mg/kg		2.8	9.2
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Lead	22.9	mg/kg		0.14	0.46
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Magnesium	1600	mg/kg		0.63	460
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Manganese	505	mg/kg		0.035	1.4
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Nickel	8.4	mg/kg		0.12	3.7
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Potassium	691	mg/kg		1.8	460
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Silver	0.46	mg/kg	U	0.054	0.46
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Sodium	68.3	mg/kg	J	14.0	460
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Thallium	1.8	mg/kg	UJ	0.44	1.8
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Antimony	1.8	mg/kg	UJ	0.26	1.8
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Arsenic	3.7	mg/kg		0.29	1.8
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Barium	36.7	mg/kg		0.13	18
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Beryllium	0.37	mg/kg		0.12	0.37
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Cadmium	0.37	mg/kg	U	0.028	0.37
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Chromium	9.3	mg/kg		0.12	0.92
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Cobalt	5.3	mg/kg		0.21	4.6
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Copper	7.0	mg/kg		0.076	2.3

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Vanadium	17.3	mg/kg		0.092	4.6
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Zinc	51.3	mg/kg		0.10	1.8
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Calcium	866	mg/kg		0.90	460
BN-EP-29-SED11	M59141-6	SW8466010B	09/08/06	1	Selenium	0.55	mg/kg	J	0.31	0.46
BN-EP-29-SED11	M59141-6	SW8467471A	09/08/06	1	Mercury	0.022	mg/kg	J	0.0069	0.030
BN-EP-29-SED-XD1	M59141-7	EPA1603M	09/08/06	1	Solids, Percent	48.6	%			
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	Heptachlor epoxide	2.6	ug/kg	U	0.52	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	Endosulfan sulfate	2.6	ug/kg	U	0.46	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	Chlordane	26	ug/kg	U	1.5	26
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	Aldrin	2.6	ug/kg	U	0.35	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	alpha-BHC	2.6	ug/kg	U	0.27	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	beta-BHC	2.6	ug/kg	U	0.47	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	delta-BHC	2.6	ug/kg	U	0.59	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	Endosulfan-II	2.6	ug/kg	U	0.33	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	4,4'-DDT	3.9	ug/kg	J	0.31	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	gamma-BHC (Lindane)	2.6	ug/kg	U	0.29	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	Dieldrin	2.6	ug/kg	U	0.45	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	Endrin	2.6	ug/kg	U	0.38	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	Methoxychlor	2.6	ug/kg	UJ	0.31	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	4,4'-DDD	14.4	ug/kg	J	0.37	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	4,4'-DDE	0.96	ug/kg	J	0.37	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	Endrin aldehyde	2.6	ug/kg	U	0.59	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	Heptachlor	2.6	ug/kg	U	0.40	2.6
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	Toxaphene	130	ug/kg	U	3.2	130
BN-EP-29-SED-XD1	M59141-7	SW8468081	09/08/06	1	Endosulfan-I	7.6	ug/kg	J	0.32	2.6
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Aluminum	5560	mg/kg		2.4	21
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Iron	20900	mg/kg		3.3	11
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Lead	25.0	mg/kg		0.17	0.54
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Magnesium	1770	mg/kg		0.74	540
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Manganese	518	mg/kg		0.041	1.6
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Nickel	9.2	mg/kg		0.14	4.3
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Potassium	767	mg/kg		2.1	540
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Silver	0.54	mg/kg	U	0.063	0.54

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Sodium	81.0	mg/kg	J	16.0	540
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Thallium	2.1	mg/kg	UJ	0.52	2.1
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Antimony	2.1	mg/kg	UJ	0.31	2.1
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Arsenic	5.0	mg/kg		0.34	2.1
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Barium	38.8	mg/kg		0.15	21
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Beryllium	0.40	mg/kg	J	0.14	0.43
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Cadmium	0.43	mg/kg	U	0.033	0.43
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Chromium	10.0	mg/kg		0.14	1.1
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Cobalt	5.7	mg/kg		0.24	5.4
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Copper	7.7	mg/kg		0.089	2.7
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Vanadium	19.1	mg/kg		0.11	5.4
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Zinc	57.0	mg/kg		0.12	2.1
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Calcium	943	mg/kg		1.1	540
BN-EP-29-SED-XD1	M59141-7	SW8466010B	09/08/06	1	Selenium	0.69	mg/kg	J	0.37	0.54
BN-EP-29-SED-XD1	M59141-7	SW8467471A	09/08/06	1	Mercury	0.037	mg/kg	J	0.0061	0.027
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Tetrachloroethene	1.4	ug/l		0.54	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Chloroform	1.0	ug/l	U	0.59	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	1,1,1-Trichloroethane	1.1	ug/l	J	0.40	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	Trichloroethene	1.6	ug/l		0.74	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-SEEP11	M59141-8	SW8468260B	09/08/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Tetrachloroethene	1.4	ug/l		0.54	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	1,1,1-Trichloroethane	1.1	ug/l	J	0.40	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	Trichloroethene	1.7	ug/l		0.74	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-SEEP-XD1	M59141-9	SW8468260B	09/08/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0

DATA VALIDATION MEMORANDUM
NAS BRUNSWICK SITES 1 & 3
SEPTEMBER 2006 SAMPLING ROUND 29 (SDG M59258)

TO: ENGINEERING FACILITY COMMAND NORTHEAST

FROM: JACKSON KIKER, ECC SENIOR CHEMIST, MARLBOROUGH, MA

SUBJECT: NAS BRUNSWICK SITES 1 & 3 MONITORING EVENT 29

DATE: 11/3/2006

Project data were validated using the following Validation Functional Guidelines, as modified for non-CLP methods and project-specific QAPP measurement performance criteria (MPC):

1. Region I, EPA-NE Data Validation Functional Guidelines for Evaluation of Environmental Analyses (Dec, 1996),

2. National Functional Guidelines for Evaluation Inorganic Analysis (1988), and

3. National Functional Guidelines for Evaluation Organic Analysis (October 1999).

The data were assessed against the MPC listed in the approved Site 1& 3 and Eastern Plume LTMP QAPP (May 2000). The QAPP MPC and validation guideline exceedences are assessed and documented on the method/QAPP specific data validation worksheets. On these data validation worksheets the data quality acceptance criteria are presented, analytes requiring qualification based on MPC and/or validation guidance criteria exceedences are listed, assigned qualifiers, qualifying rationale is documented, and any potential bias noted. The overall evaluation of the data generated by a method is presented in the data validation worksheet.

Standard EPA Region I data qualifiers are used to denote the assessment of data quality. The final and ranking assigned data qualifier for an analyte is presented in the data summary table. Ancillary qualifiers are noted on the data validation worksheets.

The USEPA Region I Organic Regional Data Assessment (ORDA) sheet displays the summarized results of the data validation assessment for all analytical methods reported in the SDG.

ACRONYMS AND ABBREVIATIONS

Following is a list of acronyms and abbreviations that may be used in the data validation reports.

Acronym or Abbreviation	Definition
%D	Percent difference
%R	Percent recovery
%M	Percent moisture
%S	Percent solids
Ug/L	Microgram per liter
BD	Breakdown
BEHP	2-bis(ethylhexyl)phthalate
BFB	Bromofluorobenzene
CCB	Continuing calibration Blank
CCC	Continuing Check Compound
CCV	Continuing Calibration Verfication
COC	Chain of custody
CRI	standard at RL for ICP
CVAA	Cold vapor atomic absorption
DFTPP	Decafluorotriphenylphosphine
DQO	Data quality objective
EB	Equipment blank
EPA	Environmental Protection Agency
FD	Field duplicate
GC	Gas Chromatography
GC/MS	Gas chromatography/mass spectrometry
HT	Holding time
ICAL	Initial calibration
ICS-A/AB	Interelement check standard A or AB
ICV	Initial calibration verification
IDL	Instrument detection limit
IS	Internal standards
LCL	Lower control limit
LCS	Laboratory control sample
LTMP	Long term monitoring plan
MeCl	Methylene chloride
MS	Matrix spike

Acronym or Abbreviation	Definition
MSD	Matrix spike duplicate
MPC	Measurement performance criteria
NA	Not applicable
NC	Not calculated.
PAH	Polycyclic aromatic hydrocarbon
PCB	Polychlorinated biphenyls
PQL	Practical quantitation limit
QAPP	Quality Assurance Project Plan
QC	Quality control
RF	Response Factor
RPD	Relative percent difference
RRF	Relative response factor
RSD	Relative standard deviation
RT	Retention time
SDG	Sample Delivery Group
SOP	Standard Operation Procedure
SVOC	Semi-volatile organic compound
SPCC	System performance check compound
SQL	Sample Quantitation Limit
TB	Tripblank
TCX	Tetrachloro-m-xylene
TIC	Tentatively identified compound
UCL	Upper control limit
VOC	Volatile organic compound

DATA QUALIFIER REFERENCE TABLE

Data validation reports will summarize the samples reviewed, elements reviewed, any nonconformances with the established criteria, validation actions (including data qualifiers). Data qualifiers will be consistent with EPA Region I – New England guidelines and will consist of the following:

USEPA Region I – Data Qualifier	USEPA Region I – Qualifier Definition
J	The analyte was positively identified; the associated numerical value is the approximate concentration of the analyte in the sample
UJ	The analyte was not detected above the sample reporting limit; and the reporting limit is approximate
U	The sample was analyzed for, but was not detected above the sample reporting limit.
R	The sample result is rejected due to serious deficiencies. The presence or absence of the analyte cannot be verified

Region I, EPA-NE ORGANIC REGIONAL DATA ASSESSMENT

LAB NAME: Northeast Laboratory
SDG #:__M59258
EPA-NE DV TIER LEVEL:___II___
SITE NAME: NAS Brunswick – Sites 1&3

# of SAMPLES/MATRIX: 7 MW & 1 MW FD
VALIDATION CONTRACTOR:__ECC/ASW
VALIDATOR'S NAME: Sherri Pullar
DV Completion Date:_November 3, 2006.
Date Sampled__13 September 2006.

ANALYTICAL DATA QUALITY SUMMARY

		VOC	Metals
1	Preservation and HT	O	O
2	Instrument Performance Check	O	O
3	Initial Calibration:	O	O
4	Continuing Calibration:	M	O
5	Blanks:	O	O
6	Surrogate Compounds:	O	-
7	Internal Standards	O	-
8	Matrix Spike/Matrix Spike Duplicate:	O	O
9	Sensitivity Check:	O	O
10	PE Samples- Accuracy Check	M	M
11	Target Compound Identification:	O	O
12	Compound Quantitation and Reported QLs	O	O
13	Tentatively Identified Compounds:	-	-
14	Semivolatile/Pesticide/PCB Cleanup:	-	-
15	Data Completeness	O	O
16	Overall Evaluation of Data:	O	O

O = Data had no problems or were qualified due to minor contractual problems; M = Data were qualified due to major/systemic MPC exceedences: Z = Data were rejected as unusable due to major contractual problems.

ACTION ITEMS: (Z items): None.

AREAS OF CONCERN: (M items):

VOC: J for all samples with estimated results <MRL but >MDL. Results for tetrachloroethane and chlorobenzene in samples 7/8 were qualified J for detects and UJ for non-detects due to Field Duplicate RPDs outside MPC limits. Non-detect results for bromoform & tetrachloroethene were qualified UJ in samples 1-8 due to CCV %D>MPC limits.

Metals: Results for thallium and arsenic in samples 7/8 were qualified J for detects and UJ for non-detects due to Field Duplicate RPDs outside MPC limits. Analytes <MRL but >IDL are qualified J. Results for Cu & Zn were qualified J in samples 1-5 & 7-8 due to laboratory duplicate RPD outside MPC limits.

COMMENTS:

ECC Region I Data Review Worksheet (rv 3) **VOCs 5030B/5035/8260B**
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance

Data Validation Level	Matrix	Preservation	Temp Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**HCl**	**1 cooler – Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59258**

Field Identification and Laboratory Number of Samples Evaluated:

Field ID	Lab Sample Number
BN-1&3-29-MW1302D	M59258-1
BN-1&3-29-MW1301S	M59258-2
BN-1&3-29-MW1301D	M59258-3
BN-1&3-29-MW1303AD	M59258-4
BN-1&3-29-MW217B	M59258-5
BN-1&3-29-MW217B-D	M59258-6
BN-1&3-29-MW1302S	M59258-7
BN-1&3-29-MWXD1	M59258-8 (field duplicate for M59258-7)

Note: Samples are described below in the data worksheets by reference to the last 2 digits of the Lab Sample Number.

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects preserved per method (amber bottles, temperature, HCl (aq), MeOH/NAHSO4 (soils) (J, UJ, or R (function of HT and compound)	Cooler temperatures < 6 ^oC. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. No samples qualified.	X	-	
Holding Time	1) 14 Days to analysis, if preserved 2) J –detects, UJ or R –nondetects (function of time) 3) *transcription errors	Analyzed within holding time.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made. 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	NA	-	-	
Lab Blanks (method blanks)	1) < 5x (<10x common) contaminants for aq samples- 2) <10X common contaminants – acetone, 2-butanone or Mecl. 1) TGT analytes <Lab QL 2) if linear range is exceeded, verify if a instrument blank was performed 3) *verify accurate transcription of times, Ids, are reported on forms 4) *verify from the raw data if the instrument blank was performed in the same vessel 5) *verify IS, RRT, and surrogate %R *check 10% of raw chromatograms for false +/-, check for transcription errors	Samples were analyzed in 1 batch: 20 Sep 06: No associated detection. All method blank results were non-detect for COCs. No samples qualified.	X	-	

ECC Region I Data Review Worksheet (rv 3) VOCs 5030B/5035/8260B
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
Trip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate cross matrix TB (X rules apply to raw data) 4) MeCl & Acetone < 5 5) >RL report sample level U 6) <RL report PQL as U	Not collected/analyzed with this SDG.	X	-	
Equip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate TB (X rules don't apply) 3) MeCl & Acetone < 5 *Check IS area (10% of them) * recalculate surrogate (%R – 10 % of them)	Not collected/analyzed with this SDG.	-	-	
Results > Cal Range or <Cal Range	6) >Upper Cal Range J-detects - ensure instrument blank performed 7) <PQL but >MDL – J –detects (estimated) listed on data summary sheet.	Attached data summary table. Analytes with results >MDL but <MRL: were qualified J.	X	J for all samples with estimated results <MRL but >MDL.	
*TICs (if reported)	1) *verify library search for samples and blanks 2) verify TICs were not misreported compounds (different fraction or miss in search) 3) All TICs – J estimated 4) * verify blanks do not contain TIC peaks 5) * check TIC assignment spectra to STD spectra 6) *review blank and Samples for common lab contaminants	None Reported/not evaluated	-	-	
Surrogates	1,2-Dichloroethane-d4 76-114% Dibromofluoromethane 86-118% Toluene-d8 88%-110% 4-BFB 86%-115% *check raw data for surrogated (recalculate 10% of them). *Transcription errors Qualification: >UCL J –detects, %R<10% J –detects, R –Nods, %R >10% but <70% J-detects, UJ NDs	All surrogate recoveries were within QAPP MPC limits. No samples qualified.	X	-	
LCS Recovery	1) Attachment A-2 of LTMP 2) All VOCs 60-140% 3) 10% and <LCL% J detects, UJ –Nods 4) >UCL% J detects <10% R NDs, J-detects 7) *Recalculate the concentrations for one compound in the LCS 8) * Recalucate the %R (within 10% of lab) Note: Tier guidance as a zero blind	All LCS recoveries were within MPC limits, except LCS %R's for: LCS %R>UCL – bromoform. These compounds were not detected in the native samples, therefore no sample were qualified.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
LCSD RPD	RPD ≤20% (aq) not a QAPP required QC check. Evaluated using MS/MSD RPD criteria. J- detects	All LCS/LCSD RPDs were within MPC limits.	X	-	
*MS/MSD/unspike sample RSD	1)For unspiked compounds if reported, Non- MS spike compounds <50% RSD calculated from MS/MSD/Unspiked Qualification: >50% RSD J-detects 2)*recalculate the RPD (within 10% of lab)	NA	-	-	
*Compound Quantitation (completed as part of other steps)	1) Check sensitivy (MDL< 1/3 PQL) 2) *Recalculate one detection and quantitation limit 3) *verify concentrations have been adjusted to account for DW, DF, 4) *verifiy correct IS and RRF were used	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 8) *Matrix effects- MS/MSD, surrogated, PDS. 9) *System chromatography- evaluate RRTs, peaks shapes, system impacts on data, baseline shifts. 10) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
*TGT Compound Identification	1) *Within 0.06 (30 sec) of CCV RRT 2) * compare sample Mass spectra to standard spectra; a) all ions in std spectra (with 10% rel intensity) presnent in sample spectra. B) sample ion abundance within 20% of standard spectra. 3) *chromatogram: all peaks greater than 10% of nearest IS identified.	All detections are acceptable. No samples qualified.	X	-	
Single Blind PE	1) Qualify associated samples in PES batch PES = ND, Detects J – ND PE analytes in samples, NDs – R 11) PES > acceptance criteria – Detects in samples J, 12) PES<acceptance criteria – Detects J, NDs –R 13) VOA/SV-XI14 other criteria 14) *% of PES sample above and below criteria *Recalculate concentrations for one tgt compound per PES (10% of lab)	NA	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
MS/MSD Recovery	1) Attachment A-2 of LTMP 2) 60-140% for all VOCs (if MS > 4X native levels) Qualification of MS sample: <10% J detects, R NDs >10% and <LCL% J detects, UJ -NDs >UCL% J detects 3) *Recalculate the concentrations for one compound in the MS/MSD * Recalculate the %R (within 10% of lab)	MS/MSD were run on sample M59258-7. All MS/MSD recoveries within MPC limits.	X	-	-
MS/MSD RPD	RPD ≤20% (aq/S) (when MS >QL) J – detects in MS sample UJ-non detects * recalculate RPD	MS/MSD were run on sample M59258-7. All MS/MSD RPDs were inside MPC limits. No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 30% aq. ≤ 50 soil for Results > PQL (FD pair only) J-detects (both > PQL) 2) Note: FD RPD not specified in QAPP. 30% will be used as the MPC, to be consistent with other NASB QAPPs. 3) If one >PQL, other ND, J-detections, UJ non-detect 4) Other conditions use judgement 5) Determine RPD for detects only. *Recalculate the concentrations for one compound and the PQL	Field sample Field duplicate 7 8 The FD pair 7/8; tetrachloroethane was detected in the field duplicates but was non-detect in native sample and chlorobenzene wasnon-detect in field duplicate but was detected in the native sample. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.	X	Results for tetrachloroethane and chlorobenzene in samples 7/8 were qualified J for detects and UJ for non-detects.	
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 6) * performed annually 7) *MDL is at least ½ of PQL 8) *tgt and surrogate 80-120% R *VOA/SV-X11 (recalcuate %RSD and %R for three compounds (10% of them).	NA	-	-	
Internal Stds	1) IS are –50% to 200% of last Ical, or CCV 3) RRT<0.06 (30 sec) 4) IS>100% J-detects 5) IS<20%CCV NDs – R 6) IS>20%CCV <50%CCV NDs – UJ 7) *check for IS transcription errors 8) FBZ = fluroobenzene 9) CBZ = chlorobenzene-d5 10) DCB = 1,4 dichlorobenzene-d4	Internal standards and RT's within MPC limits.	X	-	
Sensitivity	1) MDL study – 7 replicates (40 CFR) 2) Surrogates %in control limits. 3) %R <10 ND- (R) , J- detects 4) 10%> but <LCL% , judgement 5) %R>UCL% J-detects 5) QC, IS, RRT meet criteria, 6) %RSD < 20% 7) MDL< MQL (3x less ideal)	Sensitivity is acceptable.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
	8) Lab fortitied blank (see VOA/SV Part II –section X). 9) *Check and recalculate %RSDs and %R for three compounds (with 10% of lab) Dilution factors for samples – impacts to sensitivity				
Tune check	1) ion abundance with method limits 2) *check for co-elution /proper background subtraction 3) *compare reported data to raw data	All tunes within MPC limits.	X	-	
Initial Cal Multipoint (instrument evaluation)	1) correct calibration stds 2) within 12 hours of the tune check 3) CCCs %RSD: <30% (1,1 DCE, chloroform, 1,2dichloropropane, Toluene, EB, VC (J –detects, R or UJ NDs all samples associated with Ical) 4) SPCCs Average RRF: SPCCs Chloromethane >0.10, 1,1 DCA>0.10, bromoform >0.10, chlorobenzene>0.3, 1122TCA>0.3 (J –detects, R/UJ NDs) 5) RRF>0.05 all compounds 6) RRT < 0.06 units (all stds within 30 sec) 7) %RSD<15% for all non-CCCs or COD>0.99 *8) RRF exclusions: surrogates, acetone, MeCL, chloroethane/methane, CS, 1,/22/03 2-butanone, 1,2 dichloropropane, 2-hexanone (IV-8)./* 9) *verify that instrument parameters met method and that Ical and analysis used the same parameters 10) *recalculate RRF one tgt compound associated with each IS. Recalculated values within 10% of lab values. 11) *recalculate one tgt compound associated with each IS. Recalculated values within 10% 12) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 13) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument; 5973G 07 Sep 2006 All RRF's within MPC limits for all VOC's of concern. All CCCs are in MPC. All SPCC are in MPC.	X	-	
Initial Cal (Linearity)	%RSD < 15% use average RF for calibration %RSD> 15% use least squares COD (r2) > 0.990 or correlation coefficient r> 0.995 Qualification for compounds with : %RSD>30% and RRF>0.05 – J detects, UJ - NDs %RSD<30% and RRF<0.05; -J detects, R - ND %RSD>30% and RRF<0.05: J detects, R - ND (see VOA/SVIII-4)	Instrument; 5973G 07 Sep 2006 All %RSD < 30 or were fitted with linear or quadratic curves. These curves were provided by the laboratory for evaluation. No samples qualified.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
2nd Source ICV	QC check nor criteria not specified in QAPP. %D<25% or %R (between ICV and Ical) analytes 80%--120% (+ or -) once per 5 pt cal used to evaluate data sets. Qualification: J detects, R or UJ NDs	Instrument; 5973G 07 Sep 2006 All %D's within MPC limits for all VOC's of concern.	X	-	
CCV	1) SPCCs Average RRF: SPCCs Chloromethane >0.10, 1,1 DCA>0.10, bromoform >0.10, chlorobenzene>0.3, 1122TCA>0.3 2) RRF all compounds > 0.05 3) CCC: (1,1 DCA, chloroform, 1,2dichloropropane, Toluene, EB, VC) %D<20% (or all analytes if no CCCs reported). 4) Qualification-J detects, R or UJ NDs 5) *verify same instrument and parameters 6) *Recalculate RRF for one tgt cmpd associated with each IS. (within 10%) 7) *Recalculate %D for one tgt cmpd associated with each IS (within 10%) 8) *IS RRT<0.06 units (30 sec) 9) * IS area -50 % to 100 % of last ICAL 10) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 11) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument; 5973G 20 Sep 2006 All %D's with MPC limits with the exception of tetrachloroethene & bromoform.	X	Non-detect results for bromoform & tetrachloroethene were qualified UJ in samples 1-8.	
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Laboratory precision and accuracy are acceptable. LCS %R's inside MPC limits. All MS/MSD recoveries within MPC. Surrogates were inside MPC limits. J for all samples with estimated results <MRL but >MDL. The reported MRL's and MDL's provide adequate sensitivity to support evaluation against MEG and MCL's for all compounds except vinyl chloride. Tune checks within MPC limits. ICALs: SPCC was inside MPC limits. ICV: within limits with the exception of chlormethane. CCV: tetrachloroethene & bromoform were outside the limits. Method blank samples were non-detect for all VOCs.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
		Sampling Error Evaluation: Tripblank was not collected/analyzed with this SDG. Field sample Field duplicate 7 8 The FD pair 7/8; tetrachloroethane was detected in the field duplicates but was non-detect in native sample and chlorobenzene wasnon-detect in field duplicate but was detected in the native sample. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.			

* Tier III review items only.

Completeness Check: Inventory Check Sheet_____X__. Sample Quantitation Calculations (TIER III only):

Lab Correspondence: None.

ECC Region I Data Review Worksheet (rv 3) **Metals 6010B/7041/7470A/7471A/7740/7841**
Project: NAS Brunswick Sites 1 & 3 ECC Job No. 5700 Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

Data Validation Level	Matrix	Preservation	Temperature Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**Nitric Acid**	**1 cooler – Temp (^{o}C): <6 ^{o}C**	**Accutest Laboratories Marlborough, MA**	**SDG: M59258**

Field Identification of Samples Evaluated:

Field ID	Lab Sample Number
BN-1&3-29-MW1302D	M59258-1
BN-1&3-29-MW1301S	M59258-2
BN-1&3-29-MW1301D	M59258-3
BN-1&3-29-MW1303AD	M59258-4
BN-1&3-29-MW217B	M59258-5
BN-1&3-29-MW217B-D	M59258-6
BN-1&3-29-MW1302S	M59258-7
BN-1&3-29-MWXD1	M59258-8 (field duplicate for M59258-7)

Note: Samples are described below in the data worksheets by reference to the last three digits of the Lab Sample Number

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects 3) preserved per method (amber bottles, temperature. J, UJ, or R (function of HT and compound)	Cooler temperatures <6°C. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. Sample preservation within limits. No samples qualified.	X	-	
Holding Time	1) 180 days (6010), Hg 28 Days to analysis 2) J –detects, UJ or R –nondetects (function of time)	All samples analyzed within holding time. No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 30% water and ≤ 50 soil (no QAPP Criteria) for Results > X PQL (FD pair only) J-detects (both > X PQL) 2) If one >X PQL, other ND, J-detections, UJ non-detect	Field Sample Field Duplicate 7 8 The FD pair 7/8; arsenic was detected in the field duplicates but was non-detect in native sample and thallium was non-detect in field duplicate but was detected in the native sample. For individual RPD values for detected results please see attached field duplicate worksheet.	X	Results for thallium and arsenic in samples 7/8 were qualified J for detects and UJ for non-detects.	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs –R	NA	X	-	

ECC Region I Data Review Worksheet (rv 3) Metals 6010B/7041/7470A/7471A/7740/7841
Project: NAS Brunswick Sites 1 & 3 ECC Job No. 5700 Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
Results > Cal Range or <Cal Range	1) >Upper Cal Range J-detects - ensure instrument blank performed 2) <MRL but >MDL – J –detects (estimated)	Analytes <MRL but >IDL are qualified J	X	Analytes <MRL but >IDL are qualified J	
Lab Blanks (method blank or preparation blank)	1) Once per sample batch 2) Results > QL; sample results <5X ; sample result U (nd) 3) Sample results >5X blank level; no action	Preparation blanks were non-detect for all metals.	X	-	
LCS Recovery	1) once per sample batch 2) 80-120% ICP metals and Hg. 3) <LCL% Reject 4) >UCL% detects J	All LCS %R's were within MPC limits. No samples qualified. Laboratory precision is acceptable.	X	-	
LCS/LCSD RPD	1) RPD<20%	All 6010B/Hg/Sb/As/Pb/Se/Tl- LCS/LCSD RPDs are within MPC limits.	X		
MS Recovery	1) 75-125% ICP metals and Hg if MS > 4X native levels) Qualification of MS sample: 2) <30% J detects, R NDs 3) 30%--74%, detects J, NDs UJ 4) >125% J detects	Field samples M9258-7 used for MS. MS recoveries within MPC limits.	X	-	
MS/MSD RPD	MS/MSD RPD<20%	All 6010B & Hg/ Sb/As/Pb/Se/Tl MS/MSD RPDs within limits.	X	-	
Laboratory Replicate RPD	RPD < 20% No QAPP criteria provided	All 6010B & Hg/ Sb/As/Pb/Se/Tl MS/MSD RPDs within limits with the exception of Cu and Zn. Laboratory precision is acceptable.	X	Results for Cu & Zn were qualified J in samples 1-5 & 7-8.	
Sensitivity*	1) MDL study – 7 replicates (40 CFR) 2) check and recalculate %RSDs and %R fir three compounds (with 10% of lab)	All results in calibration range. No dilutions required.	X	-	
Equip Blank	< 5x contaminants for aq samples – for soil indicate EB (X rules don't apply)	Not collected/analyzed with this SDG	-	-	
Negative blanks	If negative values are reported for an analyte with absolute value >DL and sample value is <5X the absolute value of the blank or is nondetect Qualify detects as estimated (J) Nondetects as estimated (UJ)	No negative blank detections. No samples qualified.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
Initial Cal Multipoint	1) Blank and 3 standards covering range of instrument. 2) high standard verification +/- %5 3) Hg 5-point calibration COD>0.99	ICP-AES samples. All COD's > 0.99 in all initial calibration runs for all methods. No sample qualifications. Hg ICaL within limits.	X	-	
Initial Calibration Blanks (ICB)	1) Ical blank after Ical 2) Results > QL; sample results <5X ; sample result U (nd) 3) Blank concentrations < project RLs 4) Sample results >5X blank level; no action 5) ABS >RL then J qualify data	No 6010B/Hg/ Sb/As/Pb/Se/Tl ICB detections – no samples qualified.	X	-	
Continuing Calibration Blanks (CCB)	1) CCB every 10 samples end of run 2) Blank concentrations < project RLs 3) Results > QL; sample results <5X ; sample result U 4) Sample results >5X blank level; no action ABS >RL then J qualify data.	No 6010B/Hg/ Sb/As/Pb/Se/Tl CCB detections – no samples qualified.	X	-	
Serial Dilution	1) once per digestion batch 2) Not required per QAPP- no criteria provided. 3) %D<10% 4) %D not evaluated if element results is <50X IDL 5) J detects, UJ non-detects.	Field sample M59258-7 for SD. %D's within MPC limits with the exception of Sb, Pb, Se, Cu, Tl, and Zn. Native sample results for Sb, Pb, Se, Cu, Tl, and Zn were <50X IDL, no samples qualified.	X	-	
Interelement checks ICS-A, ICS-AB Instrument performance check	1) start of sequence 2) 80-120% target analytes 3) >120% ; detects J (ICS-AB) 4) 50%-79% R ICS-AB; detects J, NDs – UJ 5) <50% R – reject data 6) ICS-A response > DL and samples have <5X ICS-A response: detects J (if DL is <10 ug/l use 2X DL). 7) Absolute value of negative ICS-A response>DL and sample detects <5X ICS-A response: detects J, NDs as UJ 8) If the ICS-A is within limits, the ICS-AB may not be analyzed (USACE Shell)	Both ICS-A and ICS-AB %R's within MPC limits for all runs.	X	-	
2nd Source ICV	1) following calibration 2) 90- 110% Recovery (6010/7000) 3) 75%-89% R – detects J, NDs – UJ 4) 111-125% R – detects J 5) outside 75-125% R – reject data (R) Hg 80-120%	6010B/Hg/ Sb/As/Pb/Se/Tl ICV %R's within MPC limits the initial calibration. No samples qualified.	X	-	
CCV	1) every 10 samples and end of run 2) 90- 110% Recovery (6010) Hg; 80-120% 3) 6010: 75%-89% R Hg, 65-79% R; – detects J, NDs – UJ. 4) 6010: 111-125%, Hg: 121-135% detects J 6010: outside 75-125%, Hg; outside 65-135%; R – reject data (R)	6010B/Hg/ Sb/As/Pb/Se/Tl CCV %R's within MPC limits. No samples qualified.	X	-	
Post Digestion Spike	1) Analyze if MS >MPC (QAPP) 2) 85- 115%R (QAPP Attachment A-1)	NA	-	-	

ECC Region I Data Review Worksheet (rv 3) Metals 6010B/7041/7470A/7471A/7740/7841
Project: NAS Brunswick Sites 1 & 3 ECC Job No. 5700 Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 3) * performed annually 4) *MDL is at least ½ of PQL *tgt and surrogate 80-120% R	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 3) *Matrix effects- MS/MSD, surrogated, PDS. 4) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
Tune Check	Within Method limits.	NA	-		
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Method 6010B; metals except for Hg. The LCS %R;s are within limits. MS %R's within MPC limits.. MS/MSD RPDs within limits. The LCS/LCSD RPDs were within limits. All RPDs within limits with the exception of Cu and Zn. Laboratory precision is acceptable as determined by the laboratory duplicate. Hg, Sb, Pb, Se, Cu, Tl, and Zn. analytical precision and accuracy within MPC limits. Lab preparation blank; non-detected for all analytes. ICAL: COD within limits. ICV: in limits CCV: in limits Sampling Error Evaluation: Field Sample Field Duplicate 7 8 The FD pair 7/8; arsenic was detected in the field duplicates but was non-detect in native sample and thallium was non-detect in field duplicate but was detected in the native sample. For individual RPD values for detected results please see attached field duplicate worksheet.	X	-	

*TIER III DATA VALIDATION ONLY Completeness Check: Inventory Check Sheet___X_Sample Quantitation Calculations (TIER III DATA VALIDATION ONLY):

FIELD DUPLICATE WORKSHEET

SDG: M59258

Analyte	Analytical Method	Result	Units	Qualifier	Field Duplicate Id	Result	Units	Qaulifier	FD RPD (%)
Lead	SW8466020	0.19	ug/l		BN-1&3-29-MWXD1	0.16	ug/l		17.1
Thallium	SW8466020	0.22	ug/l	J	BN-1&3-29-MWXD1	1.0	ug/l	UJ	NC
Antimony	SW8466020	0.48	ug/l		BN-1&3-29-MWXD1	0.50	ug/l		4.1
Arsenic	SW8466020	2.0	ug/l	UJ	BN-1&3-29-MWXD1	2.0	ug/l	J	NC
Selenium	SW8466020	1.3	ug/l		BN-1&3-29-MWXD1	1.2	ug/l		8
Iron	SW8466010B	1380	ug/l		BN-1&3-29-MWXD1	1530	ug/l		10.3
Magnesium	SW8466010B	5490	ug/l		BN-1&3-29-MWXD1	5370	ug/l		2.2
Manganese	SW8466010B	384	ug/l		BN-1&3-29-MWXD1	373	ug/l		2.9
Nickel	SW8466010B	14.3	ug/l		BN-1&3-29-MWXD1	14.0	ug/l		2.1
Potassium	SW8466010B	14800	ug/l		BN-1&3-29-MWXD1	14800	ug/l		0
Sodium	SW8466010B	3460	ug/l		BN-1&3-29-MWXD1	3450	ug/l		0.3
Barium	SW8466010B	31.5	ug/l		BN-1&3-29-MWXD1	31.1	ug/l		1.3
Copper	SW8466010B	1.6	ug/l		BN-1&3-29-MWXD1	1.2	ug/l		28.6
Zinc	SW8466010B	7.4	ug/l		BN-1&3-29-MWXD1	8.9	ug/l		18.4
Calcium	SW8466010B	83500	ug/l		BN-1&3-29-MWXD1	80900	ug/l		3.2
Chlorobenzene	SW8468260B	0.40	ug/l	J	BN-1&3-29-MWXD1	1.0	ug/l	UJ	NC
Chloroethane	SW8468260B	35.6	ug/l		BN-1&3-29-MWXD1	39.8	ug/l		11.1
1,1-Dichloroethane	SW8468260B	2.7	ug/l		BN-1&3-29-MWXD1	2.6	ug/l		3.8
1,1,2,2-Tetrachloroethane	SW8468260B	1.0	ug/l	UJ	BN-1&3-29-MWXD1	0.74	ug/l	J	NC

NAS BRUNSWICK- EASTERN PLUME – SEPTEMBER 2006
DATA SUMMARY TABLE –SDG M59258

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-MW1302D	M59258-1	SW8466020	09/13/06	2	Lead	1.8	ug/l		0.044	1.0
BN-1&3-29-MW1302D	M59258-1	SW8466020	09/13/06	2	Thallium	0.24	ug/l	J	0.17	1.0
BN-1&3-29-MW1302D	M59258-1	SW8466020	09/13/06	2	Antimony	0.49	ug/l	J	0.24	4.0
BN-1&3-29-MW1302D	M59258-1	SW8466020	09/13/06	2	Arsenic	3.1	ug/l		1.6	2.0
BN-1&3-29-MW1302D	M59258-1	SW8466020	09/13/06	2	Selenium	1.1	ug/l	J	0.61	10
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Aluminum	1600	ug/l		23.0	200
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Iron	2830	ug/l		30.0	100
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Magnesium	32200	ug/l		6.9	5000
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Manganese	4280	ug/l		0.38	15
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Nickel	13.5	ug/l	J	1.3	40
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Potassium	6190	ug/l		20.0	5000
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Sodium	43400	ug/l		150	5000
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Barium	22.5	ug/l	J	1.4	200
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Cadmium	1.2	ug/l	J	0.31	4.0
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Chromium	15.9	ug/l		1.3	10
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Cobalt	3.4	ug/l	J	2.2	50
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Copper	5.7	ug/l	J	0.83	25
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Vanadium	4.0	ug/l	J	1.0	50
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Zinc	11.7	ug/l	J	1.1	20
BN-1&3-29-MW1302D	M59258-1	SW8466010B	09/13/06	1	Calcium	68700	ug/l		9.8	5000
BN-1&3-29-MW1302D	M59258-1	SW8467470A	09/13/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	1,2-Dichloroethane	1.0	ug/l		0.63	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	4-Methyl-2-pentanone	5.0	ug/l	U	0.69	5.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
					(MIBK)					
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Chlorobenzene	1.8	ug/l		0.40	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Tetrachloroethene	1.0	ug/l	UJ	0.54	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	1,2-Dichloroethene (total)	1.2	ug/l		1.0	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Benzene	0.47	ug/l	J	0.44	0.50
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	1,1,1-Trichloroethane	13.9	ug/l		0.40	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Chloroethane	68.1	ug/l		1.3	2.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Vinyl chloride	2.2	ug/l		1.0	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	1,1-Dichloroethane	93.4	ug/l		0.67	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	1,1-Dichloroethene	1.6	ug/l		1.0	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-MW1302D	M59258-1	SW8468260B	09/13/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-MW1301S	M59258-2	SW8466020	09/13/06	2	Lead	0.65	ug/l	J	0.044	1.0
BN-1&3-29-MW1301S	M59258-2	SW8466020	09/13/06	2	Thallium	1.0	ug/l	U	0.17	1.0
BN-1&3-29-MW1301S	M59258-2	SW8466020	09/13/06	2	Antimony	0.70	ug/l	J	0.24	4.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-MW1301S	M59258-2	SW8466020	09/13/06	2	Arsenic	2.0	ug/l	U	1.6	2.0
BN-1&3-29-MW1301S	M59258-2	SW8466020	09/13/06	2	Selenium	0.78	ug/l	J	0.61	10
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Aluminum	65.1	ug/l	J	23.0	200
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Iron	9850	ug/l		30.0	100
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Magnesium	64400	ug/l		6.9	5000
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Manganese	2410	ug/l		0.38	15
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Nickel	10.3	ug/l	J	1.3	40
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Potassium	5810	ug/l		20.0	5000
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Sodium	69400	ug/l		150	5000
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Barium	66.9	ug/l	J	1.4	200
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Chromium	10	ug/l	U	1.3	10
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Cobalt	2.6	ug/l	J	2.2	50
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Copper	5.7	ug/l	J	0.83	25
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Vanadium	50	ug/l	U	1.0	50
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Zinc	14.2	ug/l	J	1.1	20
BN-1&3-29-MW1301S	M59258-2	SW8466010B	09/13/06	1	Calcium	138000	ug/l		9.8	5000
BN-1&3-29-MW1301S	M59258-2	SW8467470A	09/13/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Chlorobenzene	3.0	ug/l		0.40	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Tetrachloroethene	1.0	ug/l	UJ	0.54	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	1,2-Dichloroethene (total)	2.4	ug/l		1.0	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Benzene	0.54	ug/l		0.44	0.50
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	Trichloroethene	1.7	ug/l		0.74	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-MW1301S	M59258-2	SW8468260B	09/13/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-MW1301D	M59258-3	SW8466020	09/13/06	2	Lead	5.2	ug/l		0.044	1.0
BN-1&3-29-MW1301D	M59258-3	SW8466020	09/13/06	2	Thallium	1.0	ug/l	U	0.17	1.0
BN-1&3-29-MW1301D	M59258-3	SW8466020	09/13/06	2	Antimony	0.63	ug/l	J	0.24	4.0
BN-1&3-29-MW1301D	M59258-3	SW8466020	09/13/06	2	Arsenic	2.0	ug/l	U	1.6	2.0
BN-1&3-29-MW1301D	M59258-3	SW8466020	09/13/06	2	Selenium	1.3	ug/l	J	0.61	10
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Aluminum	9840	ug/l		23.0	200
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Iron	14500	ug/l		30.0	100
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Magnesium	70100	ug/l		6.9	5000
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Manganese	1530	ug/l		0.38	15

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Nickel	81.9	ug/l		1.3	40
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Potassium	14000	ug/l		20.0	5000
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Sodium	198000	ug/l		150	5000
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Barium	107	ug/l	J	1.4	200
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Beryllium	1.5	ug/l	J	1.3	4.0
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Chromium	113	ug/l		1.3	10
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Cobalt	11.6	ug/l	J	2.2	50
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Copper	20.7	ug/l	J	0.83	25
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Vanadium	20.1	ug/l	J	1.0	50
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Zinc	58.5	ug/l	J	1.1	20
BN-1&3-29-MW1301D	M59258-3	SW8466010B	09/13/06	1	Calcium	123000	ug/l		9.8	5000
BN-1&3-29-MW1301D	M59258-3	SW8467470A	09/13/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	1,2-Dichloroethane	1.3	ug/l		0.63	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Tetrachloroethene	1.0	ug/l	UJ	0.54	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	1,2-Dichloroethene (total)	7.3	ug/l		1.0	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Chloroform	1.0	ug/l	U	0.59	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Vinyl chloride	10.9	ug/l		1.0	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	1,1-Dichloroethane	0.72	ug/l	J	0.67	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	Trichloroethene	1.5	ug/l		0.74	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-MW1301D	M59258-3	SW8468260B	09/13/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8466020	09/13/06	2	Lead	0.81	ug/l	J	0.044	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8466020	09/13/06	2	Thallium	1.0	ug/l	U	0.17	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8466020	09/13/06	2	Antimony	0.55	ug/l	J	0.24	4.0
BN-1&3-29-MW1303AD	M59258-4	SW8466020	09/13/06	2	Arsenic	47.5	ug/l		1.6	2.0
BN-1&3-29-MW1303AD	M59258-4	SW8466020	09/13/06	2	Selenium	1.5	ug/l	J	0.61	10
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Aluminum	1290	ug/l		23.0	200
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Iron	18400	ug/l		30.0	100
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Magnesium	31900	ug/l		6.9	5000
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Manganese	1530	ug/l		0.38	15
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Nickel	10.2	ug/l	J	1.3	40
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Potassium	4730	ug/l	J	20.0	5000
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Sodium	31200	ug/l		150	5000
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Barium	23.5	ug/l	J	1.4	200
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Beryllium	4.0	ug/l	U	1.3	4.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Chromium	8.8	ug/l	J	1.3	10
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Cobalt	10.7	ug/l	J	2.2	50
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Copper	2.4	ug/l	J	0.83	25
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Vanadium	2.2	ug/l	J	1.0	50
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Zinc	18.1	ug/l	J	1.1	20
BN-1&3-29-MW1303AD	M59258-4	SW8466010B	09/13/06	1	Calcium	66900	ug/l		9.8	5000
BN-1&3-29-MW1303AD	M59258-4	SW8467470A	09/13/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	1,2-Dichloroethane	1.1	ug/l		0.63	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Tetrachloroethene	1.0	ug/l	UJ	0.54	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Acetone	15.4	ug/l		1.0	5.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Chloroethane	6.4	ug/l		1.3	2.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-MW1303AD	M59258-4	SW8468260B	09/13/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-MW217B	M59258-5	SW8466020	09/13/06	2	Lead	22.3	ug/l		0.044	1.0
BN-1&3-29-MW217B	M59258-5	SW8466020	09/13/06	2	Thallium	0.22	ug/l	J	0.17	1.0
BN-1&3-29-MW217B	M59258-5	SW8466020	09/13/06	2	Antimony	4.0	ug/l		0.24	4.0
BN-1&3-29-MW217B	M59258-5	SW8466020	09/13/06	2	Arsenic	442	ug/l		1.6	2.0
BN-1&3-29-MW217B	M59258-5	SW8466020	09/13/06	2	Selenium	4.7	ug/l	J	0.61	10
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	50	Iron	6210000	ug/l		1500	5000
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	200	Cadmium	800	ug/l	U	62.0	800
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Aluminum	14000	ug/l		45.0	400
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Magnesium	19800	ug/l		14.0	10000
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Manganese	3720	ug/l		0.76	30
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Nickel	298	ug/l		2.5	80
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Potassium	6160	ug/l	J	39.0	10000
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Silver	16.6	ug/l		1.2	10
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Sodium	52100	ug/l		300	10000
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Barium	1540	ug/l		2.9	400
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Beryllium	4.7	ug/l	J	2.6	8.0
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Chromium	265	ug/l		2.7	20
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Cobalt	117	ug/l		4.5	100
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Copper	403	ug/l	J	1.7	50
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Vanadium	713	ug/l		2.0	100
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Zinc	2390	ug/l	J	2.2	40

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-MW217B	M59258-5	SW8466010B	09/13/06	2	Calcium	97600	ug/l		20.0	10000
BN-1&3-29-MW217B	M59258-5	SW8467470A	09/13/06	1	Mercury	0.20	ug/l		0.045	0.20
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Chlorobenzene	2.1	ug/l		0.40	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Tetrachloroethene	1.0	ug/l	UJ	0.54	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Acetone	11.7	ug/l		1.0	5.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Vinyl chloride	1.4	ug/l		1.0	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-MW217B-D	M59258-6	SW8468260B	09/13/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-MW1302S	M59258-7	SW8466020	09/13/06	2	Lead	0.19	ug/l	J	0.044	1.0
BN-1&3-29-MW1302S	M59258-7	SW8466020	09/13/06	2	Thallium	0.22	ug/l	J	0.17	1.0
BN-1&3-29-MW1302S	M59258-7	SW8466020	09/13/06	2	Antimony	0.48	ug/l	J	0.24	4.0
BN-1&3-29-MW1302S	M59258-7	SW8466020	09/13/06	2	Arsenic	2.0	ug/l	UJ	1.6	2.0
BN-1&3-29-MW1302S	M59258-7	SW8466020	09/13/06	2	Selenium	1.3	ug/l	J	0.61	10
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Aluminum	200	ug/l	U	23.0	200
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Iron	1380	ug/l		30.0	100
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Magnesium	5490	ug/l		6.9	5000
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Manganese	384	ug/l		0.38	15
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Nickel	14.3	ug/l	J	1.3	40
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Potassium	14800	ug/l		20.0	5000
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Sodium	3460	ug/l	J	150	5000
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Barium	31.5	ug/l	J	1.4	200
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Chromium	10	ug/l	U	1.3	10
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Cobalt	50	ug/l	U	2.2	50
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Copper	1.6	ug/l	J	0.83	25
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Vanadium	50	ug/l	U	1.0	50
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Zinc	7.4	ug/l	J	1.1	20
BN-1&3-29-MW1302S	M59258-7	SW8466010B	09/13/06	1	Calcium	83500	ug/l		9.8	5000
BN-1&3-29-MW1302S	M59258-7	SW8467470A	09/13/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Chlorobenzene	0.40	ug/l	J	0.40	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Tetrachloroethene	1.0	ug/l	UJ	0.54	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Chloroethane	35.6	ug/l		1.3	2.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	1,1-Dichloroethane	2.7	ug/l		0.67	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	UJ	0.69	1.0
BN-1&3-29-MW1302S	M59258-7	SW8468260B	09/13/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-MWXD1	M59258-8	SW8466020	09/13/06	2	Lead	0.16	ug/l	J	0.044	1.0
BN-1&3-29-MWXD1	M59258-8	SW8466020	09/13/06	2	Thallium	1.0	ug/l	UJ	0.17	1.0
BN-1&3-29-MWXD1	M59258-8	SW8466020	09/13/06	2	Antimony	0.50	ug/l	J	0.24	4.0
BN-1&3-29-MWXD1	M59258-8	SW8466020	09/13/06	2	Arsenic	2.0	ug/l	J	1.6	2.0
BN-1&3-29-MWXD1	M59258-8	SW8466020	09/13/06	2	Selenium	1.2	ug/l	J	0.61	10
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Aluminum	200	ug/l	U	23.0	200
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Iron	1530	ug/l		30.0	100
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Magnesium	5370	ug/l		6.9	5000
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Manganese	373	ug/l		0.38	15
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Nickel	14.0	ug/l	J	1.3	40
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Potassium	14800	ug/l		20.0	5000
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Sodium	3450	ug/l	J	150	5000
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Barium	31.1	ug/l	J	1.4	200
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Chromium	10	ug/l	U	1.3	10
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Cobalt	50	ug/l	U	2.2	50
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Copper	1.2	ug/l	J	0.83	25
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Vanadium	50	ug/l	U	1.0	50
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Zinc	8.9	ug/l	J	1.1	20
BN-1&3-29-MWXD1	M59258-8	SW8466010B	09/13/06	1	Calcium	80900	ug/l		9.8	5000
BN-1&3-29-MWXD1	M59258-8	SW8467470A	09/13/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Chlorobenzene	1.0	ug/l	UJ	0.40	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Tetrachloroethene	1.0	ug/l	UJ	0.54	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Chloroethane	39.8	ug/l		1.3	2.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	1,1-Dichloroethane	2.6	ug/l		0.67	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	1,1,2,2-Tetrachloroethane	0.74	ug/l	J	0.69	1.0
BN-1&3-29-MWXD1	M59258-8	SW8468260B	09/13/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0

DATA VALIDATION MEMORANDUM
NAS BRUNSWICK SITES 1 & 3
SEPTEMBER 2006 SAMPLING ROUND 29 (SDG M59273)

TO: ENGINEERING FACILITY COMMAND NORTHEAST

FROM: JACKSON KIKER, ECC SENIOR CHEMIST, MARLBOROUGH, MA

SUBJECT: NAS BRUNSWICK SITES 1 & 3 MONITORING EVENT 29

DATE: 11/7/2006

Project data were validated using the following Validation Functional Guidelines, as modified for non-CLP methods and project-specific QAPP measurement performance criteria (MPC):

1. Region I, EPA-NE Data Validation Functional Guidelines for Evaluation of Environmental Analyses (Dec, 1996),

2. National Functional Guidelines for Evaluation Inorganic Analysis (1988), and

3. National Functional Guidelines for Evaluation Organic Analysis (October 1999).

The data were assessed against the MPC listed in the approved Site 1& 3 and Eastern Plume LTMP QAPP (May 2000). The QAPP MPC and validation guideline exceedences are assessed and documented on the method/QAPP specific data validation worksheets. On these data validation worksheets the data quality acceptance criteria are presented, analytes requiring qualification based on MPC and/or validation guidance criteria exceedences are listed, assigned qualifiers, qualifying rationale is documented, and any potential bias noted. The overall evaluation of the data generated by a method is presented in the data validation worksheet.

Standard EPA Region I data qualifiers are used to denote the assessment of data quality. The final and ranking assigned data qualifier for an analyte is presented in the data summary table. Ancillary qualifiers are noted on the data validation worksheets.

The USEPA Region I Organic Regional Data Assessment (ORDA) sheet displays the summarized results of the data validation assessment for all analytical methods reported in the SDG.

ACRONYMS AND ABBREVIATIONS

Following is a list of acronyms and abbreviations that may be used in the data validation reports.

Acronym or Abbreviation	Definition
%D	Percent difference
%R	Percent recovery
%M	Percent moisture
%S	Percent solids
Ug/L	Microgram per liter
BD	Breakdown
BEHP	2-bis(ethylhexyl)phthalate
BFB	Bromofluorobenzene
CCB	Continuing calibration Blank
CCC	Continuing Check Compound
CCV	Continuing Calibration Verfication
COC	Chain of custody
CRI	standard at RL for ICP
CVAA	Cold vapor atomic absorption
DFTPP	Decafluorotriphenylphosphine
DQO	Data quality objective
EB	Equipment blank
EPA	Environmental Protection Agency
FD	Field duplicate
GC	Gas Chromatography
GC/MS	Gas chromatography/mass spectrometry
HT	Holding time
ICAL	Initial calibration
ICS-A/AB	Interelement check standard A or AB
ICV	Initial calibration verification
IDL	Instrument detection limit
IS	Internal standards
LCL	Lower control limit
LCS	Laboratory control sample
LTMP	Long term monitoring plan
MeCl	Methylene chloride
MS	Matrix spike

Acronym or Abbreviation	Definition
MSD	Matrix spike duplicate
MPC	Measurement performance criteria
NA	Not applicable
NC	Not calculated.
PAH	Polycyclic aromatic hydrocarbon
PCB	Polychlorinated biphenyls
PQL	Practical quantitation limit
QAPP	Quality Assurance Project Plan
QC	Quality control
RF	Response Factor
RPD	Relative percent difference
RRF	Relative response factor
RSD	Relative standard deviation
RT	Retention time
SDG	Sample Delivery Group
SOP	Standard Operation Procedure
SVOC	Semi-volatile organic compound
SPCC	System performance check compound
SQL	Sample Quantitation Limit
TB	Tripblank
TCX	Tetrachloro-m-xylene
TIC	Tentatively identified compound
UCL	Upper control limit
VOC	Volatile organic compound

DATA QUALIFIER REFERENCE TABLE

Data validation reports will summarize the samples reviewed, elements reviewed, any nonconformances with the established criteria, validation actions (including data qualifiers). Data qualifiers will be consistent with EPA Region I – New England guidelines and will consist of the following:

USEPA Region I – Data Qualifier	USEPA Region I – Qualifier Definition
J	The analyte was positively identified; the associated numerical value is the approximate concentration of the analyte in the sample
UJ	The analyte was not detected above the sample reporting limit; and the reporting limit is approximate
U	The sample was analyzed for, but was not detected above the sample reporting limit.
R	The sample result is rejected due to serious deficiencies. The presence or absence of the analyte cannot be verified

Region I, EPA-NE ORGANIC REGIONAL DATA ASSESSMENT

LAB NAME: Northeast Laboratory
SDG #:__M59273
EPA-NE DV TIER LEVEL:___II___
SITE NAME: NAS Brunswick – Sites 1&3

# of SAMPLES/MATRIX: 5 Seeps & 1 seep FD, 6 SW & 1 SW FD
VALIDATION CONTRACTOR:__ECC/ASW
VALIDATOR'S NAME: Sherri Pullar
DV Completion Date:_ November 7, 2006.
Date Sampled__14 September 2006.

ANALYTICAL DATA QUALITY SUMMARY

		VOC	Pesticides	Metals
1	Preservation and HT	O	O	O
2	Instrument Performance Check	O	M	M
3	Initial Calibration:	M	O	O
4	Continuing Calibration:	O	M	O
5	Blanks:	O	O	O
6	Surrogate Compounds:	O	O	-
7	Internal Standards	O	O	-
8	Matrix Spike/Matrix Spike Duplicate:	M	M	M
9	Sensitivity Check:	O	O	O
10	PE Samples- Accuracy Check	O	M	M
11	Target Compound Identification:	O	O	O
12	Compound Quantitation and Reported QLs	O	O	O
13	Tentatively Identified Compounds:	-	-	-
14	Semivolatile/Pesticide/PCB Cleanup:	O	O	-
15	Data Completeness	O	O	O
16	Overall Evaluation of Data:	O	O	O

O = Data had no problems or were qualified due to minor contractual problems; M = Data were qualified due to major/systemic MPC exceedences: Z = Data were rejected as unusable due to major contractual problems.

ACTION ITEMS: (Z items): None.

AREAS OF CONCERN: (M items):

VOC: J for all samples with estimated results <MRL but >MDL. Styrene was qualified as UJ in native sample 12 due to MS/MSD recoveries being outside MPC limits. Non-detect results for chloromethane in samples 1-13 were qualified UJ due to ICV %D's > MPC limits.

Pesticides: Results >MDL but <PQL/RL were qualified J. Results for 4,4'-DDD in samples 12 & 13; 4,4'-DDE in samples 12 & 13; and 4,4'-DDT in samples 12 & 13 were qualified J due to MS/MSD recoveries being outside MPC limits. Endosulfan I results qualified J in sample 13 and UJ in sample 12 due to field duplicate RPD's outside MPC limits. 4,4'-DDT results were qualified J in sample 3, 12, 13, & UJ for non-detect results in samples 1, 2, & 4 due to DDT breakdown outside MPC limits. Results for 4,4'-DDT, 4,4'-DDD, heptachlor, and methoxychlor in samples 1, 2, 3, & 4 were qualified UJ for non-detects and J for detects due to CCV %D and/or %area outside MPC limits.

Metals: Results for Tl and Sb were qualified J for detects and UJ for non-detects in samples 5 & 6 and results for Fe, Ba, Tl, As, Pb, Sb, Al, Mg, Ni, K, Ag, Na, Cd Se, & Cu were qualified J for detects and UJ for non-detects in samples 12 & 13 due to field duplicate RPD's outside MPC limits. V detect in sample 12 was qualified J due to MS %R >UCL. Results for K were qualified J in samples 1-11, & 13 due to serial dilution %D's outside MPC limits. Results for Al, Ba, Cd, Ca, Cr, Co, Mg, Ni, Na & Zn were qualified J in sample 12 due to serial dilution %D's outside MPC limits.

COMMENTS:

ECC Region I Data Review Worksheet (rv 3) **VOCs 5030B/5035//8260B**
Project: NAS Brunswick Sites 1&3 ECC Job No. 5700 **Review Criteria: Sites 1, 3 & EP**
& **USEPA Region I Tier II Guidance**

Data Validation Level	Matrix	Preservation	Temp Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**HCl**	**1 cooler – Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59273**

Field Identification and Laboratory Number of Samples Evaluated:

Field ID	Lab Sample Number
BN-1&3-29-SEEP1	M59273-1
BN-1&3-29-SEEP3	M59273-2
BN-1&3-29-SEEP5	M59273-3
BN-1&3-29-SEEP4	M59273-4
BN-1&3-29-SW4	M59273-5
BN-1&3-29-SW-XD1	M59273-6 (field duplicate for M59273-5)
BN-1&3-29-SW16	M59273-7
BN-1&3-29-SW8	M59273-8
BN-1&3-29-SW9	M59273-9
BN-1&3-29-SW15	M59273-10
BN-1&3-29-SW7	M59273-11
BN-1&3-29-SEEP9	M59273-12
BN-1&3-29-SEEP-XD1	M59273-13 (field duplicate for M59273-12)

Note: Samples are described below in the data worksheets by reference to the last few digits of the Lab Sample Number.

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects preserved per method (amber bottles, temperature, HCl (aq), MeOH/NAHSO4 (soils) (J, UJ, or R (function of HT and compound))	Cooler temperatures < 6 ^oC. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. No samples qualified.	X	-	
Holding Time	1) 14 Days to analysis, if preserved 2) J –detects, UJ or R – non-detects (function of time) 3) *transcription errors	Dates collected: September 14, 2006. Analyzed before: September 22, 2006. All samples analyzed within holding time. No samples qualified.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made. 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	NA	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
Lab Blanks (method blanks)	1) < 5x (<10x common) contaminants for aq samples- 2) <10X common contaminants – acetone, 2-butanone or Mecl. 1) TGT analytes <Lab QL 2) if linear range is exceeded, verify if a instrument blank was performed 3) *verify accurate transcription of times, Ids, are reported on forms 4) *verify from the raw data if the instrument blank was performed in the same vessel 5) *verify IS, RRT, and surrogate %R *check 10% of raw chromatograms for false +/-, check for transcription errors	3 batches of samples were analyzed – on September 22, 2006. All MB were non-detect for VOCs.	X	-	
Trip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate cross matrix TB (X rules apply to raw data) 4) MeCl & Acetone < 5 5) >RL report sample level U 6) <RL report PQL as U	Not collected/analyzed with this SDG.	X	-	
Equip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate TB (X rules don't apply) 3) MeCl & Acetone < 5 *Check IS area (10% of them) * recalculate surrogate (%R – 10 % of them)	Not collected/analyzed with this SDG as all the equipment were dedicated.	-	-	
Results > Cal Range or <Cal Range	6) >Upper Cal Range J-detects - ensure instrument blank performed 7) <PQL but >MDL – J –detects (estimated) listed on data summary sheet.	Attached data summary table. Analytes with results >MDL but <PQL/RL were qualified J.	X	J for all samples with estimated results <MRL but >MDL.	
*TICs (if reported)	1) *verify library search for samples and blanks 2) verify TICs were not misreported compounds (different fraction or miss in search) 3) All TICs – J estimated 4) * verify blanks do not contain TIC peaks 5) * check TIC assignment spectra to STD spectra 6) *review blank and Samples for common lab contaminants	None Reported/not evaluated	-	-	
Surrogates	1,2-Dichloroethane-d4 65-135% Dibromofluoromethane 75-129% Toluene-d8 82%-120% 4-BFB 69%-125% *check raw data for surrogated (recalculate 10% of them). *Transcription errors Qualification: >UCL J –detects, %R<10% J –detects, R –Nods, %R >10% but <70% J-detects, UJ NDs	Surrogate recovery within QAPP limits but slightly outside lab limits for Dibromofluoromethane in sample 12. No samples qualified.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
LCS Recovery	1) Attachment A-2 of LTMP 2) All VOCs 60-140% 3) 10% and <LCL% J detects, UJ –Nods 4) >UCL% J detects <10% R NDs, J-detects 7) *Recalculate the concentrations for one compound in the LCS 8) * Recalucate the %R (within 10% of lab) Note: Tier guidance as a zero blind	LCS/LCSD recoveries were within MPC limits. No samples qualified.	X	-	
*MS/MSD/unspike sample RSD	1)For unspiked compounds if reported, Non- MS spike compounds <50% RSD calculated from MS/MSD/Unspiked Qualification: >50% RSD J-detects 2)*recalculate the RPD (within 10% of lab)	NA	-	-	
*Compound Quantitation (completed as part of other steps)	1) Check sensitivy (MDL< 1/3 PQL) 2) *Recalculate one detection and quantitation limit 3) *verify concentrations have been adjusted to account for DW, DF, 4) *verifiy correct IS and RRF were used	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 8) *Matrix effects- MS/MSD, surrogated, PDS. 9) *System chromatography- evaluate RRTs, peaks shapes, system impacts on data, baseline shifts. 10) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
*TGT Compound Identification	1) *Within 0.06 (30 sec) of CCV RRT 2) * compare sample Mass spectra to standard spectra; a) all ions in std spectra (with 10% rel intensity) presnent in sample spectra. B) sample ion abundance within 20% of standard spectra. 3) *chromatogram: all peaks greater than 10% of nearest IS identified.	NA	-	-	
Field Dup RPD	1) RPD ≤ 30% aq. ≤ 50 soil for Results > PQL (FD pair only) J-detects (both > PQL) 2) Note: FD RPD not specified in QAPP. 30% will be used as the MPC, to be consistent with other NASB QAPPs. 3) If one >PQL, other ND, J-detections, UJ non-detect 4) Other conditions use judgement 5) Determine RPD for detects only. *Recalculate the concentrations for one compound and the PQL	Field Sample Field Duplicate 5 6 12 13 FD Pair 5/6; results for both samples were non-detect. FD Pair 12/13; within MPC. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en- tory	QUAL	BIAS
Single Blind PE	1) Qualify associated samples in PES batch PES = ND, Detects J – ND PE analytes in samples, NDs – R 11) PES > acceptance criteria – Detects in samples J, 12) PES<acceptance criteria – Detects J, NDs –R 13) VOA/SV-XI14 other criteria 14) *% of PES sample above and below criteria *Recalculate concentrations for one tgt compound per PES (10% of lab)	NA	-	-	
MS/MSD Recovery	1) Attachment A-2 of LTMP 2) 60-140% for all VOCs (if MS > 4X native levels) Qualification of MS sample: <10% J detects, R NDs >10% and <LCL% J detects, UJ -NDs >UCL% J detects 3) *Recalculate the concentrations for one compound in the MS/MSD 5) * Recalculate the %R (within 10% of lab)	Native samples Surface Water – sample 5 MS/MSD recoveries within MPC limits. No samples qualified. Leachate Seep – 12 Leachate Seep – Low MS/MSD recoveries for styrene. Styrene was qualified as UJ in native sample 12.	X	Styrene was qualified as UJ in native sample 12.	-
MS/MSD RPD (LCS/LCSD RPD)	RPD ≤20% (aq/S) (when MS >QL) J – detects in MS sample UJ-non detects * recalculate RPD	Native samples Surface Water – sample 5 MS/MSD RPDs within MPC limits. No samples qualified. Leachate Seep – 12 MS/MSD RPDs within MPC limits. No samples qualified.	X	-	
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 6) * performed annually 7) *MDL is at least ½ of PQL 8) *tgt and surrogate 80-120% R *VOA/SV-X11 (recalcuate %RSD and %R for three compounds (10% of them).	NA	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
Internal Stds	1) IS are –50% to 200% of last Ical, or CCV 3) RRT<0.06 (30 sec) 4) IS>100% J-detects 5) IS<20%CCV NDs – R 6) IS>20%CCV <50%CCV NDs – UJ 7) *check for IS transcription errors 8) FBZ = fluorobenzene 9) CBZ = chlorobenzene-d5 10) DCB = 1,4 dichlorobenzene-d4	Internal standard areas inside MPC limits. No samples qualified.	X	-	
Sensitivity	1) MDL study – 7 replicates (40 CFR) 2) Surrogates %in control limits. 3) %R <10 ND- (R) , J- detects 4) 10%> but <LCL% , judgement 5) %R>UCL% J-detects 6) QC, IS, RRT meet criteria, 7) %RSD < 20% 8) MDL< MQL (3x less ideal) 9) Lab fortitied blank (see VOA/SV Part II –section X). 10) *Check and recalculate %RSDs and %R for three compounds (with 10% of lab) <u>Dilution factors for samples – impacts to sensitivity</u>	No dilutions required. Lab RL's met in all aqueous samples for all compounds. No sample qualifications.	X	-	
Tune check	1) ion abundance with method limits 2) *check for co-elution /proper background subtraction 3) *compare reported data to raw data	Tunes were within MPC limits. Detections verified from the tunes & GC. No sample qualifications.	X	-	
Initial Cal Multipoint (instrument evaluation)	1) correct calibration stds 2) within 12 hours of the tune check 3) CCCs %RSD: <30% (1,1 DCA, chloroform, 1,2dichloropropane, Toluene, EB, VC (J –detects, R or UJ NDs all samples associated with Ical) 4) SPCCs Average RRF: SPCCs Chloromethane >0.10, 1,1 DCA>0.10, bromoform >0.10, chlorobenzene>0.3, 1122TCA>0.3 (J –detects, R NDs) 5) RRF>0.05 all compounds 6) RRT < 0.06 units (all stds within 30 sec) 7) %RSD<15% for all non-CCCs or COD>0.99 *8)* *<u>RRF exclusions: surrogates, acetone, MeCL, chloroethane/methane, CS, 1,/22/03 2-butanone, 1,2 dichloropropane, 2-hexanone (IV-8)./</u>* 9) *verify that instrument parameters met method and that Ical and analysis used the same parameters 10) *recalculate RRF one tgt compound associated with each IS. Recalculated values within 10% of lab values. 11) *recalculate one tgt compound associated with each IS. Recalculated values within 10% 12) *option-review preparation logs to ensure cal stds are traceable to NIST stds.	Instrument GCMSG Date: September 21 All RRF's within MPC limits for all VOC's of concern. All CCCs are in MPC. All SPCC are in MPC.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
	13) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)				
Initial Cal (Linearity)	%RSD < 15% use average RF for calibration %RSD> 15% use least squares COD (r2) > 0.990 or correlation coefficient r> 0.995 Qualification for compounds with : %RSD>30% and RRF>0.05 – J detects, UJ - NDs %RSD<30% and RRF<0.05; -J detects, R - ND %RSD>30% and RRF<0.05: J detects, R - ND (see VOA/SVIII-4)	Instrument GCMSG Date: September 21 Applicable to all samples – analytes with average response factors exceeding 15% were determined by linear or quadractic curves. No sample qualifications.	X	-	
2nd Source ICV	QC check nor criteria not specified in QAPP. %D<25% or %R (between ICV and Ical) analytes 80%--120% (+ or -) once per 5 pt cal used to evaluate data sets. Qualification: J detects, R or UJ NDs	Instrument GCMSG Date: September 21 %D's were within MPC limits with the exception of chloromethane.	X	Non-detect results for chloromethane in samples 1-13 were qualified UJ.	
CCV	1) SPCCs Average RRF: SPCCs Chloromethane >0.10, 1,1 DCA>0.10, bromoform >0.10, chlorobenzene>0.3, 1122TCA>0.3 2) RRF all compounds > 0.05 *3)* CCC: (1,1 DCA, chloroform, 1,2dichloropropane, Toluene, EB, VC) %D<20% (or all analytes if no CCCs reported). 4) Qualification-J detects, R or UJ NDs 5) *verify same instrument and parameters 6) *Recalculate RRF for one tgt cmpd associated with each IS. (within 10%) 7) *Recalculate %D for one tgt cmpd associated with each IS (within 10%) 8) *IS RRT<0.06 units (30 sec) 9) * IS area -50 % to 100 % of last ICAL 10) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 11) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument GCMSG Date: September 22 September 22 – applicable to samples 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, & 12 - %D within MPC limits. September 22 – applicable to sample 13 - %D within MPC limits. No samples qualified.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Laboratory precision and accuracy acceptable. No apparent sample bias. Sample results are usable for making project decisions, as qualified. No method blank contamination. J for all samples with estimated results <MRL but >MDL. LCS/LCSD recoveries and RPDs were within MPC limits. Styrene was qualified as UJ in native sample 12 due to MS/MSD recoveries being outside MPC limits. MS/MSD RPD's were within MPC limits. ICAL; within MPC limit. ICV: Non-detect results for chloromethane in samples 1-13 were qualified UJ due to ICV %D outside MPC limits. CCV: %D inside MPC limits. Sampling error: Field Sample — Field Duplicate 5 — 6 12 — 13 FD Pair 5/6; results for both samples were non-detect. FD Pair 12/13; within MPC. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.	X	-	

* Tier III review items only.

Completeness Check: Inventory Check Sheet_____X__. Sample Quantitation Calculations (TIER III only):

Lab Correspondence: None.

ECC Region I Data Review Worksheet (rv 3) **Pesticides 3510C/3545/8081A**
Project:NAS Brunswick Sites 1&3 ECC Job No. 5700 **Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance**

Data Validation Level	Matrix	Preservation	Temperature Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**-**	**1 cooler – Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59273**

Field Identification of Samples Evaluated:

Field ID	Lab Sample Number
BN-1&3-29-SEEP1	M59273-1
BN-1&3-29-SEEP3	M59273-2
BN-1&3-29-SEEP5	M59273-3
BN-1&3-29-SEEP4	M59273-4
BN-1&3-29-SEEP9	M59273-12
BN-1&3-29-SEEP-XD1	M59273-13 (field duplicate for M59273-12)

Note: Samples are described below in the data worksheets by reference to the last few digits of the Lab Sample Number

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects 3) preserved per method (amber bottles, temperature. J, UJ, or R (function of HT and compound)	Cooler temperatures < 6 ^oC. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. Sample preservation within limits. No samples qualified.	X	-	
Holding Time	1) 7 days to extract (14 days for solids) and 40 days to analysis J –detects, UJ or R – nondetects (function of time)	Dates collected: September 14, 2006. Date extracted: September 21, 2006. Date analyzed: Run #1: September 30, 2006. Run #2: October 03, 2006. All samples extracted and analyzed within holding time. No samples qualified.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made (no USACE) 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	Not applicable	-	-	
Results > Cal Range or <Cal Range	1) >Upper Cal Range J-detects - ensure instrument blank performed 2) <PQL but >MDL – J –detects (estimated)	Attached data summary table. Results >MDL but <PQL/RL were qualified J.	X	Results >MDL but <PQL/RL were qualified J.	
Equip Blank	< 5x (<10x common) contaminants for aq samples – for soil indicate EB (X rules don't apply)	Not collected/analyzed with this SDG.	-	-	

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
Surrogates	Surrogate acceptance limits not specified in the LTMP. Use laboratory statistical limits. TMX 30-150% DCB 30-150% Qualification: >UCL J –detects, %R<10% J –detects, R –NDs, %R >10% but <60% J-detects, UJ NDs	All surrogate recoveries within MPC limits. No sample qualifications.	X	-	
Lab Blanks (method blanks)	1) < 5x (<10x common) contaminants – U 2) analytes <lab PQL (contract lab)	MB's were non-detect in both columns. No sample qualifications.	X	-	
LCS Recovery	1) QAPP limits 10% and <LCL% J detects, UJ -NDs >UCL% J detects <10% R NDs, J-detects Attachment A-2 LTMP; Gamma-BHC (Lindane) 56-123% Heptachlor 40-131% Aldrin 40-120% Dieldrin 52-126% Endrin 56-121% 4,4'-DDT 38-127%	All LCS recoveries within MPC limits. No sample qualifications.	X	-	-
MS/MSD Recovery	1) QAPP limits (if MS > 4X native levels) Qualification of MS sample: <10% J detects, R NDs >10% and <LCL J detects, UJ -NDs >UCL J detects Attachment A-2 LTMP; Gamma-BHC (Lindane) 56-123% Heptachlor 40-131% Aldrin 40-120% Dieldrin 52-126% Endrin 56-121% 4,4'-DDT 38-127%	Native samples Leachate Seep – 12 MS/MSD recoveries within MPC limits with the exception of 4,4'-DDD, 4,4'-DDE, & 4,4'-DDT	X	Results for 4,4'-DDD in samples 12 & 13; 4,4'-DDE in samples 12 & 13; and 4,4'-DDT in samples 12 & 13 were qualified J.	-
MS/MSD RPD	MS/MSD RPD per QAPP Attachment A-2 Gamma-BHC (Lindane) <15% Heptachlor <20% Aldrin <22% Dieldrin <18% Endrin <21% 4,4'-DDT <27%% J –detects in MS sample UJ-non detects	Native samples Leachate Seep – 12 MS/MSD RPDs within MPC limits, with the exception of 4,4'-DDD, 4,4'-DDE, & 4,4'-DDT. Results for 4,4'-DDD, 4,4'-DDE, & 4,4'-DDT in samples 12 & 13 were previously qualified due to MS/MSD recoveries above MPC limits.	X	-	
Cleanup Performance Check (if performed)	%R< 10% NDs-R detections J %R>10% <LCL (80%GPC) –detections J, NDs UJ %R>UCL (120%) – detections J Retention Time shift <5%, symmetrical peakshape. GPC check with interferants. Good surrogate recovery, GPC blank check – no carryover.(VOA/SV-IX-I6). Sulfur and High MW compounds removed. SW-846 clean-up not required	NA	-	-	

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
Retention times	Within 3X standard deviation for each analyte from 72-hour study Exceeds: R qualify data	No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 50% soil and <30% waters for Results >2X PQL (FD pair only) J-detects (both > X PQL) 2) If one >2X PQL, other ND, J-detections, UJ non-detect Other conditions use judgement	Field Sample Field Duplicate 12 13 FD Pair 12/13; Endosulfan I not detected in the field sample but had a low-level detect in the FD. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.	X	Endosulfan I results qualified J in sample 13 and UJ in sample 12.	
DDT Degradation check	Degradation Breakdown (BD) Check every 12 hours and prior to sample analysis. DDT Breakdown: <15% for all checks associated with samples. Endrin Breakdown: <15% for check prior to sample analysis. If BD>15% J detects Endrin/DDT.	Instrument: GCBE. Endrin breakdown within MPC limits for all applicable samples. DDT breakdown outside MPC limits for samples 1, 2, 3, 12, 13, & 4. Associated compounds were confirmed by reanalysis.	X	4,4'-DDT results were qualified J in sample 3, 12, 13, & UJ for non-detect results in samples 1, 2, & 4.	
Initial Cal (Linearity)	Correct calibration stds %RSD < 20% use average RF for calibration %RSD> 20% use least squares COD (r2) > 0.990 or correlation coefficient r> 0.995 or alternatively mean %RSD <20% for all target analytes, with no analyte %RSD>40%	Instrument: GCBE. Dates: September 29, 2006. RSD<20% or COD >0.99 for both columns. No sample qualifications. Instrument: GCBE. Dates: October 03, 2006. RSD<20% or COD >0.99 for both columns. No sample qualifications.	X	-	
2nd Source ICV	%R (between ICV and Ical) analytes %D ≤ 15%, (+ or -) once per 5 pt cal Qualification: J detects, R or UJ NDs	Instrument: GCBE. Dates: September 29, 2006. All %D's were within MPC limits in both columns. Dates: October 03, 2006. All %D's were within MPC limits in both columns.	X	-	

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
CCV	1) QAPP: 15% of initial calib. Curve (85%-115%) J qualify data. 2) Qualification-J detects, R or UJ NDs	Instrument: GCBE. Dates: September 29, 2006 (10:02:30). All %D's and %area's were within MPC limits with the exception of 4,4'-DDT & methoxychlor on the first column & second column and heptachlor, & 4,4'-DDD on the second column. (1, 4) Dates: September 30, 2006 (09:25:42PM). All %D's and %area's were within MPC limits with the exception of heptachlor, 4,4'-DDT & methoxychlor on the first column & second column and 4,4'-DDD on the second column. (2, 3) Dates: October 3, 2006 (01:28PM). All %D's and %area's were within MPC limits with the exception of heptachlor, alpha-chlordane, endrin, 4,4'-DDD, 4,4'-DDT, endrin aldehyde, endosulfan sulfate, methoxychlor, & endrin ketone on the first column and heptachlor, endrin, 4,4'-DDT, methoxychlor, & endrin ketone on the second column. (1, 2, 4) Dates: October 3, 2006 (09:25:51PM). All %D's and %area's were within MPC limits with the exception of heptachlor, 4,4'-DDD, endosulfan II, 4,4'-DDT, endrin aldehyde, endosulfan sulfate, & methoxychlor on the first column and heptachlor, endrin, 4,4'-DDD, 4,4'-DDT, & methoxychlor on the second column. (3, 12, 13)	X	Results for 4,4'-DDT, 4,4'-DDD, heptachlor, and methoxychlor in samples 1, 2, 3, & 4 were qualified UJ for non-detects and J for detects.	
Compound Quantitation	1) Check sensitivy (MDL< 1/3 PQL or per QAPP 2) %D <25% primary and secondary column identification and quantitation 3) Target compounds by 8081 Lindane PQL 0.05 ug/L MCL/MEG 0.2 4,4' DDT PQL 0.02 ug/L MEG/0.83	4,4'-DDD, 4,4'-DDE, 4,4'-DDT, heptachlor, & methoxychlor in samples 3 & 12; gamma-BHC (lindane), dieldrin, & alpha-BHC in sample 2; 4,4'-DDD, 4,4'-DDE, 4,4'-DDT, heptachlor, methoxychlor, & endosulfan-I were confirmed by reanalysis.	X	-	
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	The laboratory results, as qualified, are usable for making project decisions. Results >MDL but <PQL/RL were qualified J. All surrogate & LCS recoveries were within MPC limits. MS/MSD recoveries and MS/MSD RPD's were outside MPC limits for 4,4'-DDD, 4,4'-DDE, & 4,4'-DDT. 4,4'-DDT results were qualified J in sample 3, 12, 13, & UJ for non-detect results in samples 1, 2, & 4 due to DDT breakdown outside MPC limits. ICAL and ICV are within MPC limits for all samples. CCV: %D were outside MPC limits for	X	-	-

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
		4,4'-DDT, 4,4'-DDD, heptachlor, and methoxychlor. Field Sample Field Duplicate 12 13 FD Pair 12/13; Endosulfan I not detected in the field sample but had a low-level detect in the FD. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.			

*(Tier III check items) Completeness Check: Inventory Check Sheet_____X__ Sample Quantitation Calculations (TIER III ONLY):

Lab Correspondence: None.

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

Metals 6010B/7041/7470A/7471A/7740/7841
Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

Data Validation Level	Matrix	Preservation	Temperature Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**Nitric Acid**	**1 cooler – Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59273**

Field Identification of Samples Evaluated:

Field ID	Lab Sample Number
BN-1&3-29-SEEP1	M59273-1
BN-1&3-29-SEEP3	M59273-2
BN-1&3-29-SEEP5	M59273-3
BN-1&3-29-SEEP4	M59273-4
BN-1&3-29-SW4	M59273-5
BN-1&3-29-SW-XD1	M59273-6 (field duplicate for M59273-5)
BN-1&3-29-SW16	M59273-7
BN-1&3-29-SW8	M59273-8
BN-1&3-29-SW9	M59273-9
BN-1&3-29-SW15	M59273-10
BN-1&3-29-SW7	M59273-11
BN-1&3-29-SEEP9	M59273-12
BN-1&3-29-SEEP-XD1	M59273-13 (field duplicate for M59273-12)

Note: Samples are described below in the data worksheets by reference to the last three digits of the Lab Sample Number

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects 3) preserved per method (amber bottles, temperature. J, UJ, or R (function of HT and compound)	Cooler temperatures <6°C. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. Sample preservation within limits. No samples qualified.	X	-	
Holding Time	1) 180 days (6010), Hg 28 Days to analysis 2) J –detects, UJ or R –nondetects (function of time)	All samples analyzed within holding time. No samples qualified.	X	-	

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

Metals 6010B/7041/7470A/7471A/7740/7841
Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
Field Dup RPD	1) RPD ≤ 30% water; ≤50% soil (no QAPP Criteria) for Results > X PQL (FD pair only) J-detects (both > X PQL) 2) If one >X PQL, other ND, J-detections, UJ non-detect	Field Sample Field Duplicate 5 6 12 13 FD Pair 5/6; Tl not detected in the field sample but had a low-level detect in the FD & Sb FD RPD>MPC. FD Pair 12/13; Fe, Ba, Tl, As, Pb, Sb, Al, Mg, Ni, K, Ag, Na, Cd & Cu FD RPDs>MPC. Se not detected in the field sample but had a low-level detect in the FD. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.	X	Results for Tl and Sb were qualified J for detects and UJ for non-detects in samples 5 & 6. Results for Fe, Ba, Tl, As, Pb, Sb, Al, Mg, Ni, K, Ag, Na, Cd Se, & Cu were qualified J for detects and UJ for non-detects in samples 12 & 13.	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs –R	NA	X	-	
Results > Cal Range or <Cal Range	1) >Upper Cal Range J-detects - ensure instrument blank performed 2) <MRL but >MDL – J –detects (estimated)	All detections are greater than the MRL. No <MRL and >IDL. No samples qualified.	X	-	
Lab Blanks (method blank or preparation blank)	1) Once per sample batch 2) Results > QL; sample results <5X; sample result U (nd) 3) Sample results >5X blank level; no action	Preparation blanks were non-detect for all metals.	X	-	
LCS Recovery	1) once per sample batch 2) 80-120% ICP metals and Hg. 3) <LCL% Reject 4) >UCL% detects J	All LCS %R's were within MPC limits. No samples qualified. Laboratory precision is acceptable.	X	-	
LCS/LCSD RPD	1) RPD<20%	All 6010B/Hg/Sb/As/Pb/Se/Tl/ LCS/LCSD RPDs are within MPC.	X	-	
MS Recovery	1) 75-125% ICP metals and Hg if MS > 4X native levels) Qualification of MS sample: 2) <30% J detects, R NDs 3) 30%--74%, detects J, NDs UJ 4) >125% J detects	Three MS/MSD analysis performed: V, Al, Fe, Mn Surface water: Field sample: 5 used for MS& recoveries within MPC limits. No samples qualified. Leachate seep: Field sample: 12 used for MS. Al, Fe, Mn, and V. For Al, Fe, & Mn, MS<4X the native level, therefore no samples were qualified. Result for V in sample 12 was qualified J.	X	V detect in sample 12 was qualified J.	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
MS/MSD RPD	MS/MSD RPD<20%	Three MS/MSD RPD analysis performed: Surface water; Field sample: 5 used for MS?MSD RPD within MPC limits. No samples qualified. Leachate seep: Field sample: 12 used for MS?MSD RPD within MPC limits. No samples qualified. Laboratory precision is acceptable.	X	-	
Laboratory Replicate RPD	RPD < 20% No QAPP criteria provided	All RPDs within limits. Laboratory precision is acceptable.	X	-	
Sensitivity*	1) MDL study – 7 replicates (40 CFR) 2) check and recalculate %RSDs and %R for three compounds (with 10% of lab)	Select samples diluted to bring results in calibration range. For groundwater, Ni reporting limit 40 greater than QAPP PQL (based on Basewide QAPP values in Table 07-1-S1). For groundwater, Be reporting limit 4 greater than QAPP PQL (based on Basewide QAPP values in Table 07-1-S1). For groundwater, Cd reporting limit 4 greater than QAPP PQL (based on Basewide QAPP values in Table 07-1-S1). For seep and surface water, Al reporting limit 200 greater than QAPP PQL (based on Basewide QAPP values in Table 07-1-S1). For seep and surface water, Ni reporting limit 40 greater than QAPP PQL (based on Basewide QAPP values in Table 07-1-S1). For seep and surface water, Si reporting limit 5.0 greater than QAPP PQL (based on Basewide QAPP values in Table 07-1-S1). For seep and surface water, Ba reporting limit 200 greater than QAPP PQL (based on Basewide QAPP values in Table 07-1-S1). For seep and surface water, Cd reporting limit 4.0 greater than QAPP PQL (based on Basewide QAPP values in Table 07-1-S1). For seep and surface water, Cu reporting limit 25 greater than QAPP PQL (based on Basewide QAPP values in Table 07-1-S1).	X	-	
Equip Blank	< 5x contaminants for aq samples – for soil indicate EB (X rules don't apply)	Not collected/analyzed with this SDG	-	-	
Negative blanks	If negative values are reported for an analyte with absolute value >DL and sample value is <5X the absolute value of the blank or is nondetect Qualify detects as estimated (J) Nondetects as estimated (UJ)	No negative blank detections. No samples qualified.	X	-	
Initial Cal Multipoint	1) Blank and 3 standards covering range of instrument. 2) high standard verification +/- %5 3) Hg 5-point calibration COD>0.99	ICP-AES samples. All COD's > 0.99 in all initial calibration runs for all methods. No sample qualifications. Sb/As/Pb/Se/Tl/Hg ICaL within limits.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
Initial Calibration Blanks (ICB)	1) Ical blank after Ical 2) Results > QL; sample results <5X ; sample result U (nd) 3) Blank concentrations < project RLs 4) Sample results >5X blank level; no action 5) ABS >RL then J qualify data	No 6010B/Hg/ Sb/As/Pb/Se/Tl ICB detections – no samples qualified.	X	-	
Continuing Calibration Blanks (CCB)	1) CCB every 10 samples end of run 2) Blank concentrations < project RLs 3) Results > QL; sample results <5X ; sample result U 4) Sample results >5X blank level; no action ABS >RL then J qualify data.	No 6010B/Hg/ Sb/As/Pb/Se/Tl CCB detections – no samples qualified.	X	-	
Serial Dilution	1) once per digestion batch 2) Not required per QAPP- no criteria provided. 3) %D<10% 4) %D not evaluated if element results is <50X IDL 5) J detects, UJ non-detects.	K, Ca, Zn, Co, Na, Ni, Mg, Cd, Al, Ar Surface water – sample 5 - %D's were within MPC limits with the exception of Al, K, Sb, Pb, and Zn. Results for Al, Sb, Pb, and Zn were not qualified since the initial sample concentration was <50x IDL. Leachate seep – sample 12 - %D's were within MPC limits with the exception of Al, Ba, Be, Cd, Ca, Cr, Co, Mg, Ni, Ag, Na, Sb, Tl, and Zn. Results for Be, Sb, Tl, and Ag were not qualified since the initial sample concentration was <50x IDL.	X	Results for K were qualified J in samples 1-11, & 13. Results for Al, Ba, Cd, Ca, Cr, Co, Mg, Ni, Na & Zn were qualified J in sample 12.	
Interelement checks ICS-A, ICS-AB Instrument performance check	1) start of sequence 2) 80-120% target analytes 3) >120% ; detects J (ICS-AB) 4) 50%-79% R ICS-AB; detects J, NDs – UJ 5) <50% R – reject data 6) ICS-A response > DL and samples have <5X ICS-A response: detects J (if DL is <10 ug/l use 2X DL). 7) Absolute value of negative ICS-A response>DL and sample detects <5X ICS-A response: detects J, NDs as UJ 8) If the ICS-A is within limits, the ICS-AB may not be analyzed (USACE Shell)	Both ICS-A and ICS-AB %R's within MPC limits for all runs.	X	-	
2nd Source ICV	1) following calibration 2) 90- 110% Recovery (6010/7000) 3) 75%-89% R – detects J, NDs – UJ 4) 111-125% R – detects J 5) outside 75-125% R – reject data (R) Hg 80-120%	6010B/Hg/ Sb/As/Pb/Se/Tl / ICV %R's within MPC limits the initial calibration. No samples qualified.	X	-	
CCV	1) every 10 samples and end of run 2) 90- 110% Recovery (6010) Hg; 80-120% 3) 6010: 75%-89% R Hg, 65-79% R; – detects J, NDs – UJ. 4) 6010: 111-125%, Hg: 121-135% detects J 6010: outside 75-125%, Hg; outside 65-135%; R – reject data (R)	6010B/Hg/ Sb/As/Pb/Se/Tl CCV %R's within MPC limits.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
Post Digestion Spike	1) Analyze if MS >MPC (QAPP) 2) 85- 115%R (QAPP Attachment A-1)	Leachate seep; Field sample: 12 used for PDS. V- %R within MPC limits. No samples qualified.	X	-	
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 3) * performed annually 4) *MDL is at least ½ of PQL *tgt and surrogate 80-120% R	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 3) *Matrix effects- MS/MSD, surrogated, PDS. 4) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
Tune Check	Within Method limits.	NA	-		
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Method 6010B; Aqueous metals except for Sb, As, Pb, Se, Tl, and Hg. The LCS %R's are within limits, except for Al, Cu, Fe, and Zn and LCS/LCSD recoveries are within limits. The Matrix spikes were within limits in the MS/MSD, except for V (>UCL) for seep matrix. Laboratory accuracy is acceptable for all metals. The LCS/LCSD RPDs were within limits. Serial dilution %D>MPC for K in samples 1-11 & 13 and Al, Ba, Cd, Ca, Cr, Co, Mg, Ni, Na & Zn in sample 12. PDS %R within MPC limits. Lab preparation blank non-detect. IPC; in limits. ICAL: COD within limits. ICV: in limits CCV: in limits Sampling Error Evaluation: Field Sample — Field Duplicate 5 — 6 12 — 13	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
		FD Pair 5/6; Tl not detected in the field sample but had a low-level detect in the FD & Sb FD RPD>MPC. FD Pair 12/13; Fe, Ba, Tl, As, Pb, Sb, Al, Mg, Ni, K, Ag, Na, Cd & Cu FD RPDs>MPC. Se not detected in the field sample but had a low-level detect in the FD. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.			

*TIER III DATA VALIDATION ONLY Completeness Check: Inventory Check Sheet___X_Sample Quantitation Calculations (TIER III DATA VALIDATION ONLY):

FIELD DUPLICATE WORKSHEET

SDG: M59273

Field Sample Id	Analyte	Analytical Method	Result	Units	Qualifier	Field Duplicate Id	Result	Units	Qaulifier	FD RPD (%)
BN-1&3-29-SW4	Lead	SW8466020	0.49	ug/l		BN-1&3-29-SW-XD1	0.42	ug/l		15.4
BN-1&3-29-SW4	Thallium	SW8466020	1.0	ug/l	UJ	BN-1&3-29-SW-XD1	0.57	ug/l	J	**NC**
BN-1&3-29-SW4	Antimony	SW8466020	0.84	ug/l	J	BN-1&3-29-SW-XD1	0.57	ug/l	J	**38.3**
BN-1&3-29-SW4	Aluminum	SW8466010B	91.2	ug/l		BN-1&3-29-SW-XD1	90.6	ug/l		0.7
BN-1&3-29-SW4	Iron	SW8466010B	983	ug/l		BN-1&3-29-SW-XD1	1060	ug/l		7.5
BN-1&3-29-SW4	Magnesium	SW8466010B	2040	ug/l		BN-1&3-29-SW-XD1	2100	ug/l		2.9
BN-1&3-29-SW4	Manganese	SW8466010B	203	ug/l		BN-1&3-29-SW-XD1	204	ug/l		0.5
BN-1&3-29-SW4	Potassium	SW8466010B	1890	ug/l		BN-1&3-29-SW-XD1	1940	ug/l		2.6
BN-1&3-29-SW4	Sodium	SW8466010B	20100	ug/l		BN-1&3-29-SW-XD1	20500	ug/l		2
BN-1&3-29-SW4	Barium	SW8466010B	25.4	ug/l		BN-1&3-29-SW-XD1	26.3	ug/l		3.5
BN-1&3-29-SW4	Zinc	SW8466010B	7.4	ug/l		BN-1&3-29-SW-XD1	7.5	ug/l		1.3
BN-1&3-29-SW4	Calcium	SW8466010B	10100	ug/l		BN-1&3-29-SW-XD1	10400	ug/l		2.9
BN-1&3-29-SEEP9	Iron	SW8466010B	2640000	ug/l	J	BN-1&3-29-SEEP-XD1	1680000	ug/l	J	**44.4**
BN-1&3-29-SEEP9	Manganese	SW8466010B	76800	ug/l		BN-1&3-29-SEEP-XD1	58500	ug/l		27.1
BN-1&3-29-SEEP9	4,4'-DDT	SW8468081	0.20	ug/l	J	BN-1&3-29-SEEP-XD1	0.62	ug/l	J	**102.4**
BN-1&3-29-SEEP9	4,4'-DDD	SW8468081	0.19	ug/l	J	BN-1&3-29-SEEP-XD1	0.37	ug/l	J	**64.3**
BN-1&3-29-SEEP9	4,4'-DDE	SW8468081	0.24	ug/l		BN-1&3-29-SEEP-XD1	0.29	ug/l		18.9
BN-1&3-29-SEEP9	Barium	SW8466010B	2450	ug/l	J	BN-1&3-29-SEEP-XD1	2070	ug/l	J	**139.2**
BN-1&3-29-SEEP9	Thallium	SW8466020	4.9	ug/l	J	BN-1&3-29-SEEP-XD1	10.7	ug/l	J	**74.4**
BN-1&3-29-SEEP9	Arsenic	SW8466020	83.5	ug/l	J	BN-1&3-29-SEEP-XD1	706	ug/l	J	**166.6**
BN-1&3-29-SEEP9	Lead	SW8466020	54.7	ug/l	J	BN-1&3-29-SEEP-XD1	439	ug/l	J	**171.2**
BN-1&3-29-SEEP9	Antimony	SW8466020	3.3	ug/l	J	BN-1&3-29-SEEP-XD1	7.6	ug/l	J	**149.6**
BN-1&3-29-SEEP9	Selenium	SW8466020	50	ug/l	UJ	BN-1&3-29-SEEP-XD1	22.9	ug/l	J	**NC**
BN-1&3-29-SEEP9	Aluminum	SW8466010B	371000	ug/l	J	BN-1&3-29-SEEP-XD1	273000	ug/l	J	**145.5**
BN-1&3-29-SEEP9	Magnesium	SW8466010B	71200	ug/l	J	BN-1&3-29-SEEP-XD1	58500	ug/l	J	**196.3**
BN-1&3-29-SEEP9	Nickel	SW8466010B	878	ug/l	J	BN-1&3-29-SEEP-XD1	667	ug/l	J	**188.6**

Field Sample Id	Analyte	Analytical Method	Result	Units	Qualifier	Field Duplicate Id	Result	Units	Qaulifier	FD RPD (%)
BN-1&3-29-SEEP9	Potassium	SW8466010B	39200	ug/l	J	BN-1&3-29-SEEP-XD1	29900	ug/l	J	**199.9**
BN-1&3-29-SEEP9	Silver	SW8466010B	5.8	ug/l	J	BN-1&3-29-SEEP-XD1	5.7	ug/l	J	**199.9**
BN-1&3-29-SEEP9	Sodium	SW8466010B	25000	ug/l	J	BN-1&3-29-SEEP-XD1	25900	ug/l	J	**169.4**
BN-1&3-29-SEEP9	Beryllium	SW8466010B	26.4	ug/l		BN-1&3-29-SEEP-XD1	20.7	ug/l		24.2
BN-1&3-29-SEEP9	Cadmium	SW8466010B	83.9	ug/l	J	BN-1&3-29-SEEP-XD1	8.8	ug/l	J	**162**
BN-1&3-29-SEEP9	Chromium	SW8466010B	387	ug/l		BN-1&3-29-SEEP-XD1	287	ug/l		29.7
BN-1&3-29-SEEP9	Cobalt	SW8466010B	2060	ug/l		BN-1&3-29-SEEP-XD1	1690	ug/l		19.7
BN-1&3-29-SEEP9	Copper	SW8466010B	576	ug/l	J	BN-1&3-29-SEEP-XD1	358	ug/l	J	**46.7**
BN-1&3-29-SEEP9	Vanadium	SW8466010B	737	ug/l		BN-1&3-29-SEEP-XD1	576	ug/l		24.5
BN-1&3-29-SEEP9	Zinc	SW8466010B	1540	ug/l		BN-1&3-29-SEEP-XD1	1190	ug/l		25.6
BN-1&3-29-SEEP9	Calcium	SW8466010B	290000	ug/l		BN-1&3-29-SEEP-XD1	301000	ug/l		3.7
BN-1&3-29-SEEP9	Mercury	SW8467470A	10.8	ug/l		BN-1&3-29-SEEP-XD1	12.4	ug/l		13.8
BN-1&3-29-SEEP9	Endosulfan-I	SW8468081	0.029	ug/l	UJ	BN-1&3-29-SEEP-XD1	0.014	ug/l	J	**NC**

NAS BRUNSWICK- EASTERN PLUME – SEPTEMBER 2006
DATA SUMMARY TABLE –SDG M59273

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	4,4'-DDT	0.022	ug/l	UJ	0.0082	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	Methoxychlor	0.022	ug/l	UJ	0.0082	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	4,4'-DDD	0.022	ug/l	UJ	0.011	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	4,4'-DDE	0.022	ug/l	U	0.011	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	Heptachlor	0.022	ug/l	UJ	0.010	0.022
BN-1&3-29-SEEP1	M59273-1	SW8466020	09/14/06	2	Lead	0.72	ug/l	J	0.044	1.0
BN-1&3-29-SEEP1	M59273-1	SW8466020	09/14/06	2	Thallium	1.0	ug/l	U	0.17	1.0
BN-1&3-29-SEEP1	M59273-1	SW8466020	09/14/06	2	Antimony	0.89	ug/l	J	0.24	4.0
BN-1&3-29-SEEP1	M59273-1	SW8466020	09/14/06	2	Arsenic	2.0	ug/l	U	1.6	2.0
BN-1&3-29-SEEP1	M59273-1	SW8466020	09/14/06	2	Selenium	10	ug/l	U	0.61	10
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	Heptachlor epoxide	0.022	ug/l	U	0.0099	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	Endosulfan sulfate	0.022	ug/l	U	0.010	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	Aldrin	0.022	ug/l	U	0.0078	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	alpha-BHC	0.022	ug/l	U	0.0069	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	beta-BHC	0.022	ug/l	U	0.0099	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	delta-BHC	0.022	ug/l	U	0.014	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	Endosulfan-II	0.022	ug/l	U	0.0090	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	alpha-Chlordane	0.022	ug/l	U	0.0062	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	gamma-Chlordane	0.022	ug/l	U	0.0062	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	Endrin ketone	0.022	ug/l	U	0.010	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	gamma-BHC (Lindane)	0.022	ug/l	U	0.011	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	Dieldrin	0.022	ug/l	U	0.0074	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	Endrin	0.022	ug/l	U	0.015	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	Endrin aldehyde	0.022	ug/l	U	0.0092	0.022
BN-1&3-29-SEEP1	M59273-1	SW8468081	09/14/06	1	Endosulfan-I	0.022	ug/l	U	0.0099	0.022
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Aluminum	224	ug/l		23.0	200
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Iron	1490	ug/l		30.0	100
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Magnesium	13700	ug/l		6.9	5000
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Manganese	441	ug/l		0.38	15
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Nickel	4.1	ug/l	J	1.3	40

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Potassium	4220	ug/l	J	20.0	5000
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Sodium	36300	ug/l		150	5000
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Barium	28.0	ug/l	J	1.4	200
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Chromium	2.7	ug/l	J	1.3	10
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Cobalt	6.3	ug/l	J	2.2	50
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Copper	0.99	ug/l	J	0.83	25
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Vanadium	50	ug/l	U	1.0	50
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Zinc	8.8	ug/l	J	1.1	20
BN-1&3-29-SEEP1	M59273-1	SW8466010B	09/14/06	1	Calcium	69000	ug/l		9.8	5000
BN-1&3-29-SEEP1	M59273-1	SW8467470A	09/14/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-SEEP1	M59273-1	SW8468260B	09/14/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SW15	M59273-10	SW8466020	09/14/06	2	Lead	0.35	ug/l	J	0.044	1.0
BN-1&3-29-SW15	M59273-10	SW8466020	09/14/06	2	Thallium	0.21	ug/l	J	0.17	1.0
BN-1&3-29-SW15	M59273-10	SW8466020	09/14/06	2	Antimony	0.63	ug/l	J	0.24	4.0
BN-1&3-29-SW15	M59273-10	SW8466020	09/14/06	2	Arsenic	2.0	ug/l	U	1.6	2.0
BN-1&3-29-SW15	M59273-10	SW8466020	09/14/06	2	Selenium	10	ug/l	U	0.61	10
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Aluminum	55.8	ug/l	J	23.0	200
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Iron	777	ug/l		30.0	100
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Magnesium	2050	ug/l	J	6.9	5000
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Manganese	128	ug/l		0.38	15
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Nickel	40	ug/l	U	1.3	40
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Potassium	1830	ug/l	J	20.0	5000
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Sodium	22000	ug/l		150	5000
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Barium	26.1	ug/l	J	1.4	200
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Chromium	10	ug/l	U	1.3	10

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Cobalt	50	ug/l	U	2.2	50
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Copper	25	ug/l	U	0.83	25
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Vanadium	50	ug/l	U	1.0	50
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Zinc	7.3	ug/l	J	1.1	20
BN-1&3-29-SW15	M59273-10	SW8466010B	09/14/06	1	Calcium	10100	ug/l		9.8	5000
BN-1&3-29-SW15	M59273-10	SW8467470A	09/14/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Bromoform	1.0	ug/l	U	0.58	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-SW15	M59273-10	SW8468260B	09/14/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SW7	M59273-11	SW8466020	09/14/06	2	Lead	0.33	ug/l	J	0.044	1.0
BN-1&3-29-SW7	M59273-11	SW8466020	09/14/06	2	Thallium	1.0	ug/l	U	0.17	1.0
BN-1&3-29-SW7	M59273-11	SW8466020	09/14/06	2	Antimony	0.56	ug/l	J	0.24	4.0
BN-1&3-29-SW7	M59273-11	SW8466020	09/14/06	2	Arsenic	2.0	ug/l	U	1.6	2.0
BN-1&3-29-SW7	M59273-11	SW8466020	09/14/06	2	Selenium	10	ug/l	U	0.61	10
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Aluminum	68.5	ug/l	J	23.0	200
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Iron	965	ug/l		30.0	100
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Magnesium	2290	ug/l	J	6.9	5000
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Manganese	223	ug/l		0.38	15
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Nickel	40	ug/l	U	1.3	40
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Potassium	2020	ug/l	J	20.0	5000
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Sodium	22000	ug/l		150	5000
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Barium	28.0	ug/l	J	1.4	200
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Chromium	10	ug/l	U	1.3	10
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Cobalt	50	ug/l	U	2.2	50
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Copper	0.85	ug/l	J	0.83	25
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Vanadium	50	ug/l	U	1.0	50
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Zinc	6.0	ug/l	J	1.1	20
BN-1&3-29-SW7	M59273-11	SW8466010B	09/14/06	1	Calcium	11400	ug/l		9.8	5000
BN-1&3-29-SW7	M59273-11	SW8467470A	09/14/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-SW7	M59273-11	SW8468260B	09/14/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	10	Iron	2640000	ug/l	J	300	1000
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	10	Manganese	76800	ug/l		3.8	150
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	4,4'-DDT	0.20	ug/l	J	0.011	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	Methoxychlor	0.029	ug/l	U	0.011	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	4,4'-DDD	0.19	ug/l	J	0.014	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	4,4'-DDE	0.24	ug/l	J	0.015	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	Heptachlor	0.029	ug/l	U	0.013	0.029
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Barium	2450	ug/l	J	1.4	200
BN-1&3-29-SEEP9	M59273-12	SW8466020	09/14/06	2	Thallium	4.9	ug/l	J	0.83	5.0
BN-1&3-29-SEEP9	M59273-12	SW8466020	09/14/06	2	Arsenic	83.5	ug/l	J	8.1	10
BN-1&3-29-SEEP9	M59273-12	SW8466020	09/14/06	2	Lead	54.7	ug/l	J	0.22	5.0
BN-1&3-29-SEEP9	M59273-12	SW8466020	09/14/06	2	Antimony	3.3	ug/l	J	1.2	20
BN-1&3-29-SEEP9	M59273-12	SW8466020	09/14/06	2	Selenium	50	ug/l	UJ	3.1	50
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Aluminum	371000	ug/l	J	23.0	200
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Magnesium	71200	ug/l	J	6.9	5000
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Nickel	878	ug/l	J	1.3	40
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Potassium	39200	ug/l	J	20.0	5000
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Silver	5.8	ug/l	J	0.59	5.0
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Sodium	25000	ug/l	J	150	5000
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Beryllium	26.4	ug/l		1.3	4.0
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Cadmium	83.9	ug/l	J	0.31	4.0
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Chromium	387	ug/l	J	1.3	10
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Cobalt	2060	ug/l	J	2.2	50
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Copper	576	ug/l	J	0.83	25
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Vanadium	737	ug/l	J	1.0	50
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Zinc	1540	ug/l		1.1	20
BN-1&3-29-SEEP9	M59273-12	SW8466010B	09/14/06	1	Calcium	290000	ug/l	J	9.8	5000
BN-1&3-29-SEEP9	M59273-12	SW8467470A	09/14/06	5	Mercury	10.8	ug/l		0.23	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Styrene	5.0	ug/l	UJ	0.60	5.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-SEEP9	M59273-12	SW8468260B	09/14/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	Heptachlor epoxide	0.029	ug/l	U	0.013	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	Endosulfan sulfate	0.029	ug/l	U	0.013	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	Aldrin	0.029	ug/l	U	0.010	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	alpha-BHC	0.029	ug/l	U	0.0089	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	beta-BHC	0.029	ug/l	U	0.013	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	delta-BHC	0.029	ug/l	U	0.018	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	Endosulfan-II	0.029	ug/l	U	0.012	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	alpha-Chlordane	0.029	ug/l	U	0.0080	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	gamma-Chlordane	0.029	ug/l	U	0.0080	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	Endrin ketone	0.029	ug/l	U	0.013	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	gamma-BHC (Lindane)	0.029	ug/l	U	0.014	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	Dieldrin	0.029	ug/l	U	0.0095	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	Endrin	0.029	ug/l	U	0.019	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	Endrin aldehyde	0.029	ug/l	U	0.012	0.029
BN-1&3-29-SEEP9	M59273-12	SW8468081	09/14/06	1	Endosulfan-I	0.029	ug/l	U	0.013	0.029
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	5	Iron	1680000	ug/l	J	150	500
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	5	Manganese	58500	ug/l		1.9	75
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	4,4'-DDT	0.62	ug/l	J	0.0093	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	Methoxychlor	0.025	ug/l	U	0.0093	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	4,4'-DDD	0.37	ug/l	J	0.012	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	4,4'-DDE	0.29	ug/l	J	0.013	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	Heptachlor	0.025	ug/l	U	0.011	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8466020	09/14/06	2	Lead	439	ug/l	J	0.22	5.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8466020	09/14/06	2	Thallium	10.7	ug/l	J	0.83	5.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8466020	09/14/06	2	Antimony	7.6	ug/l	J	1.2	20
BN-1&3-29-SEEP-XD1	M59273-13	SW8466020	09/14/06	2	Arsenic	706	ug/l	J	8.1	10
BN-1&3-29-SEEP-XD1	M59273-13	SW8466020	09/14/06	2	Selenium	22.9	ug/l	J	3.1	50
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Aluminum	273000	ug/l	J	23.0	200
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Magnesium	58500	ug/l	J	6.9	5000
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Nickel	667	ug/l	J	1.3	40
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Potassium	29900	ug/l	J	20.0	5000
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Silver	5.7	ug/l	J	0.59	5.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Sodium	25900	ug/l	J	150	5000

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Barium	2070	ug/l	J	1.4	200
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Beryllium	20.7	ug/l		1.3	4.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Cadmium	8.8	ug/l	J	0.31	4.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Chromium	287	ug/l		1.3	10
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Cobalt	1690	ug/l	J	2.2	50
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Copper	358	ug/l		0.83	25
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Vanadium	576	ug/l		1.0	50
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Zinc	1190	ug/l		1.1	20
BN-1&3-29-SEEP-XD1	M59273-13	SW8466010B	09/14/06	1	Calcium	301000	ug/l		9.8	5000
BN-1&3-29-SEEP-XD1	M59273-13	SW8467470A	09/14/06	5	Mercury	12.4	ug/l		0.23	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468260B	09/14/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	Heptachlor epoxide	0.025	ug/l	U	0.011	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	Endosulfan sulfate	0.025	ug/l	U	0.012	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	Aldrin	0.025	ug/l	U	0.0087	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	alpha-BHC	0.025	ug/l	U	0.0078	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	beta-BHC	0.025	ug/l	U	0.011	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	delta-BHC	0.025	ug/l	U	0.016	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	Endosulfan-II	0.025	ug/l	U	0.010	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	alpha-Chlordane	0.025	ug/l	U	0.0070	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	gamma-Chlordane	0.025	ug/l	U	0.0070	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	Endrin ketone	0.025	ug/l	U	0.012	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	gamma-BHC (Lindane)	0.025	ug/l	U	0.012	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	Dieldrin	0.025	ug/l	U	0.0083	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	Endrin	0.025	ug/l	U	0.017	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	Endrin aldehyde	0.025	ug/l	U	0.010	0.025
BN-1&3-29-SEEP-XD1	M59273-13	SW8468081	09/14/06	1	Endosulfan-I	0.014	ug/l	J	0.011	0.025
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	4,4'-DDT	0.022	ug/l	UJ	0.0082	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	Methoxychlor	0.022	ug/l	UJ	0.0082	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	4,4'-DDD	0.022	ug/l	UJ	0.011	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	4,4'-DDE	0.022	ug/l	U	0.011	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	Heptachlor	0.022	ug/l	UJ	0.010	0.022

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP3	M59273-2	SW8466020	09/14/06	2	Lead	3.5	ug/l		0.044	1.0
BN-1&3-29-SEEP3	M59273-2	SW8466020	09/14/06	2	Thallium	0.30	ug/l	J	0.17	1.0
BN-1&3-29-SEEP3	M59273-2	SW8466020	09/14/06	2	Antimony	0.77	ug/l	J	0.24	4.0
BN-1&3-29-SEEP3	M59273-2	SW8466020	09/14/06	2	Arsenic	3.2	ug/l		1.6	2.0
BN-1&3-29-SEEP3	M59273-2	SW8466020	09/14/06	2	Selenium	10	ug/l	U	0.61	10
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	Heptachlor epoxide	0.022	ug/l	U	0.0099	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	Endosulfan sulfate	0.022	ug/l	U	0.010	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	Aldrin	0.022	ug/l	U	0.0078	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	alpha-BHC	0.0083	ug/l	J	0.0069	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	beta-BHC	0.022	ug/l	U	0.0099	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	delta-BHC	0.022	ug/l	U	0.014	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	Endosulfan-II	0.022	ug/l	U	0.0090	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	alpha-Chlordane	0.022	ug/l	U	0.0062	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	gamma-Chlordane	0.022	ug/l	U	0.0062	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	Endrin ketone	0.022	ug/l	U	0.010	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	gamma-BHC (Lindane)	0.12	ug/l		0.011	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	Dieldrin	0.013	ug/l	J	0.0074	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	Endrin	0.022	ug/l	U	0.015	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	Endrin aldehyde	0.022	ug/l	U	0.0092	0.022
BN-1&3-29-SEEP3	M59273-2	SW8468081	09/14/06	1	Endosulfan-I	0.022	ug/l	U	0.0099	0.022
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Aluminum	941	ug/l		23.0	200
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Iron	21200	ug/l		30.0	100
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Magnesium	10700	ug/l		6.9	5000
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Manganese	2580	ug/l		0.38	15
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Nickel	24.2	ug/l	J	1.3	40
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Potassium	6200	ug/l	J	20.0	5000
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Sodium	37400	ug/l		150	5000
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Barium	49.0	ug/l	J	1.4	200
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Chromium	20.2	ug/l		1.3	10
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Cobalt	4.0	ug/l	J	2.2	50

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Copper	11.1	ug/l	J	0.83	25
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Vanadium	2.8	ug/l	J	1.0	50
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Zinc	37.3	ug/l		1.1	20
BN-1&3-29-SEEP3	M59273-2	SW8466010B	09/14/06	1	Calcium	54300	ug/l		9.8	5000
BN-1&3-29-SEEP3	M59273-2	SW8467470A	09/14/06	1	Mercury	0.086	ug/l	J	0.045	0.20
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Chlorobenzene	0.70	ug/l	J	0.40	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	1,2-Dichloroethene (total)	3.2	ug/l		1.0	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Benzene	0.44	ug/l	J	0.44	0.50
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	1,1,1-Trichloroethane	1.2	ug/l		0.40	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Carbon disulfide	1.4	ug/l	J	0.79	5.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	1,1-Dichloroethane	2.5	ug/l		0.67	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	Trichloroethene	1.7	ug/l		0.74	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-SEEP3	M59273-2	SW8468260B	09/14/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	5	Cadmium	20	ug/l	U	1.6	20
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	4,4'-DDT	0.091	ug/l	J	0.0078	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	Methoxychlor	0.021	ug/l	UJ	0.0078	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	4,4'-DDD	0.19	ug/l	J	0.010	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	4,4'-DDE	0.13	ug/l		0.011	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	Heptachlor	0.021	ug/l	UJ	0.0095	0.021
BN-1&3-29-SEEP5	M59273-3	SW8466020	09/14/06	2	Lead	107	ug/l		0.088	2.0
BN-1&3-29-SEEP5	M59273-3	SW8466020	09/14/06	2	Thallium	1.6	ug/l	J	0.33	2.0
BN-1&3-29-SEEP5	M59273-3	SW8466020	09/14/06	2	Antimony	3.7	ug/l	J	0.47	8.0
BN-1&3-29-SEEP5	M59273-3	SW8466020	09/14/06	2	Arsenic	1590	ug/l		3.2	4.0
BN-1&3-29-SEEP5	M59273-3	SW8466020	09/14/06	2	Selenium	5.1	ug/l	J	1.2	20
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Aluminum	28000	ug/l		23.0	200
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Iron	476000	ug/l		30.0	100
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Magnesium	15900	ug/l		6.9	5000
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Manganese	9540	ug/l		0.38	15
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Nickel	163	ug/l		1.3	40
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Potassium	5190	ug/l	J	20.0	5000
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Silver	1.5	ug/l	J	0.59	5.0
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Sodium	12400	ug/l		150	5000
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Barium	177	ug/l	J	1.4	200
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Beryllium	3.7	ug/l	J	1.3	4.0
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Chromium	39.7	ug/l		1.3	10
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Cobalt	209	ug/l		2.2	50
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Copper	58.6	ug/l		0.83	25
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Vanadium	158	ug/l		1.0	50

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Zinc	169	ug/l		1.1	20
BN-1&3-29-SEEP5	M59273-3	SW8466010B	09/14/06	1	Calcium	62500	ug/l		9.8	5000
BN-1&3-29-SEEP5	M59273-3	SW8467470A	09/14/06	1	Mercury	1.0	ug/l		0.045	0.20
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Acetone	32.8	ug/l		1.0	5.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Carbon disulfide	5.7	ug/l		0.79	5.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468260B	09/14/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	Heptachlor epoxide	0.021	ug/l	U	0.0094	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	Endosulfan sulfate	0.021	ug/l	U	0.0098	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	Aldrin	0.021	ug/l	U	0.0073	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	alpha-BHC	0.021	ug/l	U	0.0065	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	beta-BHC	0.021	ug/l	U	0.0094	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	delta-BHC	0.021	ug/l	U	0.013	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	Endosulfan-II	0.021	ug/l	U	0.0085	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	alpha-Chlordane	0.021	ug/l	U	0.0059	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	gamma-Chlordane	0.021	ug/l	U	0.0059	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	Endrin ketone	0.021	ug/l	U	0.0099	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	gamma-BHC (Lindane)	0.021	ug/l	U	0.010	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	Dieldrin	0.021	ug/l	U	0.0070	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	Endrin	0.021	ug/l	U	0.014	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	Endrin aldehyde	0.021	ug/l	U	0.0088	0.021
BN-1&3-29-SEEP5	M59273-3	SW8468081	09/14/06	1	Endosulfan-I	0.021	ug/l	U	0.0094	0.021
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	4,4'-DDT	0.020	ug/l	UJ	0.0076	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	Methoxychlor	0.020	ug/l	UJ	0.0076	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	4,4'-DDD	0.020	ug/l	UJ	0.0098	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	4,4'-DDE	0.020	ug/l	U	0.010	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	Heptachlor	0.020	ug/l	UJ	0.0092	0.020
BN-1&3-29-SEEP4	M59273-4	SW8466020	09/14/06	2	Arsenic	8.5	ug/l		1.6	2.0
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	2	Cadmium	8.0	ug/l	U	0.62	8.0
BN-1&3-29-SEEP4	M59273-4	SW8466020	09/14/06	2	Lead	4.8	ug/l		0.044	1.0
BN-1&3-29-SEEP4	M59273-4	SW8466020	09/14/06	2	Thallium	0.36	ug/l	J	0.17	1.0
BN-1&3-29-SEEP4	M59273-4	SW8466020	09/14/06	2	Antimony	1.4	ug/l	J	0.24	4.0
BN-1&3-29-SEEP4	M59273-4	SW8466020	09/14/06	2	Selenium	4.3	ug/l	J	0.61	10
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	Heptachlor epoxide	0.020	ug/l	U	0.0091	0.020

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	Endosulfan sulfate	0.020	ug/l	U	0.0095	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	Aldrin	0.020	ug/l	U	0.0071	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	alpha-BHC	0.020	ug/l	U	0.0063	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	beta-BHC	0.020	ug/l	U	0.0091	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	delta-BHC	0.020	ug/l	U	0.013	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	Endosulfan-II	0.020	ug/l	U	0.0083	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	alpha-Chlordane	0.020	ug/l	U	0.0057	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	gamma-Chlordane	0.020	ug/l	U	0.0057	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	Endrin ketone	0.020	ug/l	U	0.0096	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	gamma-BHC (Lindane)	0.020	ug/l	U	0.010	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	Dieldrin	0.020	ug/l	U	0.0068	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	Endrin	0.020	ug/l	U	0.013	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	Endrin aldehyde	0.020	ug/l	U	0.0085	0.020
BN-1&3-29-SEEP4	M59273-4	SW8468081	09/14/06	1	Endosulfan-I	0.020	ug/l	U	0.0091	0.020
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Aluminum	2870	ug/l		23.0	200
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Iron	221000	ug/l		30.0	100
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Magnesium	7180	ug/l		6.9	5000
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Manganese	80.8	ug/l		0.38	15
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Nickel	230	ug/l		1.3	40
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Potassium	16500	ug/l	J	20.0	5000
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Sodium	6040	ug/l		150	5000
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Barium	73.8	ug/l	J	1.4	200
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Chromium	107	ug/l		1.3	10
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Cobalt	16.5	ug/l	J	2.2	50
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Copper	24.8	ug/l	J	0.83	25
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Vanadium	59.9	ug/l		1.0	50
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Zinc	13.6	ug/l	J	1.1	20
BN-1&3-29-SEEP4	M59273-4	SW8466010B	09/14/06	1	Calcium	72700	ug/l		9.8	5000
BN-1&3-29-SEEP4	M59273-4	SW8467470A	09/14/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Styrene	5.0	ug/l	U	0.60	5.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Acetone	11.4	ug/l		1.0	5.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Carbon disulfide	1.2	ug/l	J	0.79	5.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SEEP4	M59273-4	SW8468260B	09/14/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SW4	M59273-5	SW8466020	09/14/06	2	Lead	0.49	ug/l	J	0.044	1.0
BN-1&3-29-SW4	M59273-5	SW8466020	09/14/06	2	Thallium	1.0	ug/l	UJ	0.17	1.0
BN-1&3-29-SW4	M59273-5	SW8466020	09/14/06	2	Antimony	0.84	ug/l	J	0.24	4.0
BN-1&3-29-SW4	M59273-5	SW8466020	09/14/06	2	Arsenic	2.0	ug/l	U	1.6	2.0
BN-1&3-29-SW4	M59273-5	SW8466020	09/14/06	2	Selenium	10	ug/l	U	0.61	10
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Aluminum	91.2	ug/l	J	23.0	200
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Iron	983	ug/l		30.0	100
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Magnesium	2040	ug/l	J	6.9	5000
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Manganese	203	ug/l		0.38	15
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Nickel	40	ug/l	U	1.3	40
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Potassium	1890	ug/l	J	20.0	5000
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Sodium	20100	ug/l		150	5000
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Barium	25.4	ug/l	J	1.4	200
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Chromium	10	ug/l	U	1.3	10
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Cobalt	50	ug/l	U	2.2	50
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Copper	25	ug/l	U	0.83	25
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Vanadium	50	ug/l	U	1.0	50
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Zinc	7.4	ug/l	J	1.1	20
BN-1&3-29-SW4	M59273-5	SW8466010B	09/14/06	1	Calcium	10100	ug/l		9.8	5000
BN-1&3-29-SW4	M59273-5	SW8467470A	09/14/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-SW4	M59273-5	SW8468260B	09/14/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8466020	09/14/06	2	Lead	0.42	ug/l	J	0.044	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8466020	09/14/06	2	Thallium	0.57	ug/l	J	0.17	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8466020	09/14/06	2	Antimony	0.57	ug/l	J	0.24	4.0
BN-1&3-29-SW-XD1	M59273-6	SW8466020	09/14/06	2	Arsenic	2.0	ug/l	U	1.6	2.0
BN-1&3-29-SW-XD1	M59273-6	SW8466020	09/14/06	2	Selenium	10	ug/l	U	0.61	10
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Aluminum	90.6	ug/l	J	23.0	200

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Iron	1060	ug/l		30.0	100
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Magnesium	2100	ug/l	J	6.9	5000
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Manganese	204	ug/l		0.38	15
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Nickel	40	ug/l	U	1.3	40
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Potassium	1940	ug/l	J	20.0	5000
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Sodium	20500	ug/l		150	5000
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Barium	26.3	ug/l	J	1.4	200
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Chromium	10	ug/l	U	1.3	10
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Cobalt	50	ug/l	U	2.2	50
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Copper	25	ug/l	U	0.83	25
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Vanadium	50	ug/l	U	1.0	50
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Zinc	7.5	ug/l	J	1.1	20
BN-1&3-29-SW-XD1	M59273-6	SW8466010B	09/14/06	1	Calcium	10400	ug/l		9.8	5000
BN-1&3-29-SW-XD1	M59273-6	SW8467470A	09/14/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-SW-XD1	M59273-6	SW8468260B	09/14/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SW16	M59273-7	SW8466020	09/14/06	2	Lead	0.37	ug/l	J	0.044	1.0
BN-1&3-29-SW16	M59273-7	SW8466020	09/14/06	2	Thallium	0.18	ug/l	J	0.17	1.0
BN-1&3-29-SW16	M59273-7	SW8466020	09/14/06	2	Antimony	0.59	ug/l	J	0.24	4.0
BN-1&3-29-SW16	M59273-7	SW8466020	09/14/06	2	Arsenic	2.0	ug/l	U	1.6	2.0
BN-1&3-29-SW16	M59273-7	SW8466020	09/14/06	2	Selenium	10	ug/l	U	0.61	10
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Aluminum	101	ug/l	J	23.0	200
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Iron	1020	ug/l		30.0	100
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Magnesium	2140	ug/l	J	6.9	5000
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Manganese	261	ug/l		0.38	15
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Nickel	40	ug/l	U	1.3	40
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Potassium	1990	ug/l	J	20.0	5000
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Sodium	20400	ug/l		150	5000

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Barium	25.7	ug/l	J	1.4	200
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Chromium	10	ug/l	U	1.3	10
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Cobalt	50	ug/l	U	2.2	50
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Copper	25	ug/l	U	0.83	25
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Vanadium	50	ug/l	U	1.0	50
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Zinc	5.8	ug/l	J	1.1	20
BN-1&3-29-SW16	M59273-7	SW8466010B	09/14/06	1	Calcium	10600	ug/l		9.8	5000
BN-1&3-29-SW16	M59273-7	SW8467470A	09/14/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-SW16	M59273-7	SW8468260B	09/14/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SW8	M59273-8	SW8466020	09/14/06	2	Lead	0.36	ug/l	J	0.044	1.0
BN-1&3-29-SW8	M59273-8	SW8466020	09/14/06	2	Thallium	1.0	ug/l	U	0.17	1.0
BN-1&3-29-SW8	M59273-8	SW8466020	09/14/06	2	Antimony	0.58	ug/l	J	0.24	4.0
BN-1&3-29-SW8	M59273-8	SW8466020	09/14/06	2	Arsenic	2.0	ug/l	U	1.6	2.0
BN-1&3-29-SW8	M59273-8	SW8466020	09/14/06	2	Selenium	10	ug/l	U	0.61	10
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Aluminum	66.0	ug/l	J	23.0	200
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Iron	906	ug/l		30.0	100
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Magnesium	2240	ug/l	J	6.9	5000
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Manganese	296	ug/l		0.38	15
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Nickel	40	ug/l	U	1.3	40
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Potassium	1640	ug/l	J	20.0	5000
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Sodium	19000	ug/l		150	5000
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Barium	22.3	ug/l	J	1.4	200
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Chromium	10	ug/l	U	1.3	10
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Cobalt	50	ug/l	U	2.2	50
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Copper	25	ug/l	U	0.83	25
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Vanadium	50	ug/l	U	1.0	50

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Zinc	9.6	ug/l	J	1.1	20
BN-1&3-29-SW8	M59273-8	SW8466010B	09/14/06	1	Calcium	10300	ug/l		9.8	5000
BN-1&3-29-SW8	M59273-8	SW8467470A	09/14/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-SW8	M59273-8	SW8468260B	09/14/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SW9	M59273-9	SW8466020	09/14/06	2	Lead	0.27	ug/l	J	0.044	1.0
BN-1&3-29-SW9	M59273-9	SW8466020	09/14/06	2	Thallium	1.0	ug/l	U	0.17	1.0
BN-1&3-29-SW9	M59273-9	SW8466020	09/14/06	2	Antimony	0.61	ug/l	J	0.24	4.0
BN-1&3-29-SW9	M59273-9	SW8466020	09/14/06	2	Arsenic	2.0	ug/l	U	1.6	2.0
BN-1&3-29-SW9	M59273-9	SW8466020	09/14/06	2	Selenium	10	ug/l	U	0.61	10
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Aluminum	41.2	ug/l	J	23.0	200
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Iron	875	ug/l		30.0	100
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Magnesium	2290	ug/l	J	6.9	5000
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Manganese	193	ug/l		0.38	15
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Nickel	40	ug/l	U	1.3	40
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Potassium	1940	ug/l	J	20.0	5000
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Sodium	20400	ug/l		150	5000
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Barium	22.4	ug/l	J	1.4	200
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Chromium	10	ug/l	U	1.3	10
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Cobalt	50	ug/l	U	2.2	50
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Copper	25	ug/l	U	0.83	25
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Vanadium	50	ug/l	U	1.0	50
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Zinc	6.1	ug/l	J	1.1	20
BN-1&3-29-SW9	M59273-9	SW8466010B	09/14/06	1	Calcium	11100	ug/l		9.8	5000
BN-1&3-29-SW9	M59273-9	SW8467470A	09/14/06	1	Mercury	0.20	ug/l	U	0.045	0.20
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Chloromethane	2.0	ug/l	UJ	1.6	2.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-SW9	M59273-9	SW8468260B	09/14/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0

DATA VALIDATION MEMORANDUM
NAS BRUNSWICK SITES 1 & 3
SEPTEMBER 2006 SAMPLING ROUND 29 (SDG M59294)

TO: ENGINEERING FACILITY COMMAND NORTHEAST

FROM: JACKSON KIKER, ECC SENIOR CHEMIST, MARLBOROUGH, MA

SUBJECT: NAS BRUNSWICK SITES 1 & 3 MONITORING EVENT 29

DATE: 11/9/2006

Project data were validated using the following Validation Functional Guidelines, as modified for non-CLP methods and project-specific QAPP measurement performance criteria (MPC):

1. Region I, EPA-NE Data Validation Functional Guidelines for Evaluation of Environmental Analyses (Dec, 1996),

2. National Functional Guidelines for Evaluation Inorganic Analysis (1988), and

3. National Functional Guidelines for Evaluation Organic Analysis (October 1999).

The data were assessed against the MPC listed in the approved Site 1& 3 and Eastern Plume LTMP QAPP (May 2000). The QAPP MPC and validation guideline exceedences are assessed and documented on the method/QAPP specific data validation worksheets. On these data validation worksheets the data quality acceptance criteria are presented, analytes requiring qualification based on MPC and/or validation guidance criteria exceedences are listed, assigned qualifiers, qualifying rationale is documented, and any potential bias noted. The overall evaluation of the data generated by a method is presented in the data validation worksheet.

Standard EPA Region I data qualifiers are used to denote the assessment of data quality. The final and ranking assigned data qualifier for an analyte is presented in the data summary table. Ancillary qualifiers are noted on the data validation worksheets.

The USEPA Region I Organic Regional Data Assessment (ORDA) sheet displays the summarized results of the data validation assessment for all analytical methods reported in the SDG.

ACRONYMS AND ABBREVIATIONS

Following is a list of acronyms and abbreviations that may be used in the data validation reports.

Acronym or Abbreviation	Definition
%D	Percent difference
%R	Percent recovery
%M	Percent moisture
%S	Percent solids
Ug/L	Microgram per liter
BD	Breakdown
BEHP	2-bis(ethylhexyl)phthalate
BFB	Bromofluorobenzene
CCB	Continuing calibration Blank
CCC	Continuing Check Compound
CCV	Continuing Calibration Verfication
COC	Chain of custody
CRI	standard at RL for ICP
CVAA	Cold vapor atomic absorption
DFTPP	Decafluorotriphenylphosphine
DQO	Data quality objective
EB	Equipment blank
EPA	Environmental Protection Agency
FD	Field duplicate
GC	Gas Chromatography
GC/MS	Gas chromatography/mass spectrometry
HT	Holding time
ICAL	Initial calibration
ICS-A/AB	Interelement check standard A or AB
ICV	Initial calibration verification
IDL	Instrument detection limit
IS	Internal standards
LCL	Lower control limit
LCS	Laboratory control sample
LTMP	Long term monitoring plan
MeCl	Methylene chloride
MS	Matrix spike

Acronym or Abbreviation	Definition
MSD	Matrix spike duplicate
MPC	Measurement performance criteria
NA	Not applicable
NC	Not calculated.
PAH	Polycyclic aromatic hydrocarbon
PCB	Polychlorinated biphenyls
PQL	Practical quantitation limit
QAPP	Quality Assurance Project Plan
QC	Quality control
RF	Response Factor
RPD	Relative percent difference
RRF	Relative response factor
RSD	Relative standard deviation
RT	Retention time
SDG	Sample Delivery Group
SOP	Standard Operation Procedure
SVOC	Semi-volatile organic compound
SPCC	System performance check compound
SQL	Sample Quantitation Limit
TB	Tripblank
TCX	Tetrachloro-m-xylene
TIC	Tentatively identified compound
UCL	Upper control limit
VOC	Volatile organic compound

DATA QUALIFIER REFERENCE TABLE

Data validation reports will summarize the samples reviewed, elements reviewed, any nonconformances with the established criteria, validation actions (including data qualifiers). Data qualifiers will be consistent with EPA Region I – New England guidelines and will consist of the following:

USEPA Region I – Data Qualifier	USEPA Region I – Qualifier Definition
J	The analyte was positively identified; the associated numerical value is the approximate concentration of the analyte in the sample
UJ	The analyte was not detected above the sample reporting limit; and the reporting limit is approximate
U	The sample was analyzed for, but was not detected above the sample reporting limit.
R	The sample result is rejected due to serious deficiencies. The presence or absence of the analyte cannot be verified

Region I, EPA-NE ORGANIC REGIONAL DATA ASSESSMENT

LAB NAME: Northeast Laboratory
SDG #:__M59294
EPA-NE DV TIER LEVEL:___II___
SITE NAME: NAS Brunswick – Sites 1&3

# of SAMPLES/MATRIX: 5 sediment & 1 FD
VALIDATION CONTRACTOR:__ECC/ASW
VALIDATOR'S NAME: Sherri Pullar
DV Completion Date:_ November 9, 2006.
Date Sampled__14 September 2006.

ANALYTICAL DATA QUALITY SUMMARY

		VOC	Pesticides	TOC	Metals
1	Preservation and HT	O	O	O	O
2	Instrument Performance Check	O	O	M	M
3	Initial Calibration:	M	O	O	O
4	Continuing Calibration:	M	M	O	O
5	Blanks:	M	O	O	O
6	Surrogate Compounds:	O	O	-	-
7	Internal Standards	O	O	-	-
8	Matrix Spike/Matrix Spike Duplicate:	M	O	O	M
9	Sensitivity Check:	O	O	O	O
10	PE Samples- Accuracy Check	O	O	O	M
11	Target Compound Identification:	O	O	O	O
12	Compound Quantitation and Reported QLs	O	O	O	O
13	Tentatively Identified Compounds:	-	-	-	-
14	Semivolatile/Pesticide/PCB Cleanup:	-	O	-	-
15	Data Completeness	O	O	O	O
16	Overall Evaluation of Data:	O	O	O	O

O = Data had no problems or were qualified due to minor contractual problems; M = Data were qualified due to major/systemic MPC exceedences: Z = Data were rejected as unusable due to major contractual problems.

ACTION ITEMS: (Z items): None.

AREAS OF CONCERN: (M items):

VOC: Non-detect result for 1,2-dichlorobenzne was qualified UJ in sample 7A due to MS/MSD recoveries being outside MPC limits. Results for acetone and carbon tetrachloride were qualified J for detects and UJ for non-detects in sample 7A due to MS/MSD RPD's. Non-detect result for trans-1, 3-dichloropropene was qualified UJ in sample 7A due to ICV %D outside MPC limits. Non-detect results for chloromethane and methylene chloride were qualified UJ in sample 7A due to CCV %D outside MPC limits.

Metals: Cr results qualified J in samples 1 and 2 due to field duplicate RPD outside MPC limits. Se results qualified J in sample 2 and UJ in sample 1 due to field duplicate RPD outside MPC limits. Results <MRL and >IDL were qualified J. Ba detects qualified J in samples 1-6 due to MS %R >UCL. Results for Se and Ag were qualified J for detects and qualified UJ for non-detects in samples 1-6 due to RPD outside MPC limits. Results for K were qualified J in samples 1-6 due to serial dilution %D outside MPC limits.

Pesticides: Results for 4,4'-DDT and methoxychlor were qualified UJ in samples 1-6 due to CCV %D outside MPC limits.

TOC: TOC results in samples 1 and 2 were qualified J for detects and UJ for non-detects due to field duplicate RPD outside MPC limits.

COMMENTS:

ECC Region I Data Review Worksheet (rv 3) **VOCs 5030B/5035//8260B**
Project: NAS Brunswick Sites 1&3 ECC Job No. 5700 **Review Criteria: Sites 1, 3 & EP**
& **USEPA Region I Tier II Guidance**

Data Validation Level	Matrix	Preservation	Temp Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous/ Soil**	**HCl/methanol/sodium bisulfate**	**1 batch – Temp (^oC): < 6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59294**

Field Identification and Laboratory Number of Samples Evaluated:

Field ID	Lab Sample Number
BN-1&3-29-QT1	M59294-7
BN-1&3-29-QT1	M59294-7A

Note: Samples are described below in the data worksheets by reference to the last few digits of the Lab Sample Number.

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inventory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects preserved per method (amber bottles, temperature, HCl (aq), MeOH/NAHSO4 (soils) (J, UJ, or R (function of HT and compound)	Cooler temperatures < 6 ^oC. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. No samples qualified.	X	-	
Holding Time	1) 14 Days to analysis, if preserved 2) J –detects, UJ or R – non-detects (function of time) 3) *transcription errors	Dates collected: September 18, 2006. Analyzed before: September 28, 2006. All samples analyzed within holding time. No samples qualified.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made. 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	NA	X	-	
Lab Blanks (method blanks)	1) < 5x (<10x common) contaminants for aq samples- 2) <10X common contaminants – acetone, 2-butanone or Mecl. 1) TGT analytes <Lab QL 2) if linear range is exceeded, verify if a instrument blank was performed 3) *verify accurate transcription of times, Ids, are reported on forms 4) *verify from the raw data if the instrument blank was performed in the same vessel 5) *verify IS, RRT, and surrogate %R *check 10% of raw chromatograms for false +/-, check for transcription errors	2 batches of samples were analyzed – on September 28 & 25, 2006. September 28 – all MB detections were non-detect in applicable samples. September 25– MeCl Results for MeCl in sample 7A was qualified U.	X	Results for MeCl in sample 7A was qualified U.	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
Trip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate cross matrix TB (X rules apply to raw data) 4) MeCl & Acetone < 5 5) >RL report sample level U 6) <RL report PQL as U	Sample 7 was non-detect for all VOC's of concern. Sample 7A – contained methylene chloride (8.3 ug/Kg) & acetone (12.9 ug/Kg) – methylene chloride was qualified U due to method blank contamination. Samples associated with the TB were included in another SDG. No sample qualifications.	X	-	
Equip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate TB (X rules don't apply) 3) MeCl & Acetone < 5 *Check IS area (10% of them) * recalculate surrogate (%R – 10 % of them)	Not collected/analyzed with this SDG as all the equipment were dedicated.	-	-	
Results > Cal Range or <Cal Range	6) >Upper Cal Range J-detects - ensure instrument blank performed 7) <PQL but >MDL – J –detects (estimated) listed on data summary sheet.	Attached data summary table. Analytes with results >MDL but <PQL/RL were qualified J. No sample results were >MDL but <PQL/RL, no samples qualified.	X	-	
*TICs (if reported)	1) *verify library search for samples and blanks 2) verify TICs were not misreported compounds (different fraction or miss in search) 3) All TICs – J estimated 4) * verify blanks do not contain TIC peaks 5) * check TIC assignment spectra to STD spectra 6) *review blank and Samples for common lab contaminants	None Reported/not evaluated	-	-	
Surrogates	1,2-Dichloroethane-d4 65-135% Dibromofluoromethane 75-129% Toluene-d8 82%-120% 4-BFB 69%-125% *check raw data for surrogated (recalculate 10% of them). *Transcription errors Qualification: >UCL J –detects, %R<10% J –detects, R –Nods, %R >10% but <70% J-detects, UJ NDs	Surrogate recovery within MPC limits. No samples qualified.	X	-	
LCS Recovery	1) Attachment A-2 of LTMP 2) All VOCs 60-140% 3) 10% and <LCL% J detects, UJ –Nods 4) >UCL% J detects <10% R NDs, J-detects 7) *Recalculate the concentrations for one compound in the LCS 8) * Recalucate the %R (within 10% of lab) Note: Tier guidance as a zero blind	LCS recoveries were within MPC limits.	X	-	
*MS/MSD/unspike sample RSD	1)For unspiked compounds if reported, Non- MS spike compounds <50% RSD calculated from MS/MSD/Unspiked Qualification: >50% RSD J-detects 2)*recalculate the RPD (within 10% of lab)	NA	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
*Compound Quantitation (completed as part of other steps)	1) Check sensitivy (MDL< 1/3 PQL) 2) *Recalculate one detection and quantitation limit 3) *verify concentrations have been adjusted to account for DW, DF, 4) *verifiy correct IS and RRF were used	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 8) *Matrix effects- MS/MSD, surrogated, PDS. 9) *System chromatography- evaluate RRTs, peaks shapes, system impacts on data, baseline shifts. 10) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
*TGT Compound Identification	1) *Within 0.06 (30 sec) of CCV RRT 2) * compare sample Mass spectra to standard spectra; a) all ions in std spectra (with 10% rel intensity) presnent in sample spectra. B) sample ion abundance within 20% of standard spectra. 3) *chromatogram: all peaks greater than 10% of nearest IS identified.	NA	-	-	
Field Dup RPD	1) RPD ≤ 30% aq. ≤ 50 soil for Results > PQL (FD pair only) J-detects (both > PQL) 2) Note: FD RPD not specified in QAPP. 30% will be used as the MPC, to be consistent with other NASB QAPPs. 3) If one >PQL, other ND, J-detections, UJ non-detect 4) Other conditions use judgement 5) Determine RPD for detects only. *Recalculate the concentrations for one compound and the PQL	No field duplicate collected.	X	-	
Single Blind PE	1) Qualify associated samples in PES batch PES = ND, Detects J – ND PE analytes in samples, NDs – R 11) PES > acceptance criteria – Detects in samples J, 12) PES<acceptance criteria – Detects J, NDs –R 13) VOA/SV-XI14 other criteria 14) *% of PES sample above and below criteria *Recalculate concentrations for one tgt compound per PES (10% of lab)	NA	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
MS/MSD Recovery	1) Attachment A-2 of LTMP 2) 60-140% for all VOCs (if MS > 4X native levels) Qualification of MS sample: <10% J detects, R NDs >10% and <LCL% J detects, UJ -NDs >UCL% J detects 3) *Recalculate the concentrations for one compound in the MS/MSD 5) * Recalculate the %R (within 10% of lab)	Native sample: M59280-1 MS/MSD recoveries within MPC limits. No samples qualified. Native sample: M59298-1 MS/MSD recoveries within MPC limits with the exception of acetone (>UCL), 2-butanone (>UCL), carbon disulfide (>UCL), 1,2-dichlorobenzne (<LCL), methylene chloride (>UCL), 1,1,2,2-tetrachloroethane (>UCL). Native sample results for the above compounds were non-detect. Non-detect result for 1,2-dichlorobenzne was qualified UJ in sample 7A.	X	Non-detect result for 1,2-dichlorobenzne was qualified UJ in sample 7A.	-
MS/MSD RPD (LCS/LCSD RPD)	RPD ≤20% (aq/S) (when MS >QL) J – detects in MS sample UJ-non detects * recalculate RPD	Native sample: M59280-1 MS/MSD RPD's within MPC limits. No samples qualified. Native sample: M59298-1 MS/MSD RPD's within MPC limits with the exception of acetone, carbon tetrachloride and 1,2-dichlorobenzene.	X	Results for acetone and carbon tetrachloride were qualified J for detects and UJ for non-detects in sample 7A.	
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 6) * performed annually 7) *MDL is at least ½ of PQL 8) *tgt and surrogate 80-120% R *VOA/SV-X11 (recalcuate %RSD and %R for three compounds (10% of them).	NA	-	-	
Internal Stds	1) IS are –50% to 200% of last Ical, or CCV 3) RRT<0.06 (30 sec) 4) IS>100% J-detects 5) IS<20%CCV NDs – R 6) IS>20%CCV <50%CCV NDs – UJ 7) *check for IS transcription errors 8) FBZ = fluorobenzene 9) CBZ = chlorobenzene-d5 10) DCB = 1,4 dichlorobenzene-d4	Internal standard areas inside MPC limits. No samples qualified.	X	-	
Sensitivity	1) MDL study – 7 replicates (40 CFR) 2) Surrogates %in control limits. 3) %R <10 ND- (R) , J- detects 4) 10%> but <LCL% , judgement 5) %R>UCL% J-detects 6) QC, IS, RRT meet criteria, 7) %RSD < 20% 8) MDL< MQL (3x less ideal) 9) Lab fortitied blank (see VOA/SV Part II –section X). 10) *Check and recalculate %RSDs and %R for three compounds (with 10% of lab) <u>Dilution factors for samples – impacts to</u>	No dilutions required. No sample qualifications.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
	sensitivity				
Tune check	1) ion abundance with method limits 2) *check for co-elution /proper background subtraction 3) *compare reported data to raw data	Tunes were within MPC limits. Detections verified from the tunes & GC. No sample qualifications.	X	-	
Initial Cal Multipoint (instrument evaluation)	1) correct calibration stds 2) within 12 hours of the tune check 3) CCCs %RSD: <30% (1,1 DCA, chloroform, 1,2dichloropropane, Toluene, EB, VC (J –detects, R or UJ NDs all samples associated with Ical) 4) SPCCs Average RRF: SPCCs Chloromethane >0.10, 1,1 DCA>0.10, bromoform >0.10, chlorobenzene>0.3, 1122TCA>0.3 (J –detects, R NDs) 5) RRF>0.05 all compounds 6) RRT < 0.06 units (all stds within 30 sec) 7) %RSD<15% for all non-CCCs or COD>0.99 *8) RRF exclusions: surrogates, acetone, MeCL, chloroethane/methane, CS, 1,/22/03 2-butanone, 1,2 dichloropropane, 2-hexanone (IV-8)./* 9) *verify that instrument parameters met method and that Ical and analysis used the same parameters 10) *recalculate RRF one tgt compound associated with each IS. Recalculated values within 10% of lab values. 11) *recalculate one tgt compound associated with each IS. Recalculated values within 10% 12) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 13) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument GCMSH Date: September 27 All RRF's within MPC limits for all VOC's of concern. All CCCs are in MPC. All SPCC are in MPC. Instrument GCMSL Date: September 24 All RRF's within MPC limits for all VOC's of concern. All CCCs are in MPC. All SPCC are in MPC.	X	-	
Initial Cal (Linearity)	%RSD < 15% use average RF for calibration %RSD> 15% use least squares COD (r2) > 0.990 or correlation coefficient r> 0.995 Qualification for compounds with : %RSD>30% and RRF>0.05 – J detects, UJ - NDs %RSD<30% and RRF<0.05; -J detects, R - ND %RSD>30% and RRF<0.05: J detects, R - ND (see VOA/SVIII-4)	Instrument GCMSH Date: September 27 Applicable to sample 7 – Applicable to all samples – analytes with average response factors exceeding 15% were determined by linear or quadractic curves. No sample qualifications. Instrument GCMSL Date: September 24 Applicable to sample 7A – Applicable to all samples – analytes with average response factors exceeding 15% were determined by linear or quadractic curves. No sample qualifications.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
2nd Source ICV	QC check nor criteria not specified in QAPP. %D<25% or %R (between ICV and Ical) analytes 80%--120% (+ or -) once per 5 pt cal used to evaluate data sets. Qualification: J detects, R or UJ NDs	Instrument GCMSH Date: September 28 %D's were within MPC limits. Instrument GCMSL Date: September 24 %D's were within MPC limits with the exception of acetone & trans-1, 3-dichloropropene.	X	Non-detect result for trans-1, 3-dichloropropene was qualified UJ in sample 7A.	
CCV	1) SPCCs Average RRF: SPCCs Chloromethane >0.10, 1,1 DCA>0.10, bromoform >0.10, chlorobenzene>0.3, 1122TCA>0.3 2) RRF all compounds > 0.05 3) CCC: (1,1 DCA, chloroform, 1,2dichloropropane, Toluene, EB, VC) %D<20% (or all analytes if no CCCs reported). 4) Qualification-J detects, R or UJ NDs 5) *verify same instrument and parameters 6) *Recalculate RRF for one tgt cmpd associated with each IS. (within 10%) 7) *Recalculate %D for one tgt cmpd associated with each IS (within 10%) 8) *IS RRT<0.06 units (30 sec) 9) * IS area -50 % to 100 % of last ICAL 10) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 11) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument GCMSH Date: September 28 September 28 – applicable to sample 7 - %D within MPC limits. Instrument GCMSL Date: September 24 September 25 – applicable to sample 7A – %D within MPC limits with the exception of chloromethane, acetone, & methylene chloride.	X	Non-detect results for chloromethane and methylene chloride were qualified UJ in sample 7A.	
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Laboratory precision and accuracy acceptable. No apparent sample bias. Sample results are usable for making project decisions, as qualified. Results for MeCl in sample 7A was qualified U due to method blank contamination. Non-detect result for 1,2-dichlorobenzne was qualified UJ in sample 7A due to MS/MSD recoveries being outside MPC limits. Results for acetone and carbon tetrachloride were qualified J for detects and UJ for non-detects in sample 7A due to high MS/MSD RPD's. ICAL; within MPC limit. ICV: within MPC limits with the exception of acetone & trans-1, 3-dichloropropene. CCV: Non-detect results for chloromethane and methylene chloride were qualified UJ in sample 7A due to CCV %D outside MPC limits. Sampling error:	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
		No field duplicated collected in this SDG. Sampling error not evaluated.			

* Tier III review items only.
Completeness Check: Inventory Check Sheet_____X__. Sample Quantitation Calculations (TIER III only):

Lab Correspondence: None.

ECC Region I Data Review Worksheet (rv 3) **Pesticides 3510C/3545/8081A**
Project:NAS Brunswick Sites 1&3 ECC Job No. 5700 **Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance**

Data Validation Level	Matrix	Preservation	Temperature Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**-**	**1 batch – Temp (^oC): < 6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59294**

Field Identification of Samples Evaluated:

Field ID	Lab Sample Number
BN-1&3-29-SED19	M59294-1
BN-1&3-29-SED-XD1	M59294-2
BN-1&3-29-SED15	M59294-3
BN-1&3-29-SED16	M59294-4
BN-1&3-29-SED17	M59294-5
BN-1&3-29-SED18	M59294-6

Note: Samples are described below in the data worksheets by reference to the last few digits of the Lab Sample Number

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects 3) preserved per method (amber bottles, temperature. J, UJ, or R (function of HT and compound)	Cooler temperatures < 6 ^oC. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. Sample preservation within limits. No samples qualified.	X	-	
Holding Time	1) 7 days to extract (14 days for solids) and 40 days to analysis J –detects, UJ or R – nondetects (function of time)	Dates collected: September 14, 2006. Date extracted: September 21, 2006. Date analyzed: September 29, 2006. All samples extracted and analyzed within holding time. No samples qualified.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made (no USACE) 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	Not applicable	-	-	
Results > Cal Range or <Cal Range	1) >Upper Cal Range J-detects - ensure instrument blank performed 2) <PQL but >MDL – J –detects (estimated)	Attached data summary table. No results >MDL but <PQL/RL or exceeding upper calibration range.	X	-	
Equip Blank	< 5x (<10x common) contaminants for aq samples – for soil indicate EB (X rules don't apply)	Not collected/analyzed with this SDG.	-	-	
Surrogates	Surrogate acceptance limits not specified in the LTMP. Use laboratory statistical limits. TMX 30-150% DCB 30-150% Qualification: >UCL J –detects, %R<10% J –detects, R –NDs, %R >10% but <60% J-detects, UJ NDs	All surrogate recoveries within MPC limits. No sample qualifications.	X	-	

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
Lab Blanks (method blanks)	1) < 5x (<10x common) contaminants – U 2) analytes <lab PQL (contract lab)	MB's were non-detect in both columns. No sample qualifications.	X	-	
LCS Recovery	1) QAPP limits 10% and <LCL% J detects, UJ -NDs >UCL% J detects <10% R NDs, J-detects Attachment A-2 LTMP; Gamma-BHC (Lindane) 56-123% Heptachlor 40-131% Aldrin 40-120% Dieldrin 52-126% Endrin 56-121% 4,4'-DDT 38-127%	All LCS recoveries within MPC limits. No sample qualifications.	X	-	-
MS/MSD Recovery	1) QAPP limits (if MS > 4X native levels) Qualification of MS sample: <10% J detects, R NDs >10% and <LCL J detects, UJ -NDs >UCL J detects Attachment A-2 LTMP; Gamma-BHC (Lindane) 56-123% Heptachlor 40-131% Aldrin 40-120% Dieldrin 52-126% Endrin 56-121% 4,4'-DDT 38-127%	Native sample 1 MS/MSD recoveries within MPC limits. No samples qualified.	X	-	-
MS/MSD RPD	MS/MSD RPD per QAPP Attachment A-2 Gamma-BHC (Lindane) <15% Heptachlor <20% Aldrin <22% Dieldrin <18% Endrin <21% 4,4'-DDT <27%% J –detects in MS sample UJ-non detects	Native sample 1 MS/MSD RPD's within MPC limits. No samples qualified.	X	-	
Cleanup Performance Check (if performed)	%R< 10% NDs-R detections J %R>10% <LCL (80%GPC) –detections J, NDs UJ %R>UCL (120%) – detections J Retention Time shift <5%, symmetrical peakshape. GPC check with interferants. Good surrogate recovery, GPC blank check – no carryover.(VOA/SV-IX-I6). Sulfur and High MW compounds removed. SW-846 clean-up not required	NA	-	-	
Retention times	Within 3X standard deviation for each analyte from 72-hour study Exceeds: R qualify data	No samples qualified.	X	-	

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
Field Dup RPD	1) RPD ≤ 50% soil and <30% waters for Results >2X PQL (FD pair only) J-detects (both > X PQL) 2) If one >2X PQL, other ND, J-detections, UJ non-detect Other conditions use judgement	Field Sample Field Duplicate 1 2 FD Pair 1/2; RPD's within MPC limits. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.	X		
DDT Degradation check	Degradation Breakdown (BD) Check every 12 hours and prior to sample analysis. DDT Breakdown: <15% for all checks associated with samples. Endrin Breakdown: <15% for check prior to sample analysis. If BD>15% J detects Endrin/DDT.	Instrument: GCBE. Endrin breakdown within MPC limits for all applicable samples. DDT breakdown within MPC limits for all samples. No sample qualifications.	X	-	
Initial Cal (Linearity)	Correct calibration stds %RSD < 20% use average RF for calibration %RSD> 20% use least squares COD (r2) > 0.990 or correlation coefficient r> 0.995 or alternatively mean %RSD <20% for all target analytes, with no analyte %RSD>40%	Instrument: GCBE. Dates: September 28, 2006. RSD<20% or COD >0.99 for both columns. No sample qualifications.	X	-	
2nd Source ICV	%R (between ICV and Ical) analytes %D ≤ 15%, (+ or -) once per 5 pt cal Qualification: J detects, R or UJ NDs	Instrument: GCBE. Dates: September 29, 2006. All %D's were within MPC limits in both columns.	X	-	
CCV	1) QAPP: 15% of initial calib. Curve (85%-115%). J qualify data. 2) Qualification-J detects, R or UJ NDs	Instrument: GCBE. Dates: September 29, 2006. All %D's were within MPC limits for first column. %D's for 4,4'-DDT and methoxychlor were outside MPC limits on second column. Dates: September 30, 2006. %Area was outside MPC limits for 4,4'-DDT on the first column. %D and %area were outside MPC limits for 4,4'-DDT and methoxychlor.	X	Results for 4,4'-DDT and methoxychlor were qualified UJ in samples 1-6.	
Compound Quantitation	1) Check sensitivy (MDL< 1/3 PQL or per QAPP 2) %D <25% primary and secondary column identification and quantitation 3) Target compounds by 8081 Lindane PQL 0.05 ug/L MCL/MEG 0.2 4,4' DDT PQL 0.02 ug/L MEG/0.83	Endosulfan-I in samples 1, 2, 4, & 5 were the only detected results. %D between both columns < 25%. No sample qualifications.	X	-	
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	The laboratory results, as qualified, are usable for making project decisions. All surrogate, LCS, MS/MSD recoveries and MS/MSD RPD's were within MPC limits. ICAL and ICV are within MPC limits for all samples. CCV - %D and/or %area were outside MPC limits for 4,4'-DDT and methoxychlor. Endosulfan-I in samples 1, 2, 4, & 5 were the only detected results. %D between both columns < 25%.. No method blank detection for the compound.	X	-	-

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
		Field Sample 1 / Field Duplicate 2 FD Pair 1/2; RPD's within MPC limits. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.			

*(Tier III check items) Completeness Check: Inventory Check Sheet_____X__ Sample Quantitation Calculations (TIER III ONLY):

Lab Correspondence: None.

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

Metals 6010B/7471A
Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

Data Validation Level	Matrix	Preservation	Temperature Sample Receipt	Laboratory	SDG Number
Tier II	**Solid**	**-**	**1 batch – Temp (^oC): < 6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59294**

Field Identification of Samples Evaluated:

Field ID	Lab Sample Number
BN-1&3-29-SED19	M59294-1
BN-1&3-29-SED-XD1	M59294-2
BN-1&3-29-SED15	M59294-3
BN-1&3-29-SED16	M59294-4
BN-1&3-29-SED17	M59294-5
BN-1&3-29-SED18	M59294-6

Note: Samples are described below in the data worksheets by reference to the last three digits of the Lab Sample Number

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects 3) preserved per method (amber bottles, temperature. J, UJ, or R (function of HT and compound)	Cooler temperatures <6°C. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. Sample preservation within limits. No samples qualified.	X	-	
Holding Time	1) 180 days (6010), Hg 28 Days to analysis 2) J –detects, UJ or R –nondetects (function of time)	All samples analyzed within holding time. No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 30% water; ≤50% soil (no QAPP Criteria) for Results > X PQL (FD pair only) J-detects (both > X PQL) 2) If one >X PQL, other ND, J-detections, UJ non-detect	Field Sample 1 / Field Duplicate 2 FD Pair 1/2; Cr FD RPD>MPC & Se not detected in the field sample but had a low-level detect in the FD. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.	X	Cr results qualified J in samples 1 and 2. Se results qualified J in sample 2 and UJ in sample 1.	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs –R	% Solid > 30%. No samples qualified.	X	-	

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

Metals 6010B/7471A
Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
Results > Cal Range or <Cal Range	1) >Upper Cal Range J-detects - ensure instrument blank performed 2) <MRL but >MDL – J –detects (estimated)	All detections are greater than the MRL. Results <MRL and >IDL were qualified J.	X	Results <MRL and >IDL were qualified J.	
Lab Blanks (method blank or preparation blank)	1) Once per sample batch 2) Results > QL; sample results <5X ; sample result U (nd) 3) Sample results >5X blank level; no action	Preparation blanks were non-detect for all metals.	X	-	
LCS Recovery	1) once per sample batch 2) 80-120% ICP metals and Hg. 3) <LCL% Reject 4) >UCL% detects J	All LCS %R's were within MPC. Laboratory precision is acceptable.	X	-	-
LCS/LCSD RPD	1) RPD<20%	All 6010B/Hg-LCS/LCSD RPDs are within MPC.	X	-	
MS Recovery	1) 75-125% ICP metals and Hg if MS > 4X native levels) Qualification of MS sample: 2) <30% J detects, R NDs 3) 30%--74%, detects J, NDs UJ 4) >125% J detects	Field sample: M59294-1 MS/MSD %R<LCL for Al & Mn and %R>UCL for Ba & Fe. Field sample results were greater than 4X the MS level for Mn, Fe, & Al. No samples qualified. Ba detects were qualified J in samples 1-6.	X	Ba detects qualified J in samples 1-6.	
MS/MSD RPD	MS/MSD RPD<20%	N/A	X	-	
Laboratory Replicate RPD	RPD < 20% No QAPP criteria provided	Field sample: M59294-1 MS/MSD RPD outside MPC limits for Se and Ag. Laboratory precision is acceptable.	X	Results for Se and Ag were qualified J for detects and qualified UJ for non-detects in samples 1-6.	
Sensitivity*	1) MDL study – 7 replicates (40 CFR) 2) check and recalculate %RSDs and %R for three compounds (with 10% of lab)	No sample results required dilution.	X	-	
Equip Blank	< 5x contaminants for aq samples – for soil indicate EB (X rules don't apply)	Not collected/analyzed with this SDG	-	-	
Negative blanks	If negative values are reported for an analyte with absolute value >DL and sample value is <5X the absolute value of the blank or is nondetect Qualify detects as estimated (J) Nondetects as estimated (UJ)	No negative blank detections. No samples qualified.	X	-	
Initial Cal Multipoint	1) Blank and 3 standards covering range of instrument. 2) high standard verification +/- %5 3) Hg 5-point calibration COD>0.99	ICP-AES samples. All COD's > 0.99 in all initial calibration runs for all methods. No sample qualifications.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
		Hg ICaL within limits.			
Initial Calibration Blanks (ICB)	1) Ical blank after Ical 2) Results > QL; sample results <5X ; sample result U (nd) 3) Blank concentrations < project RLs 4) Sample results >5X blank level; no action 5) ABS >RL then J qualify data	No 6010B/Hg ICB detections – no samples qualified.	X	-	
Continuing Calibration Blanks (CCB)	1) CCB every 10 samples end of run 2) Blank concentrations < project RLs 3) Results > QL; sample results <5X ; sample result U 4) Sample results >5X blank level; no action ABS >RL then J qualify data.	No 6010B/Hg CCB detections – no samples qualified.	X	-	
Serial Dilution	1) once per digestion batch 2) Not required per QAPP- no criteria provided. 3) %D<10% 4) %D not evaluated if element results is <50X IDL 5) J detects, UJ non-detects.	Field sample: M59294-1 %D outside MPC limits for As, Be, Cr, Co, Cu, K, Ag, Na, & V. Native sample results for As, Be, Cr, Co, Cu, Ag, Na, & V were <50X IDL, no samples qualified. Results for K were qualified J in samples 1-6.	X	Results for K were qualified J in samples 1-6.	
Interelement checks ICS-A, ICS-AB Instrument performance check	1) start of sequence 2) 80-120% target analytes 3) >120% ; detects J (ICS-AB) 4) 50%-79% R ICS-AB; detects J, NDs – UJ 5) <50% R – reject data 6) ICS-A response > DL and samples have <5X ICS-A response: detects J (if DL is <10 ug/l use 2X DL). 7) Absolute value of negative ICS-A response>DL and sample detects <5X ICS-A response: detects J, NDs as UJ 8) If the ICS-A is within limits, the ICS-AB may not be analyzed (USACE Shell)	Both ICS-A and ICS-AB %R's within MPC limits for all runs.	X	-	
2nd Source ICV	1) following calibration 2) 90- 110% Recovery (6010/7000) 3) 75%-89% R – detects J, NDs – UJ 4) 111-125% R – detects J 5) outside 75-125% R – reject data (R) Hg 80-120%	6010B/Hg ICV %R's within MPC limits the initial calibration. No samples qualified.	X	-	
CCV	1) every 10 samples and end of run 2) 90- 110% Recovery (6010) Hg; 80-120% 3) 6010: 75%-89% R Hg, 65-79% R; – detects J, NDs – UJ. 4) 6010: 111-125%, Hg: 121-135% detects J 6010: outside 75-125%, Hg; outside 65-135%; R – reject data (R)	6010B/Hg CCV %R's within MPC limits. No samples qualified.	X	-	
Post Digestion Spike	1) Analyze if MS >MPC (QAPP) 2) 85- 115%R (QAPP Attachment A-1)	Field sample: 1 used for PDS. All %R within limits for Al, Ba, and Mn. No samples qualified.	X	-	

ECC Region I Data Review Worksheet (rv 3) **Metals 6010B/7471A**
Project: NAS Brunswick ECC Job No. 5700 **Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG**

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 3) * performed annually 4) *MDL is at least ½ of PQL *tgt and surrogate 80-120% R	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 3) *Matrix effects- MS/MSD, surrogated, PDS. 4) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
Tune Check	Within Method limits.	NA	-		
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Method 6010B; Sediments metals except for Hg. The LCS %R's and LCS/LCSD RPDs are within limits. The Matrix spikes were within limits except for Ba. Laboratory accuracy is acceptable for all metals, except for Se and Ag for the sediment matrix. PDS %R within MPC limits. Serial Dilution: %D outside MPC limits for K. Lab preparation blank; non-detect. IPC; in limits. ICAL: COD within limits. ICV: in limits CCV: in limits Sampling Error Evaluation: Field Sample Field Duplicate 1 2 FD Pair 1/2; Cr FD RPD>MPC & Se not detected in the field sample but had a low-level detect in the FD. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.	X	-	

*TIER III DATA VALIDATION ONLY Completeness Check: Inventory Check Sheet___X_Sample Quantitation Calculations (TIER III DATA VALIDATION ONLY):

ECC Region I Data Review Worksheet (rv 1) **TOC**
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 **Review Criteria: Method SOPs**

Data Validation Level	Matrix	Preservation	Temperature Sample Receipt	Laboratory	SDG Number
Tier II	**Solid**	**N/A**	**1 cooler – Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59294**

Field Identification of Samples Evaluated:

Field ID	Lab Sample Number
BN-1&3-29-SED19	M59294-1
BN-1&3-29-SED-XD1	M59294-2
BN-1&3-29-SED15	M59294-3
BN-1&3-29-SED16	M59294-4
BN-1&3-29-SED17	M59294-5
BN-1&3-29-SED18	M59294-6

Note: Samples are described below in the data worksheets by reference to the last two digits of the Lab Sample Number

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative (samples listed on attached sheets)	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (J detects, R/UJ-nondetects 3) preserved per method (amber bottles, temperature. J, UJ, or R (function of HT and compound)	Cooler temperatures <6 ^oC. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. Sample preservation within limits and/or method requirements. No samples qualified.	X	-	
Holding Time	1) TOC – 28 days. Per methods 2) J –detects, UJ or R –nondetects (function of time)	All samples analyzed within holding time. No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 30% water (no QAPP Criteria) for Results > X PQL (FD pair only) J-detects (both > X PQL) 2) If one >X PQL, other ND, J-detections, UJ non-detect	Field Sample 1 / Field Duplicate 2 FD Pair 1/2; TOC not detected in the FD, but had a low-level detect in the field sample. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.	-	TOC results in samples 1 and 2 were qualified J for detects and UJ for non-detects.	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	%solids >30%, no samples qualified.	X	-	
Results > Cal Range or <Cal Range	1) >Upper Cal Range J-detects - ensure instrument blank performed 2) <MRL but >MDL – J –detects (estimated)	All reported data is greater than the MRL. No samples qualified.	X	-	

ECC Region I Data Review Worksheet (rv 1) TOC
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Method SOPs

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative (samples listed on attached sheets)	Inven-tory	QUAL	BIAS
Lab Blanks (method blank or preparation blank)	1) Once per sample batch 2) Results > QL; sample results <5X; sample result U (nd) 3) Sample results >5X blank level; no action	Associated TOC method blank non-detect. No samples qualified.	X	-	
LCS Recovery	1) once per sample batch 2) 80-120% ICP metals and Hg. 3) <LCL% Reject 4) >UCL% detects J	Associated LCS %R's within MPC. No samples qualified.	X	-	
MS Recovery	1) 75-125% ICP metals and Hg if MS > 4X native levels) Qualification of MS sample: 2) <30% J detects, R NDs 3) 30%--74%, detects J, NDs UJ 4) >125% J detects	MS/MSD %R within MPC. No sample qualifications.	X	-	
Laboratory Replicate RPD	RPD < 20% No QAPP criteria provided	Laboratory replicate RPDs are within MPC. Lab precision is acceptable.	X	-	
Sensitivity*	1) MDL study – 7 replicates (40 CFR) 2) check and recalculate %RSDs and %R fir three compounds (with 10% of lab)	Acceptable sensitivity.	X	-	
Equip Blank	< 5x contaminants for aq samples – for soil indicate EB (X rules don't apply)	Not Collected/analyzed with this SDG	-	-	
Initial Cal Multipoint	1) Within laboratory MPC.	Calibrations were within linearity requirements. No samples qualified.	X	-	
Continuing Calibration Blanks (CCB)	2) Within laboratory MPC.	TOC: periodic method blanks non-detect, no samples qualified.	X	-	
2nd Source ICV	3) Within laboratory MPC.	Applicable ICV's were within limits. No samples qualified.	X	-	
CCV	4) Within laboratory MPC.	Applicable CCV's were within limits. No samples qualified.	X	-	
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Laboratory accuracy is acceptable. Accuracy is shown by the LCS being within limits. Laboratory precision is acceptable. No apparent matrix bias. ICAL: in limits. ICV: in limits CCV: in limits Sampling Error Evaluation: Sampling Error was not evaluated since no FD was collect. Overall precision is acceptable.	X	-	.

*TIER III DATA VALIDATION ONLY Completeness Check: Inventory Check Sheet___X_Sample Quantitation Calculations (TIER III DATA VALIDATION ONLY):

FIELD DUPLICATE WORKSHEET

SDG: M59294

Field Sample Id	Analyte	Analytical Method	Result	Units	Qualifier	Field Duplicate Id	Result	Units	Qaulifier	FD RPD (%)
BN-1&3-29-SED19	Total Organic Carbon	CORPENG81M	1510	mg/kg	J	BN-1&3-29-SED-XD1	1300	mg/kg	UJ	**NC**
BN-1&3-29-SED19	Endosulfan-I	SW8468081	2.0	ug/kg		BN-1&3-29-SED-XD1	3.1	ug/kg		43.1
BN-1&3-29-SED19	Aluminum	SW8466010B	1700	mg/kg		BN-1&3-29-SED-XD1	2170	mg/kg		24.3
BN-1&3-29-SED19	Iron	SW8466010B	5790	mg/kg		BN-1&3-29-SED-XD1	7450	mg/kg		25.1
BN-1&3-29-SED19	Lead	SW8466010B	2.9	mg/kg		BN-1&3-29-SED-XD1	3.8	mg/kg		26.9
BN-1&3-29-SED19	Magnesium	SW8466010B	582	mg/kg		BN-1&3-29-SED-XD1	821	mg/kg		34.1
BN-1&3-29-SED19	Manganese	SW8466010B	506	mg/kg		BN-1&3-29-SED-XD1	720	mg/kg		34.9
BN-1&3-29-SED19	Nickel	SW8466010B	4.1	mg/kg		BN-1&3-29-SED-XD1	5.5	mg/kg		29.2
BN-1&3-29-SED19	Potassium	SW8466010B	220	mg/kg		BN-1&3-29-SED-XD1	251	mg/kg		13.2
BN-1&3-29-SED19	Silver	SW8466010B	0.096	mg/kg		BN-1&3-29-SED-XD1	0.076	mg/kg		23.3
BN-1&3-29-SED19	Sodium	SW8466010B	69.7	mg/kg		BN-1&3-29-SED-XD1	59.5	mg/kg		15.8
BN-1&3-29-SED19	Arsenic	SW8466010B	3.1	mg/kg		BN-1&3-29-SED-XD1	4.1	mg/kg		27.8
BN-1&3-29-SED19	Barium	SW8466010B	19.1	mg/kg		BN-1&3-29-SED-XD1	26.1	mg/kg		31
BN-1&3-29-SED19	Beryllium	SW8466010B	0.19	mg/kg		BN-1&3-29-SED-XD1	0.26	mg/kg		31.1
BN-1&3-29-SED19	Chromium	SW8466010B	2.5	mg/kg	J	BN-1&3-29-SED-XD1	4.5	mg/kg	J	**57.1**
BN-1&3-29-SED19	Cobalt	SW8466010B	2.8	mg/kg		BN-1&3-29-SED-XD1	3.8	mg/kg		30.3
BN-1&3-29-SED19	Copper	SW8466010B	1.6	mg/kg		BN-1&3-29-SED-XD1	2.0	mg/kg		22.2
BN-1&3-29-SED19	Vanadium	SW8466010B	4.4	mg/kg		BN-1&3-29-SED-XD1	5.7	mg/kg		25.7
BN-1&3-29-SED19	Zinc	SW8466010B	17.6	mg/kg		BN-1&3-29-SED-XD1	22.0	mg/kg		22.2
BN-1&3-29-SED19	Calcium	SW8466010B	287	mg/kg		BN-1&3-29-SED-XD1	463	mg/kg		46.9
BN-1&3-29-SED19	Selenium	SW8466010B	0.68	mg/kg	UJ	BN-1&3-29-SED-XD1	0.46	mg/kg	J	**NC**
BN-1&3-29-SED19	Mercury	SW8467471A	0.014	mg/kg		BN-1&3-29-SED-XD1	0.0085	mg/kg		48.9

NAS BRUNSWICK- SITES 1 & 3 – SEPTEMBER 2006
DATA SUMMARY TABLE – SEDIMENT & AQUEOUS SDG M59294

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-SED19	M59294-1	CORPENG81M	09/14/06	1	Total Organic Carbon	1510	mg/kg		1400	1400
BN-1&3-29-SED19	M59294-1	EPA1603M	09/14/06	1	Solids, Percent	70.6	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	% Gravel	0.0	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	% Sand	98.5	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	% Silt, Clay, Colloids	1.5	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	0.0015 mm (Hydrometer)	1.5	%	U	1.5	1.5
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	0.005 mm (Hydrometer)	1.5	%	U	1.5	1.5
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	0.030 mm (Hydrometer)	1.5	%	U	1.5	1.5
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	0.375 Inch Sieve	100	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	0.75 Inch Sieve	100	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	1.5 Inch Sieve	100	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	3 Inch Sieve	100	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	No.10 Sieve (2.00 mm)	99.9	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	No.100 Sieve (0.15 mm)	1.7	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	No.16 Sieve (1.18 mm)	99.3	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	No.200 Sieve (0.075 mm)	1.5	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	No.30 Sieve (0.60 mm)	83.2	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	No.4 Sieve (4.75 mm)	100	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	No.50 Sieve (0.30 mm)	16.0	%			
BN-1&3-29-SED19	M59294-1	ASTMD42263	09/14/06	1	No.8 Sieve (2.36 mm)	99.9	%			
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	Heptachlor epoxide	1.9	ug/kg	U	0.38	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	Endosulfan sulfate	1.9	ug/kg	U	0.33	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	Chlordane	19	ug/kg	U	1.1	19
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	Aldrin	1.9	ug/kg	U	0.25	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	alpha-BHC	1.9	ug/kg	U	0.20	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	beta-BHC	1.9	ug/kg	U	0.34	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	delta-BHC	1.9	ug/kg	U	0.42	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	Endosulfan-II	1.9	ug/kg	U	0.24	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	4,4'-DDT	1.9	ug/kg	UJ	0.22	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	gamma-BHC (Lindane)	1.9	ug/kg	U	0.21	1.9

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	Dieldrin	1.9	ug/kg	U	0.32	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	Endrin	1.9	ug/kg	U	0.28	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	Methoxychlor	1.9	ug/kg	UJ	0.22	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	4,4'-DDD	1.9	ug/kg	U	0.27	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	4,4'-DDE	1.9	ug/kg	U	0.26	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	Endrin aldehyde	1.9	ug/kg	U	0.43	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	Heptachlor	1.9	ug/kg	U	0.29	1.9
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	Toxaphene	93	ug/kg	U	2.3	93
BN-1&3-29-SED19	M59294-1	SW8468081	09/14/06	1	Endosulfan-I	2.0	ug/kg		0.23	1.9
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Aluminum	1700	mg/kg		3.1	27
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Iron	5790	mg/kg		4.1	14
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Lead	2.9	mg/kg		0.21	0.68
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Magnesium	582	mg/kg	J	0.93	680
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Manganese	506	mg/kg		0.051	2.0
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Nickel	4.1	mg/kg	J	0.17	5.4
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Potassium	220	mg/kg	J	2.6	680
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Silver	0.096	mg/kg	J	0.080	0.68
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Sodium	69.7	mg/kg	J	20.0	680
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Thallium	2.7	mg/kg	U	0.65	2.7
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Antimony	2.7	mg/kg	U	0.39	2.7
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Arsenic	3.1	mg/kg		0.42	2.7
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Barium	19.1	mg/kg	J	0.19	27
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Beryllium	0.19	mg/kg	J	0.17	0.54
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Cadmium	0.54	mg/kg	U	0.042	0.54
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Chromium	2.5	mg/kg	J	0.18	1.4
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Cobalt	2.8	mg/kg	J	0.30	6.8
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Copper	1.6	mg/kg	J	0.11	3.4
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Vanadium	4.4	mg/kg	J	0.14	6.8
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Zinc	17.6	mg/kg		0.15	2.7
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Calcium	287	mg/kg	J	1.3	680
BN-1&3-29-SED19	M59294-1	SW8466010B	09/14/06	1	Selenium	0.68	mg/kg	UJ	0.46	0.68
BN-1&3-29-SED19	M59294-1	SW8467471A	09/14/06	1	Mercury	0.014	mg/kg	J	0.0074	0.033
BN-1&3-29-SED-XD1	M59294-2	CORPENG81M	09/14/06	1	Total Organic Carbon	1300	mg/kg	U	1300	1300

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-SED-XD1	M59294-2	EPA1603M	09/14/06	1	Solids, Percent	69.8	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	% Gravel	0.0	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	% Sand	97.1	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	% Silt, Clay, Colloids	2.9	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	0.0015 mm (Hydrometer)	2.1	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	0.005 mm (Hydrometer)	2.1	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	0.030 mm (Hydrometer)	2.5	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	0.375 Inch Sieve	100	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	0.75 Inch Sieve	100	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	1.5 Inch Sieve	100	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	3 Inch Sieve	100	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	No.10 Sieve (2.00 mm)	100	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	No.100 Sieve (0.15 mm)	3.1	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	No.16 Sieve (1.18 mm)	99.8	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	No.200 Sieve (0.075 mm)	2.9	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	No.30 Sieve (0.60 mm)	88.8	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	No.4 Sieve (4.75 mm)	100	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	No.50 Sieve (0.30 mm)	15.5	%			
BN-1&3-29-SED-XD1	M59294-2	ASTMD42263	09/14/06	1	No.8 Sieve (2.36 mm)	100	%			
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	Heptachlor epoxide	1.8	ug/kg	U	0.37	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	Endosulfan sulfate	1.8	ug/kg	U	0.32	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	Chlordane	18	ug/kg	U	1.1	18
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	Aldrin	1.8	ug/kg	U	0.25	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	alpha-BHC	1.8	ug/kg	U	0.19	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	beta-BHC	1.8	ug/kg	U	0.33	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	delta-BHC	1.8	ug/kg	U	0.41	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	Endosulfan-II	1.8	ug/kg	U	0.23	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	4,4'-DDT	1.8	ug/kg	UJ	0.22	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	gamma-BHC (Lindane)	1.8	ug/kg	U	0.21	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	Dieldrin	1.8	ug/kg	U	0.31	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	Endrin	1.8	ug/kg	U	0.27	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	Methoxychlor	1.8	ug/kg	UJ	0.22	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	4,4'-DDD	1.8	ug/kg	U	0.26	1.8

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	4,4'-DDE	1.8	ug/kg	U	0.26	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	Endrin aldehyde	1.8	ug/kg	U	0.42	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	Heptachlor	1.8	ug/kg	U	0.28	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	Toxaphene	91	ug/kg	U	2.3	91
BN-1&3-29-SED-XD1	M59294-2	SW8468081	09/14/06	1	Endosulfan-I	3.1	ug/kg		0.23	1.8
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Aluminum	2170	mg/kg		2.8	25
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Iron	7450	mg/kg		3.8	13
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Lead	3.8	mg/kg		0.20	0.63
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Magnesium	821	mg/kg		0.86	630
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Manganese	720	mg/kg		0.048	1.9
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Nickel	5.5	mg/kg		0.16	5.0
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Potassium	251	mg/kg	J	2.4	630
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Silver	0.076	mg/kg	J	0.074	0.63
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Sodium	59.5	mg/kg	J	19.0	630
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Thallium	2.5	mg/kg	U	0.60	2.5
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Antimony	2.5	mg/kg	U	0.36	2.5
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Arsenic	4.1	mg/kg		0.39	2.5
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Barium	26.1	mg/kg	J	0.18	25
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Beryllium	0.26	mg/kg	J	0.16	0.50
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Cadmium	0.50	mg/kg	U	0.039	0.50
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Chromium	4.5	mg/kg	J	0.17	1.3
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Cobalt	3.8	mg/kg	J	0.28	6.3
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Copper	2.0	mg/kg	J	0.10	3.1
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Vanadium	5.7	mg/kg	J	0.13	6.3
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Zinc	22.0	mg/kg		0.14	2.5
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Calcium	463	mg/kg	J	1.2	630
BN-1&3-29-SED-XD1	M59294-2	SW8466010B	09/14/06	1	Selenium	0.46	mg/kg	J	0.43	0.63
BN-1&3-29-SED-XD1	M59294-2	SW8467471A	09/14/06	1	Mercury	0.0085	mg/kg	J	0.0068	0.030
BN-1&3-29-SED15	M59294-3	CORPENG81M	09/14/06	1	Total Organic Carbon	1400	mg/kg	U	1400	1400
BN-1&3-29-SED15	M59294-3	EPA1603M	09/14/06	1	Solids, Percent	70.7	%			
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	% Gravel	0.0	%			
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	% Sand	98.2	%			
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	% Silt, Clay, Colloids	1.8	%			

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	0.0015 mm (Hydrometer)	1.8	%	U	1.8	1.8
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	0.005 mm (Hydrometer)	1.8	%	U	1.8	1.8
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	0.030 mm (Hydrometer)	1.8	%	U	1.8	1.8
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	0.375 Inch Sieve	100	%			
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	0.75 Inch Sieve	100	%			
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	1.5 Inch Sieve	100	%			
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	3 Inch Sieve	100	%			
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	No.10 Sieve (2.00 mm)	99.9	%			
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	No.100 Sieve (0.15 mm)	2.7	%			
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	No.16 Sieve (1.18 mm)	98.0	%			
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	No.200 Sieve (0.075 mm)	1.8	%			
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	No.30 Sieve (0.60 mm)	88.2	%			
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	No.4 Sieve (4.75 mm)	100	%			
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	No.50 Sieve (0.30 mm)	43.0	%			
BN-1&3-29-SED15	M59294-3	ASTMD42263	09/14/06	1	No.8 Sieve (2.36 mm)	99.9	%			
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	Heptachlor epoxide	1.9	ug/kg	U	0.38	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	Endosulfan sulfate	1.9	ug/kg	U	0.34	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	Chlordane	19	ug/kg	U	1.1	19
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	Aldrin	1.9	ug/kg	U	0.26	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	alpha-BHC	1.9	ug/kg	U	0.20	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	beta-BHC	1.9	ug/kg	U	0.34	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	delta-BHC	1.9	ug/kg	U	0.43	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	Endosulfan-II	1.9	ug/kg	U	0.24	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	4,4'-DDT	1.9	ug/kg	UJ	0.23	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	gamma-BHC (Lindane)	1.9	ug/kg	U	0.21	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	Dieldrin	1.9	ug/kg	U	0.32	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	Endrin	1.9	ug/kg	U	0.28	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	Methoxychlor	1.9	ug/kg	UJ	0.23	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	4,4'-DDD	1.9	ug/kg	U	0.27	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	4,4'-DDE	1.9	ug/kg	U	0.27	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	Endrin aldehyde	1.9	ug/kg	U	0.43	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	Heptachlor	1.9	ug/kg	U	0.29	1.9
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	Toxaphene	94	ug/kg	U	2.4	94

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-SED15	M59294-3	SW8468081	09/14/06	1	Endosulfan-I	1.9	ug/kg	U	0.23	1.9
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Aluminum	2620	mg/kg		3.1	27
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Iron	5330	mg/kg		4.1	14
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Lead	2.7	mg/kg		0.21	0.68
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Magnesium	874	mg/kg		0.93	680
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Manganese	416	mg/kg		0.052	2.0
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Nickel	5.7	mg/kg		0.17	5.4
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Potassium	365	mg/kg	J	2.6	680
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Silver	0.10	mg/kg	J	0.080	0.68
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Sodium	75.2	mg/kg	J	20.0	680
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Thallium	2.7	mg/kg	U	0.65	2.7
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Antimony	2.7	mg/kg	U	0.39	2.7
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Arsenic	2.0	mg/kg	J	0.42	2.7
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Barium	16.5	mg/kg	J	0.19	27
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Beryllium	0.23	mg/kg	J	0.18	0.54
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Cadmium	0.54	mg/kg	U	0.042	0.54
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Chromium	3.9	mg/kg		0.18	1.4
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Cobalt	3.2	mg/kg	J	0.30	6.8
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Copper	3.1	mg/kg	J	0.11	3.4
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Vanadium	6.2	mg/kg	J	0.14	6.8
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Zinc	14.8	mg/kg		0.15	2.7
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Calcium	416	mg/kg	J	1.3	680
BN-1&3-29-SED15	M59294-3	SW8466010B	09/14/06	1	Selenium	0.68	mg/kg	UJ	0.46	0.68
BN-1&3-29-SED15	M59294-3	SW8467471A	09/14/06	1	Mercury	0.012	mg/kg	J	0.0080	0.036
BN-1&3-29-SED16	M59294-4	CORPENG81M	09/14/06	1	Total Organic Carbon	2450	mg/kg		1300	1300
BN-1&3-29-SED16	M59294-4	EPA1603M	09/14/06	1	Solids, Percent	70.0	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	% Gravel	0.060	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	% Sand	94.6	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	% Silt, Clay, Colloids	5.3	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	0.0015 mm (Hydrometer)	4.2	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	0.005 mm (Hydrometer)	4.2	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	0.030 mm (Hydrometer)	4.8	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	0.375 Inch Sieve	99.9	%			

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	0.75 Inch Sieve	100	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	1.5 Inch Sieve	100	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	3 Inch Sieve	100	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	No.10 Sieve (2.00 mm)	99.9	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	No.100 Sieve (0.15 mm)	20.9	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	No.16 Sieve (1.18 mm)	99.9	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	No.200 Sieve (0.075 mm)	5.3	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	No.30 Sieve (0.60 mm)	98.7	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	No.4 Sieve (4.75 mm)	99.9	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	No.50 Sieve (0.30 mm)	82.4	%			
BN-1&3-29-SED16	M59294-4	ASTMD42263	09/14/06	1	No.8 Sieve (2.36 mm)	99.9	%			
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	Heptachlor epoxide	1.8	ug/kg	U	0.37	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	Endosulfan sulfate	1.8	ug/kg	U	0.33	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	Chlordane	18	ug/kg	U	1.1	18
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	Aldrin	1.8	ug/kg	U	0.25	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	alpha-BHC	1.8	ug/kg	U	0.19	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	beta-BHC	1.8	ug/kg	U	0.33	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	delta-BHC	1.8	ug/kg	U	0.42	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	Endosulfan-II	1.8	ug/kg	U	0.24	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	4,4'-DDT	1.8	ug/kg	UJ	0.22	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	gamma-BHC (Lindane)	1.8	ug/kg	U	0.21	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	Dieldrin	1.8	ug/kg	U	0.32	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	Endrin	1.8	ug/kg	U	0.27	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	Methoxychlor	1.8	ug/kg	UJ	0.22	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	4,4'-DDD	1.8	ug/kg	U	0.26	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	4,4'-DDE	1.8	ug/kg	U	0.26	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	Endrin aldehyde	1.8	ug/kg	U	0.42	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	Heptachlor	1.8	ug/kg	U	0.28	1.8
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	Toxaphene	92	ug/kg	U	2.3	92
BN-1&3-29-SED16	M59294-4	SW8468081	09/14/06	1	Endosulfan-I	4.2	ug/kg		0.23	1.8
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Aluminum	3070	mg/kg		3.1	27
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Iron	7040	mg/kg		4.1	14
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Lead	3.4	mg/kg		0.21	0.68

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Magnesium	1070	mg/kg		0.93	680
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Manganese	186	mg/kg		0.052	2.0
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Nickel	6.0	mg/kg		0.17	5.4
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Potassium	458	mg/kg	J	2.7	680
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Silver	0.68	mg/kg	UJ	0.080	0.68
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Sodium	77.2	mg/kg	J	20.0	680
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Thallium	2.7	mg/kg	U	0.65	2.7
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Antimony	2.7	mg/kg	U	0.39	2.7
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Arsenic	2.2	mg/kg	J	0.43	2.7
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Barium	20.5	mg/kg	J	0.19	27
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Beryllium	0.24	mg/kg	J	0.18	0.54
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Cadmium	0.54	mg/kg	U	0.042	0.54
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Chromium	4.9	mg/kg		0.18	1.4
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Cobalt	4.0	mg/kg	J	0.30	6.8
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Copper	3.3	mg/kg	J	0.11	3.4
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Vanadium	7.4	mg/kg		0.14	6.8
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Zinc	20.2	mg/kg		0.15	2.7
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Calcium	513	mg/kg	J	1.3	680
BN-1&3-29-SED16	M59294-4	SW8466010B	09/14/06	1	Selenium	0.68	mg/kg	UJ	0.46	0.68
BN-1&3-29-SED16	M59294-4	SW8467471A	09/14/06	1	Mercury	0.015	mg/kg	J	0.0077	0.034
BN-1&3-29-SED17	M59294-5	CORPENG81M	09/14/06	1	Total Organic Carbon	1810	mg/kg		1400	1400
BN-1&3-29-SED17	M59294-5	EPA1603M	09/14/06	1	Solids, Percent	72.3	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	% Gravel	0.0	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	% Sand	94.6	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	% Silt, Clay, Colloids	5.5	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	0.0015 mm (Hydrometer)	2.2	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	0.005 mm (Hydrometer)	4.0	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	0.030 mm (Hydrometer)	4.0	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	0.375 Inch Sieve	100	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	0.75 Inch Sieve	100	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	1.5 Inch Sieve	100	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	3 Inch Sieve	100	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	No.10 Sieve (2.00 mm)	99.8	%			

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	No.100 Sieve (0.15 mm)	9.5	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	No.16 Sieve (1.18 mm)	97.5	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	No.200 Sieve (0.075 mm)	5.5	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	No.30 Sieve (0.60 mm)	77.1	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	No.4 Sieve (4.75 mm)	100	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	No.50 Sieve (0.30 mm)	33.0	%			
BN-1&3-29-SED17	M59294-5	ASTMD42263	09/14/06	1	No.8 Sieve (2.36 mm)	99.9	%			
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	Heptachlor epoxide	1.8	ug/kg	U	0.36	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	Endosulfan sulfate	1.8	ug/kg	U	0.32	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	Chlordane	18	ug/kg	U	1.0	18
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	Aldrin	1.8	ug/kg	U	0.24	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	alpha-BHC	1.8	ug/kg	U	0.19	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	beta-BHC	1.8	ug/kg	U	0.32	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	delta-BHC	1.8	ug/kg	U	0.40	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	Endosulfan-II	1.8	ug/kg	U	0.23	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	4,4'-DDT	1.8	ug/kg	UJ	0.21	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	gamma-BHC (Lindane)	1.8	ug/kg	U	0.20	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	Dieldrin	1.8	ug/kg	U	0.31	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	Endrin	1.8	ug/kg	U	0.26	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	Methoxychlor	1.8	ug/kg	UJ	0.21	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	4,4'-DDD	1.8	ug/kg	U	0.26	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	4,4'-DDE	1.8	ug/kg	U	0.25	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	Endrin aldehyde	1.8	ug/kg	U	0.41	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	Heptachlor	1.8	ug/kg	U	0.27	1.8
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	Toxaphene	89	ug/kg	U	2.2	89
BN-1&3-29-SED17	M59294-5	SW8468081	09/14/06	1	Endosulfan-I	2.1	ug/kg		0.22	1.8
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Aluminum	2640	mg/kg		3.0	26
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Iron	6600	mg/kg		4.0	13
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Lead	3.8	mg/kg		0.21	0.65
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Magnesium	923	mg/kg		0.90	650
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Manganese	756	mg/kg		0.050	2.0
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Nickel	6.2	mg/kg		0.17	5.2
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Potassium	363	mg/kg	J	2.5	650

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Silver	0.65	mg/kg	UJ	0.077	0.65
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Sodium	58.6	mg/kg	J	20.0	650
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Thallium	2.6	mg/kg	U	0.63	2.6
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Antimony	2.6	mg/kg	U	0.38	2.6
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Arsenic	2.6	mg/kg		0.41	2.6
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Barium	21.8	mg/kg	J	0.19	26
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Beryllium	0.23	mg/kg	J	0.17	0.52
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Cadmium	0.52	mg/kg	U	0.041	0.52
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Chromium	4.5	mg/kg		0.18	1.3
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Cobalt	3.8	mg/kg	J	0.29	6.5
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Copper	2.9	mg/kg	J	0.11	3.3
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Vanadium	6.7	mg/kg		0.13	6.5
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Zinc	17.9	mg/kg		0.14	2.6
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Calcium	387	mg/kg	J	1.3	650
BN-1&3-29-SED17	M59294-5	SW8466010B	09/14/06	1	Selenium	0.65	mg/kg	UJ	0.44	0.65
BN-1&3-29-SED17	M59294-5	SW8467471A	09/14/06	1	Mercury	0.0087	mg/kg	J	0.0073	0.032
BN-1&3-29-SED18	M59294-6	CORPENG81M	09/14/06	1	Total Organic Carbon	4310	mg/kg		1300	1300
BN-1&3-29-SED18	M59294-6	EPA1603M	09/14/06	1	Solids, Percent	70.2	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	% Gravel	1.8	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	% Sand	89.2	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	% Silt, Clay, Colloids	9.0	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	0.0015 mm (Hydrometer)	2.3	%	U	2.3	2.3
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	0.005 mm (Hydrometer)	4.6	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	0.030 mm (Hydrometer)	6.8	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	0.375 Inch Sieve	99.3	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	0.75 Inch Sieve	100	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	1.5 Inch Sieve	100	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	3 Inch Sieve	100	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	No.10 Sieve (2.00 mm)	98.0	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	No.100 Sieve (0.15 mm)	37.4	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	No.16 Sieve (1.18 mm)	97.6	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	No.200 Sieve (0.075 mm)	9.0	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	No.30 Sieve (0.60 mm)	96.2	%			

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	No.4 Sieve (4.75 mm)	98.2	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	No.50 Sieve (0.30 mm)	83.0	%			
BN-1&3-29-SED18	M59294-6	ASTMD42263	09/14/06	1	No.8 Sieve (2.36 mm)	98.0	%			
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	Heptachlor epoxide	1.8	ug/kg	U	0.37	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	Endosulfan sulfate	1.8	ug/kg	U	0.32	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	Chlordane	18	ug/kg	U	1.1	18
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	Aldrin	1.8	ug/kg	U	0.25	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	alpha-BHC	1.8	ug/kg	U	0.19	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	beta-BHC	1.8	ug/kg	U	0.33	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	delta-BHC	1.8	ug/kg	U	0.41	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	Endosulfan-II	1.8	ug/kg	U	0.23	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	4,4'-DDT	1.8	ug/kg	UJ	0.22	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	gamma-BHC (Lindane)	1.8	ug/kg	U	0.21	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	Dieldrin	1.8	ug/kg	U	0.31	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	Endrin	1.8	ug/kg	U	0.27	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	Methoxychlor	1.8	ug/kg	UJ	0.22	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	4,4'-DDD	1.8	ug/kg	U	0.26	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	4,4'-DDE	1.8	ug/kg	U	0.26	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	Endrin aldehyde	1.8	ug/kg	U	0.42	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	Heptachlor	1.8	ug/kg	U	0.28	1.8
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	Toxaphene	91	ug/kg	U	2.3	91
BN-1&3-29-SED18	M59294-6	SW8468081	09/14/06	1	Endosulfan-I	1.8	ug/kg	U	0.23	1.8
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Aluminum	3470	mg/kg		2.7	24
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Iron	7200	mg/kg		3.7	12
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Lead	4.9	mg/kg		0.19	0.60
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Magnesium	1380	mg/kg		0.83	600
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Manganese	112	mg/kg		0.046	1.8
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Nickel	6.2	mg/kg		0.15	4.8
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Potassium	660	mg/kg	J	2.3	600
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Silver	0.60	mg/kg	UJ	0.071	0.60
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Sodium	70.2	mg/kg	J	18.0	600
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Thallium	2.4	mg/kg	U	0.58	2.4
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Antimony	2.4	mg/kg	U	0.35	2.4

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Arsenic	2.2	mg/kg	J	0.38	2.4
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Barium	16.5	mg/kg	J	0.17	24
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Beryllium	0.28	mg/kg	J	0.16	0.48
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Cadmium	0.48	mg/kg	U	0.037	0.48
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Chromium	6.2	mg/kg		0.16	1.2
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Cobalt	3.1	mg/kg	J	0.27	6.0
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Copper	4.0	mg/kg		0.10	3.0
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Vanadium	8.6	mg/kg		0.12	6.0
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Zinc	25.7	mg/kg		0.13	2.4
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Calcium	951	mg/kg		1.2	600
BN-1&3-29-SED18	M59294-6	SW8466010B	09/14/06	1	Selenium	0.60	mg/kg	UJ	0.41	0.60
BN-1&3-29-SED18	M59294-6	SW8467471A	09/14/06	1	Mercury	0.010	mg/kg	J	0.0081	0.036
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Ethylbenzene	100	ug/kg	U	13	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Styrene	250	ug/kg	U	14	250
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	cis-1,3-Dichloropropene	100	ug/kg	U	17	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	trans-1,3-Dichloropropene	100	ug/kg	U	17	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	1,4-Dichlorobenzene	100	ug/kg	U	19	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	1,2-Dichloroethane	100	ug/kg	U	11	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	4-Methyl-2-pentanone (MIBK)	250	ug/kg	U	16	250
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Toluene	250	ug/kg	U	37	250
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Chlorobenzene	100	ug/kg	U	21	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Dibromochloromethane	100	ug/kg	U	27	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Tetrachloroethene	100	ug/kg	U	45	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Xylene (total)	100	ug/kg	U	13	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	1,2-Dichloroethene (total)	100	ug/kg	U	31	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	1,3-Dichlorobenzene	100	ug/kg	U	20	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Carbon tetrachloride	100	ug/kg	U	18	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	2-Hexanone	250	ug/kg	U	21	250
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Acetone	250	ug/kg	U	16	250
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Chloroform	100	ug/kg	U	15	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Benzene	25	ug/kg	U	20	25
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	1,1,1-Trichloroethane	100	ug/kg	U	17	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Bromomethane	100	ug/kg	U	47	100

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Chloromethane	250	ug/kg	U	39	250
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Chloroethane	250	ug/kg	U	25	250
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Vinyl chloride	100	ug/kg	U	44	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Methylene chloride	100	ug/kg	U	23	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Carbon disulfide	250	ug/kg	U	42	250
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Bromoform	100	ug/kg	U	15	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Bromodichloromethane	100	ug/kg	U	13	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	1,1-Dichloroethane	100	ug/kg	U	18	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	1,1-Dichloroethene	100	ug/kg	U	21	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	1,2-Dichloropropane	100	ug/kg	U	43	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	2-Butanone (MEK)	250	ug/kg	U	58	250
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	1,1,2-Trichloroethane	100	ug/kg	U	38	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	Trichloroethene	100	ug/kg	U	19	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	1,1,2,2-Tetrachloroethane	100	ug/kg	U	26	100
BN-1&3-29-QT1	M59294-7	SW8260	09/18/06	1	1,2-Dichlorobenzene	100	ug/kg	U	21	100
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Ethylbenzene	2.0	ug/kg	U	0.26	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Styrene	5.0	ug/kg	U	0.27	5.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	cis-1,3-Dichloropropene	2.0	ug/kg	U	0.34	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	trans-1,3-Dichloropropene	2.0	ug/kg	UJ	0.33	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	1,4-Dichlorobenzene	2.0	ug/kg	U	0.38	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	1,2-Dichloroethane	2.0	ug/kg	U	0.22	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/kg	U	0.31	5.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Toluene	5.0	ug/kg	U	0.74	5.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Chlorobenzene	2.0	ug/kg	U	0.42	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Dibromochloromethane	2.0	ug/kg	U	0.53	2.0
BN-1&3-29-QT1	M59294-	SW8260	09/18/06	1	Tetrachloroethene	2.0	ug/kg	U	0.90	2.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
	7A									
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Xylene (total)	2.0	ug/kg	U	0.26	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	1,2-Dichloroethene (total)	2.0	ug/kg	U	0.63	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	1,3-Dichlorobenzene	2.0	ug/kg	U	0.40	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Carbon tetrachloride	2.0	ug/kg	UJ	0.35	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	2-Hexanone	5.0	ug/kg	U	0.43	5.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Acetone	12.9	ug/kg	J	0.32	5.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Chloroform	2.0	ug/kg	U	0.30	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Benzene	0.50	ug/kg	U	0.40	0.50
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	1,1,1-Trichloroethane	2.0	ug/kg	U	0.33	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Bromomethane	2.0	ug/kg	U	0.95	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Chloromethane	5.0	ug/kg	UJ	0.78	5.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Chloroethane	5.0	ug/kg	U	0.49	5.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Vinyl chloride	2.0	ug/kg	U	0.87	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Methylene chloride	8.3	ug/kg	UJ	0.46	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Carbon disulfide	5.0	ug/kg	U	0.85	5.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Bromoform	2.0	ug/kg	U	0.30	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Bromodichloromethane	2.0	ug/kg	U	0.27	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	1,1-Dichloroethane	2.0	ug/kg	U	0.35	2.0
BN-1&3-29-QT1	M59294-	SW8260	09/18/06	1	1,1-Dichloroethene	2.0	ug/kg	U	0.42	2.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
	7A									
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	1,2-Dichloropropane	2.0	ug/kg	U	0.86	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	2-Butanone (MEK)	5.0	ug/kg	U	1.2	5.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	1,1,2-Trichloroethane	2.0	ug/kg	U	0.76	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	Trichloroethene	2.0	ug/kg	U	0.38	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	1,1,2,2-Tetrachloroethane	2.0	ug/kg	U	0.53	2.0
BN-1&3-29-QT1	M59294-7A	SW8260	09/18/06	1	1,2-Dichlorobenzene	2.0	ug/kg	UJ	0.43	2.0

DATA VALIDATION MEMORANDUM
NAS BRUNSWICK SITES 1 & 3
SEPTEMBER 2006 SAMPLING ROUND 29 (SDG M59298)

TO: ENGINEERING FACILITY COMMAND NORTHEAST

FROM: JACKSON KIKER, ECC SENIOR CHEMIST, MARLBOROUGH, MA

SUBJECT: NAS BRUNSWICK SITES 1 & 3 MONITORING EVENT 29

DATE: 11/11/2006

Project data were validated using the following Validation Functional Guidelines, as modified for non-CLP methods and project-specific QAPP measurement performance criteria (MPC):

1. Region I, EPA-NE Data Validation Functional Guidelines for Evaluation of Environmental Analyses (Dec, 1996),

2. National Functional Guidelines for Evaluation Inorganic Analysis (1988), and

3. National Functional Guidelines for Evaluation Organic Analysis (October 1999).

The data were assessed against the MPC listed in the approved Site 1& 3 and Eastern Plume LTMP QAPP (May 2000). The QAPP MPC and validation guideline exceedences are assessed and documented on the method/QAPP specific data validation worksheets. On these data validation worksheets the data quality acceptance criteria are presented, analytes requiring qualification based on MPC and/or validation guidance criteria exceedences are listed, assigned qualifiers, qualifying rationale is documented, and any potential bias noted. The overall evaluation of the data generated by a method is presented in the data validation worksheet.

Standard EPA Region I data qualifiers are used to denote the assessment of data quality. The final and ranking assigned data qualifier for an analyte is presented in the data summary table. Ancillary qualifiers are noted on the data validation worksheets.

The USEPA Region I Organic Regional Data Assessment (ORDA) sheet displays the summarized results of the data validation assessment for all analytical methods reported in the SDG.

ACRONYMS AND ABBREVIATIONS

Following is a list of acronyms and abbreviations that may be used in the data validation reports.

Acronym or Abbreviation	Definition
%D	Percent difference
%R	Percent recovery
%M	Percent moisture
%S	Percent solids
Ug/L	Microgram per liter
BD	Breakdown
BEHP	2-bis(ethylhexyl)phthalate
BFB	Bromofluorobenzene
CCB	Continuing calibration Blank
CCC	Continuing Check Compound
CCV	Continuing Calibration Verfication
COC	Chain of custody
CRI	standard at RL for ICP
CVAA	Cold vapor atomic absorption
DFTPP	Decafluorotriphenylphosphine
DQO	Data quality objective
EB	Equipment blank
EPA	Environmental Protection Agency
FD	Field duplicate
GC	Gas Chromatography
GC/MS	Gas chromatography/mass spectrometry
HT	Holding time
ICAL	Initial calibration
ICS-A/AB	Interelement check standard A or AB
ICV	Initial calibration verification
IDL	Instrument detection limit
IS	Internal standards
LCL	Lower control limit
LCS	Laboratory control sample
LTMP	Long term monitoring plan
MeCl	Methylene chloride
MS	Matrix spike

Acronym or Abbreviation	Definition
MSD	Matrix spike duplicate
MPC	Measurement performance criteria
NA	Not applicable
NC	Not calculated.
PAH	Polycyclic aromatic hydrocarbon
PCB	Polychlorinated biphenyls
PQL	Practical quantitation limit
QAPP	Quality Assurance Project Plan
QC	Quality control
RF	Response Factor
RPD	Relative percent difference
RRF	Relative response factor
RSD	Relative standard deviation
RT	Retention time
SDG	Sample Delivery Group
SOP	Standard Operation Procedure
SVOC	Semi-volatile organic compound
SPCC	System performance check compound
SQL	Sample Quantitation Limit
TB	Tripblank
TCX	Tetrachloro-m-xylene
TIC	Tentatively identified compound
UCL	Upper control limit
VOC	Volatile organic compound

DATA QUALIFIER REFERENCE TABLE

Data validation reports will summarize the samples reviewed, elements reviewed, any nonconformances with the established criteria, validation actions (including data qualifiers). Data qualifiers will be consistent with EPA Region I – New England guidelines and will consist of the following:

USEPA Region I – Data Qualifier	USEPA Region I – Qualifier Definition
J	The analyte was positively identified; the associated numerical value is the approximate concentration of the analyte in the sample
UJ	The analyte was not detected above the sample reporting limit; and the reporting limit is approximate
U	The sample was analyzed for, but was not detected above the sample reporting limit.
R	The sample result is rejected due to serious deficiencies. The presence or absence of the analyte cannot be verified

Region I, EPA-NE ORGANIC REGIONAL DATA ASSESSMENT

LAB NAME: Northeast Laboratory
SDG #:__M59298
EPA-NE DV TIER LEVEL:___II___
SITE NAME: NAS Brunswick – Sites 1&3

# of SAMPLES/MATRIX: 5 Seeps, 5 leachate sediment & 1 leachate sediment FD
VALIDATION CONTRACTOR:__ECC/ASW
VALIDATOR'S NAME: Sherri Pullar
DV Completion Date:_ November 11, 2006.
Date Sampled__14 September 2006.

ANALYTICAL DATA QUALITY SUMMARY

		VOC	Metals
1	Preservation and HT	O	O
2	Instrument Performance Check	O	M
3	Initial Calibration:	O	O
4	Continuing Calibration:	O	O
5	Blanks:	M	O
6	Surrogate Compounds:	O	-
7	Internal Standards	M	-
8	Matrix Spike/Matrix Spike Duplicate:	O	M
9	Sensitivity Check:	O	O
10	PE Samples- Accuracy Check	O	M
11	Target Compound Identification:	O	O
12	Compound Quantitation and Reported QLs	O	O
13	Tentatively Identified Compounds:	-	-
14	Semivolatile/Pesticide/PCB Cleanup:	-	-
15	Data Completeness	O	O
16	Overall Evaluation of Data:	O	O

O = Data had no problems or were qualified due to minor contractual problems; M = Data were qualified due to major/systemic MPC exceedences: Z = Data were rejected as unusable due to major contractual problems.

ACTION ITEMS: (Z items): None.

AREAS OF CONCERN: (M items):

VOC: Results for MeCl in samples 1 & 6 were qualified U due to method blank contamination. All sample results were qualified J for detects and UJ for non-detects due to internal standard areas outside MPC limits.

Metals: Fe, Al, Pb, Mg, Ni, Tl, As, Co, Cu, Zn, Hg, & Ca results qualified J in samples 1 and 2 due to field duplicate RPD>MPC. K, Na, Be, Cr, & Se results qualified J in sample 1 and UJ in sample 2 due to field duplicate RPD>MPC. Ag results qualified J in sample 2 and UJ in sample 1 due to field duplicate RPD>MPC. Results <MRL and >IDL were qualified J. Results for Sb, Se, and Ag were qualified J for detects and UJ for non-detects in samples 1-6 due to MS %R<LCL. Results for Hg were qualified J in samples 1-6 due to RPD greater than MPC limit. Results for Al in samples were qualified J in samples 1-6; As in samples were qualified J in samples 1, 2, & 5; Ca in samples were qualified J in samples 1-6; and Mn in samples were qualified J in samples 1-6 due to serial dilution %D greater than MPC limit.

COMMENTS:

ECC Region I Data Review Worksheet (rv 3) **VOCs 5030B/5035//8260B**
Project: NAS Brunswick Sites 1&3 ECC Job No. 5700 **Review Criteria: Sites 1, 3 & EP**
& **USEPA Region I Tier II Guidance**

Data Validation Level	Matrix	Preservation	Temp Sample Receipt	Laboratory	SDG Number
Tier II	**Soil**	**Methanol/ sodium bisulfate**	**1 batch – Temp (^oC): < 6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59298**

Field Identification and Laboratory Number of Samples Evaluated:

Field ID	Lab Sample Number
BN-1&3-29-LT9	M59298-1
BN-1&3-29-LT-XD1	M59298-2 (field duplicate for M59298-1)
BN-1&3-29-LT1	M59298-3
BN-1&3-29-LT4	M59298-4
BN-1&3-29-LT5	M59298-5
BN-1&3-29-LT3	M59298-6

Note: Samples are described below in the data worksheets by reference to the last few digits of the Lab Sample Number.

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects preserved per method (amber bottles, temperature, HCl (aq), MeOH/NAHSO4 (soils) (J, UJ, or R (function of HT and compound)	Cooler temperatures < 6 ^oC. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. No samples qualified.	X	-	
Holding Time	1) 14 Days to analysis, if preserved 2) J –detects, UJ or R – non-detects (function of time) 3) *transcription errors	Dates collected: September 14, 2006. Analyzed before: September 29, 2006. All samples analyzed within holding time with the exception of re-analysis of sample 2. Results in sample 2 were qualified J for detects and UJ for non-detects due to internal standard area counts outside MPC limits.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made. 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	NA	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
Lab Blanks (method blanks)	1) < 5x (<10x common) contaminants for aq samples- 2) <10X common contaminants – acetone, 2-butanone or Mecl. 1) TGT analytes <Lab QL 2) if linear range is exceeded, verify if a instrument blank was performed 3) *verify accurate transcription of times, Ids, are reported on forms 4) *verify from the raw data if the instrument blank was performed in the same vessel 5) *verify IS, RRT, and surrogate %R *check 10% of raw chromatograms for false +/-, check for transcription errors	1 batch of samples were analyzed – on September 25, 2006. September 25 – MeCl.	X	Results for MeCl in samples 1 & 6 were qualified U.	
Trip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate cross matrix TB (X rules apply to raw data) 4) MeCl & Acetone < 5 5) >RL report sample level U 6) <RL report PQL as U	Trip blanks associated with this SDG were include in SDG M59294. Sample M59294-7 was non-detect for all VOC's of concern. Sample M59294-7A – contained methylene chloride (8.3 ug/Kg) & acetone (12.9 ug/Kg) – methylene chloride was qualified U due to method blank contamination. No sample qualifications.	X	-	
Equip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate TB (X rules don't apply) 3) MeCl & Acetone < 5 *Check IS area (10% of them) * recalculate surrogate (%R – 10 % of them)	Not collected/analyzed with this SDG as all the equipment were dedicated.	-	-	
Results > Cal Range or <Cal Range	6) >Upper Cal Range J-detects - ensure instrument blank performed 7) <PQL but >MDL – J –detects (estimated) listed on data summary sheet.	Attached data summary table. Analytes with results >MDL but <PQL/RL were qualified J. Results in samples 1-6 were qualified J for detects and UJ for non-detects due to internal standard area counts outside MPC limits.	X	-	
*TICs (if reported)	1) *verify library search for samples and blanks 2) verify TICs were not misreported compounds (different fraction or miss in search) 3) All TICs – J estimated 4) * verify blanks do not contain TIC peaks 5) * check TIC assignment spectra to STD spectra 6) *review blank and Samples for common lab contaminants	None Reported/not evaluated	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
Surrogates	1,2-Dichloroethane-d4 65-135% Dibromofluoromethane 75-129% Toluene-d8 82%-120% 4-BFB 69%-125% *check raw data for surrogated (recalculate 10% of them). *Transcription errors Qualification: >UCL J –detects, %R<10% J –detects, R –Nods, %R >10% but <70% J-detects, UJ NDs	Surrogate recovery within QAPP limits with the exception of dibromofluoromethane in samples 1, 2, 3, 4, 5, & 6. Samples were re-analyzed and possible matrix interference was confirmed. Results in samples 1-6 were qualified J for detects and UJ for non-detects due to internal standard area counts outside MPC limits.	X	-	
LCS Recovery	1) Attachment A-2 of LTMP 2) All VOCs 60-140% 3) 10% and <LCL% J detects, UJ –Nods 4) >UCL% J detects <10% R NDs, J-detects 7) *Recalculate the concentrations for one compound in the LCS 8) * Recalucate the %R (within 10% of lab) Note: Tier guidance as a zero blind	LCS recoveries were within MPC limits. No samples qualified.	X	-	
*MS/MSD/unspike sample RSD	1)For unspiked compounds if reported, Non- MS spike compounds <50% RSD calculated from MS/MSD/Unspiked Qualification: >50% RSD J-detects 2)*recalculate the RPD (within 10% of lab)	NA	-	-	
*Compound Quantitation (completed as part of other steps)	1) Check sensitivy (MDL< 1/3 PQL) 2) *Recalculate one detection and quantitation limit 3) *verify concentrations have been adjusted to account for DW, DF, 4) *verifiy correct IS and RRF were used	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 8) *Matrix effects- MS/MSD, surrogated, PDS. 9) *System chromatography- evaluate RRTs, peaks shapes, system impacts on data, baseline shifts. 10) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
*TGT Compound Identification	1) *Within 0.06 (30 sec) of CCV RRT 2) * compare sample Mass spectra to standard spectra; a) all ions in std spectra (with 10% rel intensity) presnent in sample spectra. B) sample ion abundance within 20% of standard spectra. 3) *chromatogram: all peaks greater than 10% of nearest IS identified.	NA	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
Field Dup RPD	1) RPD ≤ 30% aq. ≤ 50 soil for Results > PQL (FD pair only) J-detects (both > PQL) 2) Note: FD RPD not specified in QAPP. 30% will be used as the MPC, to be consistent with other NASB QAPPs. 3) If one >PQL, other ND, J-detections, UJ non-detect 4) Other conditions use judgement 5) Determine RPD for detects only. *Recalculate the concentrations for one compound and the PQL	Field Sample Field Duplicate 1 2 FD Pair 1/2; FD RPD's were outside MPC limits for 1,4-dichlorobenzene, toluene, carbon dusulfide, and 1,2-dichlorobenzene. Results in samples 1 & 2 were qualified J for detects and UJ for non-detects due to internal standard area counts outside MPC limits. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.	X	-	
Single Blind PE	1) Qualify associated samples in PES batch PES = ND, Detects J – ND PE analytes in samples, NDs – R 11) PES > acceptance criteria – Detects in samples J, 12) PES<acceptance criteria – Detects J, NDs –R 13) VOA/SV-XI14 other criteria 14) *% of PES sample above and below criteria *Recalculate concentrations for one tgt compound per PES (10% of lab)	NA	-	-	
MS/MSD Recovery	1) Attachment A-2 of LTMP 2) 60-140% for all VOCs (if MS > 4X native levels) Qualification of MS sample: <10% J detects, R NDs >10% and <LCL% J detects, UJ -NDs >UCL% J detects 3) *Recalculate the concentrations for one compound in the MS/MSD 5) * Recalculate the %R (within 10% of lab)	Native sample - 1 High MS/MSD recoveries for acetone, 2-butanone, carbon tetrachloride, methylene chloride, and 1,1,2,2-tetrachloroethane. Low MS recovery for 1,2-dichlorobenzene. 1,2-Dichlorobenzene, acetone, 2-butanone, carbon tetrachloride, methylene chloride, and 1,1,2,2-tetrachloroethane results were previously qualified J for detects and UJ for non-detects in sample 1 due to internal standard area counts outside MPC limits.	X	-	-
MS/MSD RPD (LCS/LCSD RPD)	RPD ≤20% (aq/S) (when MS >QL) J – detects in MS sample UJ-non detects * recalculate RPD	Native sample - 1 MS/MSD RPD outside MPC limits for acetone, carbon disulfide, and 1,2-dichlorobenzene. Acetone, carbon disulfide, and 1,2-dichlorobenzene results were previously qualified J for detects and UJ for non-detects in sample 1 due to internal standard area counts outside MPC limits. LCS/LCSD RPD's inside MPC limits. No samples qualified.	X	-	
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20%	NA	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
	2) * IS and retention times within method requirements 6) * performed annually 7) *MDL is at least ½ of PQL 8) *tgt and surrogate 80-120% R *VOA/SV-X11 (recalcuate %RSD and %R for three compounds (10% of them).				
Internal Stds	1) IS are –50% to 200% of last Ical, or CCV 3) RRT<0.06 (30 sec) 4) IS>100% J-detects 5) IS<20%CCV NDs – R 6) IS>20%CCV <50%CCV NDs – UJ 7) *check for IS transcription errors 8) FBZ = fluorobenzene 9) CBZ = chlorobenzene-d5 10) DCB = 1,4 dichlorobenzene-d4	Internal standard areas outside MPC limits for 1,4-dichlorobenzene-d4 in sample 1, 2, 3, 4, 5, & 6; pentfluorobenzene in samples 3, 4, 5, & 6; 1,4-difluorobenzene in samples 3, 4, & 5; chlorobenzene-d5 in samples 3, 4, 5, & 6; tert butyl alcohol-d9 in sample 4; 1,4-dichlorobenzene-d4 in the reanalysis of sample 3; and 1,4-dichlorobenzene-d4 in the reanalysis of sample 2 (re-analysis run outside holding time criteria).	X	All sample results were qualified J for detects and UJ for non-detects.	
Sensitivity	1) MDL study – 7 replicates (40 CFR) 2) Surrogates %in control limits. 3) %R <10 ND- (R) , J- detects 4) 10%> but <LCL% , judgement 5) %R>UCL% J-detects 6) QC, IS, RRT meet criteria, 7) %RSD < 20% 8) MDL< MQL (3x less ideal) 9) Lab fortitied blank (see VOA/SV Part II –section X). 10) *Check and recalculate %RSDs and %R for three compounds (with 10% of lab) <u>Dilution factors for samples – impacts to sensitivity</u>	No dilutions required. Elevated RL's for sediments due to % moisture. No sample qualifications.	X	-	
Tune check	1) ion abundance with method limits 2) *check for co-elution /proper background subtraction 3) *compare reported data to raw data	Tunes were within MPC limits. Detections verified from the tunes & GC. No sample qualifications.	X	-	
Initial Cal Multipoint (instrument evaluation)	1) correct calibration stds 2) within 12 hours of the tune check 3) CCCs %RSD: <30% (1,1 DCA, chloroform, 1,2dichloropropane, Toluene, EB, VC (J –detects, R or UJ NDs all samples associated with Ical) 4) SPCCs Average RRF: SPCCs Chloromethane >0.10, 1,1 DCA>0.10, bromoform >0.10, chlorobenzene>0.3, 1122TCA>0.3 (J –detects, R NDs) 5) RRF>0.05 all compounds 6) RRT < 0.06 units (all stds within 30 sec) 7) %RSD<15% for all non-CCCs or COD>0.99 *8)* *<u>RRF exclusions: surrogates, acetone, MeCL, chloroethane/methane, CS, 1,/22/03 2-butanone, 1,2 dichloropropane, 2-hexanone (IV-8)./</u>* 9) *verify that instrument parameters met method and that Ical and analysis used the same parameters	Instrument GCMSH Date: September 27 All RRF's within MPC limits for all VOC's of concern. All CCCs are in MPC. All SPCC are in MPC. Instrument GCMSL Date: September 23 All RRF's within MPC limits for all VOC's of concern. All CCCs are in MPC. All SPCC are in MPC. Instrument GCMSL Date: September 24 All RRF's within MPC limits for all VOC's of concern. All CCCs are in MPC. All SPCC are in MPC.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
	10) *recalculate RRF one tgt compound associated with each IS. Recalculated values within 10% of lab values. 11) *recalculate one tgt compound associated with each IS. Recalculated values within 10% 12) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 13) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)				
Initial Cal (Linearity)	%RSD < 15% use average RF for calibration %RSD> 15% use least squares COD (r2) > 0.990 or correlation coefficient r> 0.995 Qualification for compounds with: %RSD>30% and RRF>0.05 – J detects, UJ - NDs %RSD<30% and RRF<0.05; -J detects, R - ND %RSD>30% and RRF<0.05: J detects, R - ND (see VOA/SVIII-4)	Instrument GCMSH Date: September 27 Applicable to all samples – analytes with average response factors exceeding 15% were determined by linear or quadractic curves. No sample qualifications. Instrument GCMSL Date: September 23 Applicable to all samples – analytes with average response factors exceeding 15% were determined by linear or quadractic curves. No sample qualifications. Instrument GCMSL Date: September 24 Applicable to all samples – analytes with average response factors exceeding 15% were determined by linear or quadractic curves. No sample qualifications.	X	-	
2nd Source ICV	QC check nor criteria not specified in QAPP. %D<25% or %R (between ICV and Ical) analytes 80%--120% (+ or -) once per 5 pt cal used to evaluate data sets. Qualification: J detects, R or UJ NDs	Instrument GCMSH Date: September 28 %D's were within MPC limits. Instrument GCMSL Date: September 23 %D's were within MPC limits. Instrument GCMSL Date: September 24 %D's were within MPC limits with the exception of acetone & trans-1,3-dichloropropene. Results in samples 1-6 were qualified J for detects and UJ for non-detects due to internal standard area counts outside MPC limits.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
CCV	1) SPCCs Average RRF: SPCCs Chloromethane >0.10, 1,1 DCA>0.10, bromoform >0.10, chlorobenzene>0.3, 1122TCA>0.3 2) RRF all compounds > 0.05 *3)* CCC: (1,1 DCA, chloroform, 1,2dichloropropane, Toluene, EB, VC) %D<20% (or all analytes if no CCCs reported). 4) Qualification-J detects, R or UJ NDs 5) *verify same instrument and parameters 6) *Recalculate RRF for one tgt cmpd associated with each IS. (within 10%) 7) *Recalculate %D for one tgt cmpd associated with each IS (within 10%) 8) *IS RRT<0.06 units (30 sec) 9) * IS area -50 % to 100 % of last ICAL 10) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 11) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument GCMSH Date: September 28 September 28 – applicable to ICV - %D inside MPC limits. September 28 – applicable to samples 4, 5, & 6 - applicable to ICV - %D inside MPC limits. Instrument GCMSL Date: September 23 September 23 – applicable to MS - %D outside MPC limits for chloroethane and acetone. Instrument GCMSL Date: September 25 September 25 – applicable to 1, 2, 3, 4, 5, & 6 - %D outside MPC limits for chloromethane, MeCl, and acetone. Note: Acetone results in samples 1, 2, 5, & 6 would have been qualified J for detects and UJ for non-detects but acetone was qualified for ICV %D outside MPC limits. Instrument GCMSL Date: September 26 September 27 – applicable to MS - %D outside MPC limits for 2-butanone, MeCl, and acetone. Instrument GCMSL Date: September 27 September 27 – applicable to MS - %D outside MPC limits for MeCl, carbon disulfide, toluene, and ethylbenzene. Instrument GCMSL Date: September 28 September 28 – applicable to 3 - %D outside MPC limits for MeCl, 2-butanone, 2-hexanone, and 1,1,2,2-tetrachlorethane. Instrument GCMSL Date: September 29 September 29 – applicable to 2 - %D outside MPC limits for chloromethane, acetone, & MeCl. Results in samples 1-6 were qualified J for detects and UJ for non-detects due to internal standard area counts outside MPC limits.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Laboratory precision and accuracy acceptable. No apparent sample bias. Sample results are usable for making project decisions, as qualified. Results in samples 1-6 were qualified J for detects and UJ for non-detects due to internal standard area counts outside MPC limits. All samples analyzed within holding time with the exception of re-analysis of sample 2. Results for MeCl in samples 1 & 6 were qualified U due to method blank contamination. Surrogate recovery within QAPP limits with the exception of dibromofluoromethane in samples 1, 2, 3, 4, 5, & 6. High MS/MSD recoveries for acetone, 2-butanone, carbon tetrachloride, methylene chloride, and 1,1,2,2-tetrachloroethane. Low MS recovery for 1,2-dichlorobenzene. MS/MSD RPD outside MPC limits for acetone, carbon disulfide, and 1,2-dichlorobenzene. Internal standard areas outside MPC limits for 1,4-dichlorobenzene-d4 in sample 1, 2, 3, 4, 5, & 6; pentfluorobenzene in samples 3, 4, 5, & 6; 1,4-difluorobenzene in samples 3, 4, & 5; chlorobenzene-d5 in samples 3, 4, 5, & 6; tert butyl alcohol-d9 in sample 4; 1,4-dichlorobenzene-d4 in the reanalysis of sample 3; and 1,4-dichlorobenzene-d4 in the reanalysis of sample 2 (re-analysis run outside holding time criteria). ICAL; within MPC limits. ICV: within MPC limits. CCV: Date: September 24 %D's were within MPC limits with the exception of acetone & trans-1,3-dichloropropene. <u>Field Sample Field Duplicate</u> 1 2 FD Pair 1/2; FD RPD's were outside MPC limits for 1,4-dichlorobenzene, toluene, carbon dusulfide, and 1,2-dichlorobenzene. Results in samples 1 & 2 were qualified J	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
		for detects and UJ for non-detects due to internal standard area counts outside MPC limits. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.			

* Tier III review items only.

Completeness Check: Inventory Check Sheet_____X__. Sample Quantitation Calculations (TIER III only):

Lab Correspondence: None.

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

Metals 6010B/7041/7470A/7471A/7740/7841
Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

Data Validation Level	Matrix	Preservation	Temperature Sample Receipt	Laboratory	SDG Number
Tier II	**Solid**	**-**	**1 batch – Temp (^oC): < 6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59298**

Field Identification of Samples Evaluated:

Field ID	Lab Sample Number
BN-1&3-29-LT9	M59298-1
BN-1&3-29-LT-XD1	M59298-2 (field duplicate for M59298-1)
BN-1&3-29-LT1	M59298-3
BN-1&3-29-LT4	M59298-4
BN-1&3-29-LT5	M59298-5
BN-1&3-29-LT3	M59298-6

Note: Samples are described below in the data worksheets by reference to the last three digits of the Lab Sample Number

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects 3) preserved per method (amber bottles, temperature. J, UJ, or R (function of HT and compound)	Cooler temperatures <6°C. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. Sample preservation within limits. No samples qualified.	X	-	
Holding Time	1) 180 days (6010), Hg 28 Days to analysis 2) J –detects, UJ or R –nondetects (function of time)	All samples analyzed within holding time. No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 30% water; ≤50% soil (no QAPP Criteria) for Results > X PQL (FD pair only) J-detects (both > X PQL) 2) If one >X PQL, other ND, J-detections, UJ non-detect	Field Sample 1 / Field Duplicate 2 FD Pair 1/2; K, Na, Be, Cr, & Se not detected in the FD, but had a low-level detect in the field sample, Ag not detected in the field sample but had a low-level detect in the FD, & Fe, Al, Pb, Mg, Ni, Tl, As, Co, Cu, Zn, Hg, & Ca FD RPD>MPC.	X	Fe, Al, Pb, Mg, Ni, Tl, As, Co, Cu, Zn, Hg, & Ca results qualified J in samples 1 and sample 2. K, Na, Be, Cr, & Se results qualified J in sample 1 and UJ in sample 2. Ag results qualified J in sample 2 and UJ in sample 1.	

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

Metals 6010B/7041/7470A/7471A/7740/7841
Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs –R	% Solid > 30%. No samples qualified.	X	-	
Results > Cal Range or <Cal Range	1) >Upper Cal Range J-detects - ensure instrument blank performed 2) <MRL but >MDL – J –detects (estimated)	All detections are greater than the MRL. Results <MRL and >IDL were qualified J.	X	Results <MRL and >IDL were qualified J.	
Lab Blanks (method blank or preparation blank)	1) Once per sample batch 2) Results > QL; sample results <5X; sample result U (nd) 3) Sample results >5X blank level; no action	Preparation blanks were non-detect for all metals.	X	-	
LCS Recovery	1) once per sample batch 2) 80-120% ICP metals and Hg. 3) <LCL% Reject 4) >UCL% detects J	All LCS %R's were within MPC. No samples qualified. Laboratory precision is acceptable.	X	-	
LCS/LCSD RPD	1) RPD<20%	N/A	-	-	
MS Recovery	1) 75-125% ICP metals and Hg if MS > 4X native levels) Qualification of MS sample: 2) <30% J detects, R NDs 3) 30%--74%, detects J, NDs UJ 4) >125% J detects	Field sample: M59298-1 used for MS. Al, As, and Fe MS/MSD %R>UCL and Mn MS/MSD %R<LCL however, the field sample was greater than 4X the matrix spike level. No samples qualified. Sb, Se, and Ag MS %R<LCL.	X	Results for Sb, Se, and Ag were qualified J for detects and UJ for non-detects in samples 1-6.	
MS/MSD RPD	MS/MSD RPD<20%	N/A	-	-	
Laboratory Replicate RPD	RPD < 20% No QAPP criteria provided	Field sample: M59298-1 used for lab replicate. All RPDs within limits, except for Ca & Hg. Ca results were qualified for serial dilution %D greater than MPC limit.	X	Results for Hg were qualified J in samples 1-6.	
Sensitivity*	1) MDL study – 7 replicates (40 CFR) 2) check and recalculate %RSDs and %R for three compounds (with 10% of lab)	Select samples diluted to bring results in calibration range.	X	-	
Equip Blank	< 5x contaminants for aq samples – for soil indicate EB (X rules don't apply)	Not collected/analyzed with this SDG	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
Negative blanks	If negative values are reported for an analyte with absolute value >DL and sample value is <5X the absolute value of the blank or is nondetect Qualify detects as estimated (J) Nondetects as estimated (UJ)	No negative blank detections. No samples qualified.	X	-	
Initial Cal Multipoint	1) Blank and 3 standards covering range of instrument. 2) high standard verification +/- %5 3) Hg 5-point calibration COD>0.99	ICP-AES samples. All COD's > 0.99 in all initial calibration runs for all methods. No sample qualifications. Hg ICaL within limits.	X	-	
Initial Calibration Blanks (ICB)	1) Ical blank after Ical 2) Results > QL; sample results <5X ; sample result U (nd) 3) Blank concentrations < project RLs 4) Sample results >5X blank level; no action 5) ABS >RL then J qualify data	No 6010B/Hg ICB detections – no samples qualified.	X	-	
Continuing Calibration Blanks (CCB)	1) CCB every 10 samples end of run 2) Blank concentrations < project RLs 3) Results > QL; sample results <5X ; sample result U 4) Sample results >5X blank level; no action ABS >RL then J qualify data.	No 6010B/Hg CCB detections – no samples qualified.	X	-	
Serial Dilution	1) once per digestion batch 2) Not required per QAPP- no criteria provided. 3) %D<10% 4) %D not evaluated if element results is <50X IDL 5) J detects, UJ non-detects.	%D's were with MPC limits with the exception of Al, As, Ba, Ca, Co, Cr, Pb, Mg, Mn, Ni, K, & Zn. Native sample results for Ba, Ni, Pb, Mg, Cr, Co, Be, Se, Na, K, Zn, & Tl were <50X IDL, no samples qualified.	X	Results for Al in samples were qualified J in samples 1-6. Results for As in samples were qualified J in samples 1, 2, & 5. Ca in samples were qualified J in samples 1-6. Mn in samples were qualified J in samples 1-6.	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
Interelement checks ICS-A, ICS-AB Instrument performance check	1) start of sequence 2) 80-120% target analytes 3) >120% ; detects J (ICS-AB) 4) 50%-79% R ICS-AB; detects J, NDs – UJ 5) <50% R – reject data 6) ICS-A response > DL and samples have <5X ICS-A response: detects J (if DL is <10 ug/l use 2X DL). 7) Absolute value of negative ICS-A response>DL and sample detects <5X ICS-A response: detects J, NDs as UJ 8) If the ICS-A is within limits, the ICS-AB may not be analyzed (USACE Shell)	Both ICS-A and ICS-AB %R's within MPC limits for all runs.	X	-	
2nd Source ICV	1) following calibration 2) 90- 110% Recovery (6010/7000) 3) 75%-89% R – detects J, NDs – UJ 4) 111-125% R – detects J 5) outside 75-125% R – reject data (R) Hg 80-120%	6010B/Hg ICV %R's within MPC limits the initial calibration. No samples qualified.	X	-	
CCV	1) every 10 samples and end of run 2) 90- 110% Recovery (6010) Hg; 80-120% 3) 6010: 75%-89% R Hg, 65-79% R; – detects J, NDs – UJ. 4) 6010: 111-125%, Hg: 121-135% detects J 6010: outside 75-125%, Hg; outside 65-135%; R – reject data (R)	6010B/Hg CCV %R's within MPC limits. No samples qualified.	X	-	
Post Digestion Spike	1) Analyze if MS >MPC (QAPP) 2) 85- 115%R (QAPP Attachment A-1)	Field sample: M59298-1 used for PDS. All %R within limits for Tl, Se, and Sb.	X	-	
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 3) * performed annually 4) *MDL is at least ½ of PQL *tgt and surrogate 80-120% R	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 3) *Matrix effects- MS/MSD, surrogated, PDS. 4) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
Tune Check	Within Method limits.	NA	-		
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Method 6010B; Sediments metals except for Hg. The LCS %R's are within limits. The Matrix spikes were within limits except for Sb, Se, and Ag (<LCL). Laboratory accuracy is acceptable for all	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
		metals, except for Hg for the sediment matrix. The LCS/LCSD RPDs were within limits. Serial Dilution %D within MPC limits with the exception of Al, As, Ba, Ca, Co, Cr, Pb, Mg, Mn, Ni, K, & Zn. Native sample results for Ba, Ni, Pb, Mg, Cr, Co, Be, Se, Na, K, Zn, & Tl were <50X IDL, no samples qualified. PDS within MPC limits. Preparation blanks were non-detect for all metals. IPC; in limits. ICAL: COD within limits. ICV: in limits CCV: in limits Sampling Error Evaluation: Field Sample Field Duplicate 1 2 FD Pair 1/2; K, Na, Be, Cr, & Se not detected in the FD, but had a low-level detect in the field sample, Ag not detected in the field sample but had a low-level detect in the FD, & Fe, Al, Pb, Mg, Ni, Tl, As, Co, Cu, Zn, Hg, & Ca FD RPD>MPC. Overall precision is acceptable.			

*TIER III DATA VALIDATION ONLY Completeness Check: Inventory Check Sheet___X_Sample Quantitation Calculations (TIER III DATA VALIDATION ONLY):

FIELD DUPLICATE WORKSHEET

SDG: M59298

Field Sample Id	Analyte	Analytical Method	Result	Units	Qualifier	Field Duplicate Id	Result	Units	Qaulifier	FD RPD (%)
BN-1&3-29-LT9	Iron	SW8466010B	127000	mg/kg	J	BN-1&3-29-LT-XD1	495000	mg/kg	J	**118.3**
BN-1&3-29-LT9	Aluminum	SW8466010B	7200	mg/kg	J	BN-1&3-29-LT-XD1	1670	mg/kg	J	**124.7**
BN-1&3-29-LT9	Lead	SW8466010B	21.4	mg/kg	J	BN-1&3-29-LT-XD1	8.5	mg/kg	J	**86.3**
BN-1&3-29-LT9	Magnesium	SW8466010B	2190	mg/kg	J	BN-1&3-29-LT-XD1	509	mg/kg	J	**124.6**
BN-1&3-29-LT9	Manganese	SW8466010B	774	mg/kg		BN-1&3-29-LT-XD1	939	mg/kg		19.3
BN-1&3-29-LT9	Nickel	SW8466010B	32.3	mg/kg	J	BN-1&3-29-LT-XD1	3.6	mg/kg	J	**159.9**
BN-1&3-29-LT9	Potassium	SW8466010B	812	mg/kg	J	BN-1&3-29-LT-XD1	800	mg/kg	UJ	**NC**
BN-1&3-29-LT9	Silver	SW8466010B	0.81	mg/kg	UJ	BN-1&3-29-LT-XD1	0.18	mg/kg	J	**NC**
BN-1&3-29-LT9	Sodium	SW8466010B	209	mg/kg	J	BN-1&3-29-LT-XD1	800	mg/kg	UJ	**NC**
BN-1&3-29-LT9	Thallium	SW8466010B	3.1	mg/kg	J	BN-1&3-29-LT-XD1	7.9	mg/kg	J	**87.3**
BN-1&3-29-LT9	Arsenic	SW8466010B	363	mg/kg	J	BN-1&3-29-LT-XD1	792	mg/kg	J	**74.3**
BN-1&3-29-LT9	Barium	SW8466010B	51.6	mg/kg		BN-1&3-29-LT-XD1	53.2	mg/kg		3.1
BN-1&3-29-LT9	Beryllium	SW8466010B	0.59	mg/kg	J	BN-1&3-29-LT-XD1	0.64	mg/kg	UJ	**NC**
BN-1&3-29-LT9	Chromium	SW8466010B	12.2	mg/kg	J	BN-1&3-29-LT-XD1	8.0	mg/kg	UJ	**NC**
BN-1&3-29-LT9	Cobalt	SW8466010B	80.7	mg/kg	J	BN-1&3-29-LT-XD1	11.7	mg/kg	J	**149.4**
BN-1&3-29-LT9	Copper	SW8466010B	17.0	mg/kg	J	BN-1&3-29-LT-XD1	2.3	mg/kg	J	**152.3**
BN-1&3-29-LT9	Vanadium	SW8466010B	27.5	mg/kg		BN-1&3-29-LT-XD1	28.3	mg/kg		2.9
BN-1&3-29-LT9	Zinc	SW8466010B	73.8	mg/kg	J	BN-1&3-29-LT-XD1	18.6	mg/kg	J	**119.5**
BN-1&3-29-LT9	Calcium	SW8466010B	10100	mg/kg	J	BN-1&3-29-LT-XD1	2710	mg/kg	J	**115.4**
BN-1&3-29-LT9	Selenium	SW8466010B	2.4	mg/kg	J	BN-1&3-29-LT-XD1	4.0	mg/kg	UJ	**NC**
BN-1&3-29-LT9	Mercury	SW8467471A	0.081	mg/kg	J	BN-1&3-29-LT-XD1	0.035	mg/kg	J	**79.3**
BN-1&3-29-LT9	1,4-Dichlorobenzene	SW8260	143	ug/kg	J	BN-1&3-29-LT-XD1	62.4	ug/kg	J	**78.5**
BN-1&3-29-LT9	Toluene	SW8260	45	ug/kg	UJ	BN-1&3-29-LT-XD1	5.7	ug/kg	J	**NC**
BN-1&3-29-LT9	Acetone	SW8260	5620	ug/kg	J	BN-1&3-29-LT-XD1	3480	ug/kg	J	47
BN-1&3-29-LT9	Carbon disulfide	SW8260	255	ug/kg	J	BN-1&3-29-LT-XD1	485	ug/kg	J	**62.2**
BN-1&3-29-LT9	1,2-Dichlorobenzene	SW8260	320	ug/kg	J	BN-1&3-29-LT-XD1	148	ug/kg	J	**73.5**

NAS BRUNSWICK- SITES 1 & 3 – SEPTEMBER 2006
DATA SUMMARY TABLE – SEDIMENT SDG M59298

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	2	Iron	127000	mg/kg		9.9	32
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	2	Cadmium	1.3	mg/kg	U	0.10	1.3
BN-1&3-29-LT9	M59298-1	EPA1603M	09/14/06	1	Solids, Percent	10.0	%			
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Aluminum	7200	mg/kg	J	3.7	32
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Lead	21.4	mg/kg		0.25	0.81
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Magnesium	2190	mg/kg		1.1	810
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Manganese	774	mg/kg	J	0.062	2.4
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Nickel	32.3	mg/kg		0.21	6.5
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Potassium	812	mg/kg		3.2	810
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Silver	0.81	mg/kg	UJ	0.096	0.81
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Sodium	209	mg/kg	J	24.0	810
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Thallium	3.1	mg/kg	J	0.78	3.2
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Antimony	3.2	mg/kg	UJ	0.47	3.2
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Arsenic	363	mg/kg	J	0.51	3.2
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Barium	51.6	mg/kg		0.23	32
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Beryllium	0.59	mg/kg	J	0.21	0.65
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Chromium	12.2	mg/kg		0.22	1.6
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Cobalt	80.7	mg/kg		0.36	8.1
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Copper	17.0	mg/kg		0.13	4.1
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Vanadium	27.5	mg/kg		0.16	8.1
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Zinc	73.8	mg/kg		0.18	3.2
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Calcium	10100	mg/kg	J	1.6	810
BN-1&3-29-LT9	M59298-1	SW8466010B	09/14/06	1	Selenium	2.4	mg/kg	J	0.55	0.81
BN-1&3-29-LT9	M59298-1	SW8467471A	09/14/06	1	Mercury	0.081	mg/kg	J	0.0075	0.033
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Ethylbenzene	18	ug/kg	UJ	2.4	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Styrene	45	ug/kg	UJ	2.5	45
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	cis-1,3-Dichloropropene	18	ug/kg	UJ	3.1	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	trans-1,3-Dichloropropene	18	ug/kg	UJ	3.0	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	1,4-Dichlorobenzene	143	ug/kg	J	3.4	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	1,2-Dichloroethane	18	ug/kg	UJ	2.0	18

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	4-Methyl-2-pentanone (MIBK)	45	ug/kg	UJ	2.8	45
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Toluene	45	ug/kg	UJ	6.7	45
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Chlorobenzene	18	ug/kg	UJ	3.8	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Dibromochloromethane	18	ug/kg	UJ	4.8	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Tetrachloroethene	18	ug/kg	UJ	8.1	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Xylene (total)	18	ug/kg	UJ	2.4	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	1,2-Dichloroethene (total)	18	ug/kg	UJ	5.6	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	1,3-Dichlorobenzene	18	ug/kg	UJ	3.6	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Carbon tetrachloride	18	ug/kg	UJ	3.2	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	2-Hexanone	45	ug/kg	UJ	3.9	45
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Acetone	5620	ug/kg	J	2.9	45
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Chloroform	18	ug/kg	UJ	2.7	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Benzene	4.5	ug/kg	UJ	3.6	4.5
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	1,1,1-Trichloroethane	18	ug/kg	UJ	3.0	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Bromomethane	18	ug/kg	UJ	8.5	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Chloromethane	45	ug/kg	UJ	7.0	45
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Chloroethane	45	ug/kg	UJ	4.4	45
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Vinyl chloride	18	ug/kg	UJ	7.9	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Methylene chloride	42.2	ug/kg	UJ	4.2	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Carbon disulfide	255	ug/kg	J	7.6	45
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Bromoform	18	ug/kg	UJ	2.7	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Bromodichloromethane	18	ug/kg	UJ	2.4	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	1,1-Dichloroethane	18	ug/kg	UJ	3.2	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	1,1-Dichloroethene	18	ug/kg	UJ	3.8	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	1,2-Dichloropropane	18	ug/kg	UJ	7.8	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	2-Butanone (MEK)	45	ug/kg	UJ	10	45
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	1,1,2-Trichloroethane	18	ug/kg	UJ	6.9	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	Trichloroethene	18	ug/kg	UJ	3.4	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	1,1,2,2-Tetrachloroethane	18	ug/kg	UJ	4.7	18
BN-1&3-29-LT9	M59298-1	SW8260	09/14/06	1	1,2-Dichlorobenzene	320	ug/kg	J	3.8	18
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	10	Iron	495000	mg/kg		49.0	160
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	20	Cadmium	13	mg/kg	U	1.0	13
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	2	Antimony	6.4	mg/kg	UJ	0.93	6.4

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	5	Chromium	8.0	mg/kg	U	1.1	8.0
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	5	Selenium	4.0	mg/kg	UJ	2.7	4.0
BN-1&3-29-LT-XD1	M59298-2	EPA1603M	09/14/06	1	Solids, Percent	20.4	%			
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Aluminum	1670	mg/kg	J	3.6	32
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Lead	8.5	mg/kg		0.25	0.80
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Magnesium	509	mg/kg	J	1.1	800
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Manganese	939	mg/kg	J	0.061	2.4
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Nickel	3.6	mg/kg	J	0.20	6.4
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Potassium	800	mg/kg	U	3.1	800
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Silver	0.18	mg/kg	J	0.095	0.80
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Sodium	800	mg/kg	U	24.0	800
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Thallium	7.9	mg/kg		0.77	3.2
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Arsenic	792	mg/kg	J	0.50	3.2
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Barium	53.2	mg/kg		0.23	32
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Beryllium	0.64	mg/kg	U	0.21	0.64
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Cobalt	11.7	mg/kg		0.36	8.0
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Copper	2.3	mg/kg	J	0.13	4.0
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Vanadium	28.3	mg/kg		0.16	8.0
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Zinc	18.6	mg/kg		0.18	3.2
BN-1&3-29-LT-XD1	M59298-2	SW8466010B	09/14/06	1	Calcium	2710	mg/kg	J	1.6	800
BN-1&3-29-LT-XD1	M59298-2	SW8467471A	09/14/06	1	Mercury	0.035	mg/kg	J	0.0072	0.032
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Ethylbenzene	8.7	ug/kg	UJ	1.1	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Styrene	22	ug/kg	UJ	1.2	22
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	cis-1,3-Dichloropropene	8.7	ug/kg	UJ	1.5	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	trans-1,3-Dichloropropene	8.7	ug/kg	UJ	1.4	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	1,4-Dichlorobenzene	62.4	ug/kg	J	1.6	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	1,2-Dichloroethane	8.7	ug/kg	UJ	0.96	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	4-Methyl-2-pentanone (MIBK)	22	ug/kg	UJ	1.4	22
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Toluene	5.7	ug/kg	J	3.2	22
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Chlorobenzene	8.7	ug/kg	UJ	1.8	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Dibromochloromethane	8.7	ug/kg	UJ	2.3	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Tetrachloroethene	8.7	ug/kg	UJ	3.9	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Xylene (total)	8.7	ug/kg	UJ	1.1	8.7

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	1,2-Dichloroethene (total)	8.7	ug/kg	UJ	2.7	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	1,3-Dichlorobenzene	8.7	ug/kg	UJ	1.7	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Carbon tetrachloride	8.7	ug/kg	UJ	1.5	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	2-Hexanone	22	ug/kg	UJ	1.9	22
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Acetone	3480	ug/kg	J	1.4	22
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Chloroform	8.7	ug/kg	UJ	1.3	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Benzene	2.2	ug/kg	UJ	1.7	2.2
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	1,1,1-Trichloroethane	8.7	ug/kg	UJ	1.5	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Bromomethane	8.7	ug/kg	UJ	4.1	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Chloromethane	22	ug/kg	UJ	3.4	22
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Chloroethane	22	ug/kg	UJ	2.1	22
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Vinyl chloride	8.7	ug/kg	UJ	3.8	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Methylene chloride	8.7	ug/kg	UJ	2.0	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Carbon disulfide	485	ug/kg	J	3.7	22
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Bromoform	8.7	ug/kg	UJ	1.3	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Bromodichloromethane	8.7	ug/kg	UJ	1.2	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	1,1-Dichloroethane	8.7	ug/kg	UJ	1.5	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	1,1-Dichloroethene	8.7	ug/kg	UJ	1.8	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	1,2-Dichloropropane	8.7	ug/kg	UJ	3.8	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	2-Butanone (MEK)	22	ug/kg	UJ	5.0	22
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	1,1,2-Trichloroethane	8.7	ug/kg	UJ	3.3	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	Trichloroethene	8.7	ug/kg	UJ	1.6	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	1,1,2,2-Tetrachloroethane	8.7	ug/kg	UJ	2.3	8.7
BN-1&3-29-LT-XD1	M59298-2	SW8260	09/14/06	1	1,2-Dichlorobenzene	148	ug/kg	J	1.9	8.7
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	5	Manganese	6140	mg/kg	J	0.32	13
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	5	Thallium	17	mg/kg	U	4.1	17
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Acetone	8220	ug/kg	J	140	2200
BN-1&3-29-LT1	M59298-3	EPA1603M	09/14/06	1	Solids, Percent	10.7	%			
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Aluminum	3140	mg/kg	J	3.8	34
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Iron	52800	mg/kg		5.1	17
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Lead	21.6	mg/kg		0.27	0.84
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Magnesium	1260	mg/kg		1.2	840
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Nickel	60.8	mg/kg		0.21	6.8

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Potassium	666	mg/kg	J	3.3	840
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Silver	0.46	mg/kg	J	0.10	0.84
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Sodium	275	mg/kg	J	25.0	840
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Antimony	3.4	mg/kg	UJ	0.49	3.4
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Arsenic	5.2	mg/kg		0.53	3.4
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Barium	142	mg/kg		0.24	34
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Beryllium	1.3	mg/kg		0.22	0.68
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Cadmium	2.9	mg/kg		0.052	0.68
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Chromium	4.9	mg/kg		0.23	1.7
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Cobalt	164	mg/kg		0.38	8.4
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Copper	14.4	mg/kg		0.14	4.2
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Vanadium	24.5	mg/kg		0.17	8.4
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Zinc	106	mg/kg		0.19	3.4
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Calcium	16700	mg/kg	J	1.7	840
BN-1&3-29-LT1	M59298-3	SW8466010B	09/14/06	1	Selenium	3.8	mg/kg	J	0.57	0.84
BN-1&3-29-LT1	M59298-3	SW8467471A	09/14/06	1	Mercury	0.62	mg/kg	J	0.0065	0.029
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Ethylbenzene	18	ug/kg	UJ	2.4	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Styrene	45	ug/kg	UJ	2.5	45
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	cis-1,3-Dichloropropene	18	ug/kg	UJ	3.1	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	trans-1,3-Dichloropropene	18	ug/kg	UJ	3.0	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	1,4-Dichlorobenzene	18	ug/kg	UJ	3.4	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	1,2-Dichloroethane	18	ug/kg	UJ	2.0	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	4-Methyl-2-pentanone (MIBK)	45	ug/kg	UJ	2.8	45
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Toluene	45	ug/kg	UJ	6.7	45
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Chlorobenzene	18	ug/kg	UJ	3.8	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Dibromochloromethane	18	ug/kg	UJ	4.8	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Tetrachloroethene	18	ug/kg	UJ	8.1	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Xylene (total)	18	ug/kg	UJ	2.4	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	1,2-Dichloroethene (total)	18	ug/kg	UJ	5.7	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	1,3-Dichlorobenzene	18	ug/kg	UJ	3.6	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Carbon tetrachloride	18	ug/kg	UJ	3.2	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	2-Hexanone	45	ug/kg	UJ	3.9	45
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Chloroform	18	ug/kg	UJ	2.7	18

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Benzene	4.5	ug/kg	UJ	3.6	4.5
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	1,1,1-Trichloroethane	18	ug/kg	UJ	3.0	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Bromomethane	18	ug/kg	UJ	8.6	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Chloromethane	45	ug/kg	UJ	7.1	45
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Chloroethane	45	ug/kg	UJ	4.4	45
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Vinyl chloride	18	ug/kg	UJ	7.9	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Methylene chloride	103	ug/kg	J	4.2	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Carbon disulfide	408	ug/kg	J	7.7	45
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Bromoform	18	ug/kg	UJ	2.7	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Bromodichloromethane	18	ug/kg	UJ	2.4	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	1,1-Dichloroethane	18	ug/kg	UJ	3.2	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	1,1-Dichloroethene	18	ug/kg	UJ	3.8	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	1,2-Dichloropropane	18	ug/kg	UJ	7.8	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	2-Butanone (MEK)	45	ug/kg	UJ	10	45
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	1,1,2-Trichloroethane	18	ug/kg	UJ	6.9	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	Trichloroethene	18	ug/kg	UJ	3.4	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	1,1,2,2-Tetrachloroethane	18	ug/kg	UJ	4.8	18
BN-1&3-29-LT1	M59298-3	SW8260	09/14/06	1	1,2-Dichlorobenzene	18	ug/kg	UJ	3.9	18
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Aluminum	1800	mg/kg	J	4.7	41
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Iron	9520	mg/kg		6.3	21
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Lead	14.7	mg/kg		0.32	1.0
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Magnesium	333	mg/kg	J	1.4	1000
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Manganese	12.7	mg/kg	J	0.078	3.1
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Nickel	54.4	mg/kg		0.26	8.2
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Potassium	146	mg/kg	J	4.0	1000
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Silver	1.0	mg/kg	UJ	0.12	1.0
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Sodium	70.1	mg/kg	J	31.0	1000
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Thallium	4.1	mg/kg	U	0.99	4.1
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Antimony	0.63	mg/kg	J	0.60	4.1
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Arsenic	33.3	mg/kg		0.65	4.1
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Barium	20.3	mg/kg	J	0.29	41
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Beryllium	0.67	mg/kg	J	0.27	0.82
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Cadmium	0.22	mg/kg	J	0.064	0.82

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Chromium	4.6	mg/kg		0.28	2.1
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Cobalt	31.5	mg/kg		0.46	10
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Copper	4.0	mg/kg	J	0.17	5.2
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Vanadium	12.1	mg/kg		0.21	10
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Zinc	14.7	mg/kg		0.23	4.1
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Calcium	4500	mg/kg	J	2.0	1000
BN-1&3-29-LT4	M59298-4	SW8466010B	09/14/06	2	Selenium	3.2	mg/kg	J	0.70	1.0
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Acetone	646	ug/kg	J	44	680
BN-1&3-29-LT4	M59298-4	EPA1603M	09/14/06	1	Solids, Percent	29.3	%			
BN-1&3-29-LT4	M59298-4	SW8467471A	09/14/06	1	Mercury	0.63	mg/kg	J	0.0091	0.040
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Ethylbenzene	5.0	ug/kg	J	0.80	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Styrene	15	ug/kg	UJ	0.84	15
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	cis-1,3-Dichloropropene	6.1	ug/kg	UJ	1.0	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	trans-1,3-Dichloropropene	6.1	ug/kg	UJ	1.0	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	1,4-Dichlorobenzene	266	ug/kg	J	1.2	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	1,2-Dichloroethane	6.1	ug/kg	UJ	0.67	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	4-Methyl-2-pentanone (MIBK)	15	ug/kg	UJ	0.96	15
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Toluene	22.4	ug/kg	J	2.3	15
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Chlorobenzene	6.1	ug/kg	UJ	1.3	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Dibromochloromethane	6.1	ug/kg	UJ	1.6	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Tetrachloroethene	6.1	ug/kg	UJ	2.8	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Xylene (total)	2.7	ug/kg	J	0.80	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	1,2-Dichloroethene (total)	6.1	ug/kg	UJ	1.9	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	1,3-Dichlorobenzene	6.1	ug/kg	UJ	1.2	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Carbon tetrachloride	6.1	ug/kg	UJ	1.1	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	2-Hexanone	15	ug/kg	UJ	1.3	15
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Chloroform	6.1	ug/kg	UJ	0.91	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Benzene	1.5	ug/kg	UJ	1.2	1.5
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	1,1,1-Trichloroethane	6.1	ug/kg	UJ	1.0	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Bromomethane	6.1	ug/kg	UJ	2.9	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Chloromethane	15	ug/kg	UJ	2.4	15
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Chloroethane	15	ug/kg	UJ	1.5	15
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Vinyl chloride	6.1	ug/kg	UJ	2.7	6.1

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Methylene chloride	6.1	ug/kg	UJ	1.4	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Carbon disulfide	74.2	ug/kg	J	2.6	15
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Bromoform	6.1	ug/kg	UJ	0.91	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Bromodichloromethane	6.1	ug/kg	UJ	0.82	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	1,1-Dichloroethane	6.1	ug/kg	UJ	1.1	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	1,1-Dichloroethene	6.1	ug/kg	UJ	1.3	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	1,2-Dichloropropane	6.1	ug/kg	UJ	2.6	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	2-Butanone (MEK)	15	ug/kg	UJ	3.5	15
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	1,1,2-Trichloroethane	6.1	ug/kg	UJ	2.3	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	Trichloroethene	6.1	ug/kg	UJ	1.2	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	1,1,2,2-Tetrachloroethane	6.1	ug/kg	UJ	1.6	6.1
BN-1&3-29-LT4	M59298-4	SW8260	09/14/06	1	1,2-Dichlorobenzene	6.1	ug/kg	UJ	1.3	6.1
BN-1&3-29-LT5	M59298-5	EPA1603M	09/14/06	1	Solids, Percent	8.0	%			
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Aluminum	8220	mg/kg	J	3.4	30
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Iron	67800	mg/kg		4.5	15
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Lead	44.1	mg/kg		0.23	0.74
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Magnesium	2100	mg/kg		1.0	740
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Manganese	1170	mg/kg	J	0.057	2.2
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Nickel	27.7	mg/kg		0.19	6.0
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Potassium	487	mg/kg	J	2.9	740
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Silver	0.19	mg/kg	J	0.088	0.74
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Sodium	193	mg/kg	J	22.0	740
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Thallium	3.0	mg/kg	U	0.71	3.0
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Antimony	3.0	mg/kg	UJ	0.43	3.0
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Arsenic	416	mg/kg	J	0.47	3.0
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Barium	33.2	mg/kg		0.21	30
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Beryllium	0.96	mg/kg		0.19	0.60
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Cadmium	1.4	mg/kg		0.046	0.60
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Chromium	13.7	mg/kg		0.20	1.5
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Cobalt	111	mg/kg		0.33	7.4
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Copper	13.3	mg/kg		0.12	3.7
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Vanadium	42.6	mg/kg		0.15	7.4
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Zinc	34.8	mg/kg		0.16	3.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Calcium	7800	mg/kg	J	1.5	740
BN-1&3-29-LT5	M59298-5	SW8466010B	09/14/06	1	Selenium	3.2	mg/kg	J	0.51	0.74
BN-1&3-29-LT5	M59298-5	SW8467471A	09/14/06	1	Mercury	0.28	mg/kg	J	0.0082	0.037
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Ethylbenzene	25	ug/kg	UJ	3.2	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Styrene	62	ug/kg	UJ	3.4	62
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	cis-1,3-Dichloropropene	25	ug/kg	UJ	4.2	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	trans-1,3-Dichloropropene	25	ug/kg	UJ	4.1	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	1,4-Dichlorobenzene	1120	ug/kg	J	4.6	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	1,2-Dichloroethane	25	ug/kg	UJ	2.7	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	4-Methyl-2-pentanone (MIBK)	62	ug/kg	UJ	3.9	62
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Toluene	62	ug/kg	UJ	9.1	62
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Chlorobenzene	25	ug/kg	UJ	5.2	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Dibromochloromethane	25	ug/kg	UJ	6.5	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Tetrachloroethene	25	ug/kg	UJ	11	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Xylene (total)	25	ug/kg	UJ	3.2	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	1,2-Dichloroethene (total)	25	ug/kg	UJ	7.7	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	1,3-Dichlorobenzene	25	ug/kg	UJ	4.9	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Carbon tetrachloride	25	ug/kg	UJ	4.3	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	2-Hexanone	62	ug/kg	UJ	5.3	62
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Acetone	10500	ug/kg	J	4.0	62
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Chloroform	25	ug/kg	UJ	3.6	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Benzene	6.2	ug/kg	UJ	4.9	6.2
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	1,1,1-Trichloroethane	25	ug/kg	UJ	4.1	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Bromomethane	25	ug/kg	UJ	12	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Chloromethane	62	ug/kg	UJ	9.6	62
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Chloroethane	62	ug/kg	UJ	6.1	62
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Vinyl chloride	25	ug/kg	UJ	11	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Methylene chloride	25	ug/kg	UJ	5.7	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Carbon disulfide	383	ug/kg	J	10	62
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Bromoform	25	ug/kg	UJ	3.7	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Bromodichloromethane	25	ug/kg	UJ	3.3	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	1,1-Dichloroethane	25	ug/kg	UJ	4.4	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	1,1-Dichloroethene	25	ug/kg	UJ	5.1	25

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	1,2-Dichloropropane	25	ug/kg	UJ	11	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	2-Butanone (MEK)	62	ug/kg	UJ	14	62
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	1,1,2-Trichloroethane	25	ug/kg	UJ	9.4	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	Trichloroethene	25	ug/kg	UJ	4.6	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	1,1,2,2-Tetrachloroethane	25	ug/kg	UJ	6.5	25
BN-1&3-29-LT5	M59298-5	SW8260	09/14/06	1	1,2-Dichlorobenzene	25	ug/kg	UJ	5.3	25
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	10	Iron	157000	mg/kg		46.0	150
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	10	Manganese	15500	mg/kg	J	0.58	23
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	10	Thallium	31	mg/kg	U	7.3	31
BN-1&3-29-LT3	M59298-6	EPA1603M	09/14/06	1	Solids, Percent	17.3	%			
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Aluminum	3010	mg/kg	J	3.4	31
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Lead	25.8	mg/kg		0.24	0.76
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Magnesium	855	mg/kg		1.0	760
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Nickel	13.3	mg/kg		0.19	6.1
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Potassium	289	mg/kg	J	3.0	760
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Silver	1.2	mg/kg	J	0.090	0.76
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Sodium	115	mg/kg	J	23.0	760
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Antimony	3.1	mg/kg	UJ	0.44	3.1
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Arsenic	27.7	mg/kg		0.48	3.1
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Barium	203	mg/kg		0.22	31
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Beryllium	0.77	mg/kg		0.20	0.61
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Cadmium	0.61	mg/kg	U	0.047	0.61
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Chromium	12.8	mg/kg		0.20	1.5
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Cobalt	34.3	mg/kg		0.34	7.6
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Copper	4.9	mg/kg		0.13	3.8
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Vanadium	20.1	mg/kg		0.15	7.6
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Zinc	22.2	mg/kg		0.17	3.1
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Calcium	12900	mg/kg	J	1.5	760
BN-1&3-29-LT3	M59298-6	SW8466010B	09/14/06	1	Selenium	5.0	mg/kg	J	0.52	0.76
BN-1&3-29-LT3	M59298-6	SW8467471A	09/14/06	2	Mercury	1.2	mg/kg	J	0.014	0.064
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Ethylbenzene	10	ug/kg	UJ	1.3	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Styrene	25	ug/kg	UJ	1.4	25
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	cis-1,3-Dichloropropene	10	ug/kg	UJ	1.7	10

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	QL
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	trans-1,3-Dichloropropene	10	ug/kg	UJ	1.7	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	1,4-Dichlorobenzene	35.9	ug/kg	J	1.9	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	1,2-Dichloroethane	10	ug/kg	UJ	1.1	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	4-Methyl-2-pentanone (MIBK)	25	ug/kg	UJ	1.6	25
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Toluene	15.2	ug/kg	J	3.8	25
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Chlorobenzene	24.2	ug/kg	J	2.2	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Dibromochloromethane	10	ug/kg	UJ	2.7	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Tetrachloroethene	50.4	ug/kg	J	4.6	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Xylene (total)	10	ug/kg	UJ	1.3	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	1,2-Dichloroethene (total)	10	ug/kg	UJ	3.2	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	1,3-Dichlorobenzene	10	ug/kg	UJ	2.0	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Carbon tetrachloride	10	ug/kg	UJ	1.8	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	2-Hexanone	25	ug/kg	UJ	2.2	25
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Acetone	6200	ug/kg	J	1.6	25
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Chloroform	10	ug/kg	UJ	1.5	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Benzene	4.7	ug/kg	J	2.0	2.5
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	1,1,1-Trichloroethane	11.3	ug/kg	J	1.7	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Bromomethane	10	ug/kg	UJ	4.8	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Chloromethane	25	ug/kg	UJ	4.0	25
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Chloroethane	25	ug/kg	UJ	2.5	25
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Vinyl chloride	10	ug/kg	UJ	4.5	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Methylene chloride	26.3	ug/kg	UJ	2.4	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Carbon disulfide	506	ug/kg	J	4.3	25
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Bromoform	10	ug/kg	UJ	1.5	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Bromodichloromethane	10	ug/kg	UJ	1.4	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	1,1-Dichloroethane	18.9	ug/kg	J	1.8	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	1,1-Dichloroethene	10	ug/kg	UJ	2.1	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	1,2-Dichloropropane	10	ug/kg	UJ	4.4	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	2-Butanone (MEK)	25	ug/kg	UJ	5.9	25
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	1,1,2-Trichloroethane	10	ug/kg	UJ	3.9	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	Trichloroethene	46.1	ug/kg	J	1.9	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	1,1,2,2-Tetrachloroethane	61.3	ug/kg	J	2.7	10
BN-1&3-29-LT3	M59298-6	SW8260	09/14/06	1	1,2-Dichlorobenzene	10	ug/kg	UJ	2.2	10

DATA VALIDATION MEMORANDUM
NAS BRUNSWICK SITE EASTERN PLUME
SEPTEMBER 2006 SAMPLING ROUND 29 (SDG M59303)

TO: ENGINEERING FACILITY COMMAND NORTHEAST

FROM: JACKSON KIKER, ECC SENIOR CHEMIST, MARLBOROUGH, MA

SUBJECT: NAS BRUNSWICK SITE EASTERN PLUME MONITORING EVENT 29

DATE: 11/13/2006

Project data were validated using the following Validation Functional Guidelines, as modified for non-CLP methods and project-specific QAPP measurement performance criteria (MPC):

1. Region I, EPA-NE Data Validation Functional Guidelines for Evaluation of Environmental Analyses (Dec, 1996),

2. National Functional Guidelines for Evaluation Inorganic Analysis (1988), and

3. National Functional Guidelines for Evaluation Organic Analysis (October 1999).

The data were assessed against the MPC listed in the approved Site 1& 3 and Eastern Plume LTMP QAPP (May 2000). The QAPP MPC and validation guideline exceedences are assessed and documented on the method/QAPP specific data validation worksheets. On these data validation worksheets the data quality acceptance criteria are presented, analytes requiring qualification based on MPC and/or validation guidance criteria exceedences are listed, assigned qualifiers, qualifying rationale is documented, and any potential bias noted. The overall evaluation of the data generated by a method is presented in the data validation worksheet.

Standard EPA Region I data qualifiers are used to denote the assessment of data quality. The final and ranking assigned data qualifier for an analyte is presented in the data summary table. Ancillary qualifiers are noted on the data validation worksheets.

The USEPA Region I Organic Regional Data Assessment (ORDA) sheet displays the summarized results of the data validation assessment for all analytical methods reported in the SDG.

ACRONYMS AND ABBREVIATIONS

Following is a list of acronyms and abbreviations that may be used in the data validation reports.

Acronym or Abbreviation	Definition
%D	Percent difference
%R	Percent recovery
%M	Percent moisture
%S	Percent solids
Ug/L	Microgram per liter
BD	Breakdown
BEHP	2-bis(ethylhexyl)phthalate
BFB	Bromofluorobenzene
CCB	Continuing calibration Blank
CCC	Continuing Check Compound
CCV	Continuing Calibration Verfication
COC	Chain of custody
CRI	standard at RL for ICP
CVAA	Cold vapor atomic absorption
DFTPP	Decafluorotriphenylphosphine
DQO	Data quality objective
EB	Equipment blank
EPA	Environmental Protection Agency
FD	Field duplicate
GC	Gas Chromatography
GC/MS	Gas chromatography/mass spectrometry
HT	Holding time
ICAL	Initial calibration
ICS-A/AB	Interelement check standard A or AB
ICV	Initial calibration verification
IDL	Instrument detection limit
IS	Internal standards
LCL	Lower control limit
LCS	Laboratory control sample
LTMP	Long term monitoring plan
MeCl	Methylene chloride
MS	Matrix spike

Acronym or Abbreviation	Definition
MSD	Matrix spike duplicate
MPC	Measurement performance criteria
NA	Not applicable
NC	Not calculated.
PAH	Polycyclic aromatic hydrocarbon
PCB	Polychlorinated biphenyls
PQL	Practical quantitation limit
QAPP	Quality Assurance Project Plan
QC	Quality control
RF	Response Factor
RPD	Relative percent difference
RRF	Relative response factor
RSD	Relative standard deviation
RT	Retention time
SDG	Sample Delivery Group
SOP	Standard Operation Procedure
SVOC	Semi-volatile organic compound
SPCC	System performance check compound
SQL	Sample Quantitation Limit
TB	Tripblank
TCX	Tetrachloro-m-xylene
TIC	Tentatively identified compound
UCL	Upper control limit
VOC	Volatile organic compound

DATA QUALIFIER REFERENCE TABLE

Data validation reports will summarize the samples reviewed, elements reviewed, any nonconformances with the established criteria, validation actions (including data qualifiers). Data qualifiers will be consistent with EPA Region I – New England guidelines and will consist of the following:

USEPA Region I – Data Qualifier	USEPA Region I – Qualifier Definition
J	The analyte was positively identified; the associated numerical value is the approximate concentration of the analyte in the sample
UJ	The analyte was not detected above the sample reporting limit; and the reporting limit is approximate
U	The sample was analyzed for, but was not detected above the sample reporting limit.
R	The sample result is rejected due to serious deficiencies. The presence or absence of the analyte cannot be verified

Region I, EPA-NE ORGANIC REGIONAL DATA ASSESSMENT

LAB NAME: Northeast Laboratory/Air Toxics Lab
SDG #:_M59303
EPA-NE DV TIER LEVEL:___II___
SITE NAME: NAS Brunswick – Site Eastern Plume

# of SAMPLES/MATRIX: VOC 5 and 2 FD; TOC 1; 1,4-Dioxane 2, 1QS (Metals, VOC, Pesticides, 1,4-Dioxane) and, 1 TB
VALIDATION CONTRACTOR:__ECC/ASW
VALIDATOR'S NAME: Sherri Pullar
DV Completion Date:_13 November, 2006
Date Sampled__18 & 19 September 2006.

ANALYTICAL DATA QUALITY SUMMARY

		VOC	Pesticides	1,4-Dioxane	Metals
1	Preservation and HT	O	O	O	O
2	Instrument Performance Check	O	O	O	O
3	Initial Calibration:	O	O	O	O
4	Continuing Calibration:	M	O	O	O
5	Blanks:	O	O	O	O
6	Surrogate Compounds:	O	O	O	-
7	Internal Standards	O	O	O	-
8	Matrix Spike/Matrix Spike Duplicate:	O	O	O	O
9	Sensitivity Check:	O	O	O	O
10	PE Samples- Accuracy Check	O	M	O	M
11	Target Compound Identification:	O	O	O	O
12	Compound Quantitation and Reported QLs	O	O	O	O
13	Tentatively Identified Compounds:	-	-	-	-
14	Semivolatile/Pesticide/PCB Cleanup:	-	-	-	-
15	Data Completeness	O	O	O	O
16	Overall Evaluation of Data:	O	O	O	O

O = Data had no problems or were qualified due to minor contractual problems; M = Data were qualified due to major/systemic MPC exceedences: Z = Data were rejected as unusable due to major contractual problems.

ACTION ITEMS: (Z items): None.

AREAS OF CONCERN: (M items):

VOC: J for all samples with estimated results <MRL but >MDL. Results for bromoform were qualified UJ in samples 2, 4, 5 ,6, 7, 8, 9, 10, & 11 due to CCV %D>MPC

Metals: J for all samples with estimated results <MRL but >MDL. Result for Hg in sample 11 was qualified UJ due to RPD >MPC.

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1,4-Dioxane: None.

Pesticides: All pesticide results in sample 11 were qualified UJ due to MSD outside MPC limit.

ECC Region I Data Review Worksheet (rv 3) **VOCs 5030B/5035/8260B**
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance

Data Validation Level	Matrix	Preservation	Temp Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**HCl**	**1 cooler – Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59303**

Field Identification and Laboratory Number of Samples Evaluated:

Field ID	Lab Sample Number
BN-EP-29-MW212-S	M59303-2
BN-EP-29-MW319D	M59303-4
BN-EP-29-MW319-M	M59303-5
BN-EP-29-MWXD4	M59303-6 (field duplicate for M59303-5)
BN-EP-29-MW331-M	M59303-7
BN-EP-29-MW311-D	M59303-8
BN-EP-29-MW-XD2	M59303-9 (field duplicate for M59303-8)
BN-EP-29-QT2	M59303-10
BN-EP-29-QS1	M59303-11

Note: Samples are described below in the data worksheets by reference to the last 2 digits of the Lab Sample Number.

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inventory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects preserved per method (amber bottles, temperature, HCl (aq), MeOH/NAHSO4 (soils) (J, UJ, or R (function of HT and compound)	Cooler temperatures < 6 ^oC. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. No samples qualified.	X	-	
Holding Time	1) 14 Days to analysis, if preserved 2) J –detects, UJ or R –nondetects (function of time) 3) *transcription errors	Analyzed within holding time.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made. 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	NA	-	-	
Lab Blanks (method blanks)	1) < 5x (<10x common) contaminants for aq samples- 2) <10X common contaminants – acetone, 2-butanone or Mecl. 1) TGT analytes <Lab QL 2) if linear range is exceeded, verify if a instrument blank was performed 3) *verify accurate transcription of times, Ids, are reported on forms 4) *verify from the raw data if the instrument blank was performed in the same vessel 5) *verify IS, RRT, and surrogate %R *check 10% of raw chromatograms for false +/-, check for transcription errors	Samples were analyzed in 1 batch: 25 Sep 06: Batch 1 with samples: 2, 4, 5, 6, 7, 8, 9, 10, & 11: No associated detection. All method blank results were non-detect for COCs. No samples qualified.	X	-	

ECC Region I Data Review Worksheet (rv 3) VOCs 5030B/5035/8260B
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
Trip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate cross matrix TB (X rules apply to raw data) 4) MeCl & Acetone < 5 5) >RL report sample level U 6) <RL report PQL as U	Aqueous tripblank: BN-EP-29-QT2 Non-detect for all LTMP TCL VOCs with the exception of acetone (7.5 ug/L). Field samples were non-detect for acetone, no samples qualified.	X	-	
Equip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate TB (X rules don't apply) 3) MeCl & Acetone < 5 *Check IS area (10% of them) * recalculate surrogate (%R – 10 % of them)	Source water blank: BN-EP-29-MW-QS1 QS1 contained chlorobenzene (0.85 ug/L). Field samples were non-detect for chlorobenzene, no samples qualified.	-	-	
Results > Cal Range or <Cal Range	6) >Upper Cal Range J-detects - ensure instrument blank performed 7) <PQL but >MDL – J –detects (estimated) listed on data summary sheet.	Attached data summary table. Analytes with results >MDL but <MRL: were qualified J.	X	J for all samples with estimated results <MRL but >MDL.	
*TICs (if reported)	1) *verify library search for samples and blanks 2) verify TICs were not misreported compounds (different fraction or miss in search) 3) All TICs – J estimated 4) * verify blanks do not contain TIC peaks 5) * check TIC assignment spectra to STD spectra 6) *review blank and Samples for common lab contaminants	None Reported/not evaluated	-	-	
Surrogates	1,2-Dichloroethane-d4 76-114% Dibromofluoromethane 86-118% Toluene-d8 88%-110% 4-BFB 86%-115% *check raw data for surrogated (recalculate 10% of them). *Transcription errors Qualification: >UCL J –detects, %R<10% J –detects, R –Nods, %R >10% but <70% J-detects, UJ NDs	All surrogate recoveries were within QAPP MPC limits. No samples qualified.	X	-	
LCS Recovery	1) Attachment A-2 of LTMP 2) All VOCs 60-140% 3) 10% and <LCL% J detects, UJ –Nods 4) >UCL% J detects <10% R NDs, J-detects 7) *Recalculate the concentrations for one compound in the LCS 8) * Recalucate the %R (within 10% of lab) Note: Tier guidance as a zero blind	All LCS recoveries were within MPC limits.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
LCSD RPD	RPD ≤20% (aq) not a QAPP required QC check. Evaluated using MS/MSD RPD criteria. J- detects	All LCS/LCSD RPDs were within MPC limits.	X	-	
*MS/MSD/unspike sample RSD	1)For unspiked compounds if reported, Non- MS spike compounds <50% RSD calculated from MS/MSD/Unspiked Qualification: >50% RSD J-detects 2)*recalculate the RPD (within 10% of lab)	NA	-	-	
*Compound Quantitation (completed as part of other steps)	1) Check sensitivy (MDL< 1/3 PQL) 2) *Recalculate one detection and quantitation limit 3) *verify concentrations have been adjusted to account for DW, DF, 4) *verifiy correct IS and RRF were used	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 8) *Matrix effects- MS/MSD, surrogated, PDS. 9) *System chromatography- evaluate RRTs, peaks shapes, system impacts on data, baseline shifts. 10) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
*TGT Compound Identification	1) *Within 0.06 (30 sec) of CCV RRT 2) * compare sample Mass spectra to standard spectra; a) all ions in std spectra (with 10% rel intensity) presnent in sample spectra. B) sample ion abundance within 20% of standard spectra. 3) *chromatogram: all peaks greater than 10% of nearest IS identified.	All detections are acceptable. No samples qualified.	X	-	
Single Blind PE	1) Qualify associated samples in PES batch PES = ND, Detects J – ND PE analytes in samples, NDs – R 11) PES > acceptance criteria – Detects in samples J, 12) PES<acceptance criteria – Detects J, NDs –R 13) VOA/SV-XI14 other criteria 14) *% of PES sample above and below criteria *Recalculate concentrations for one tgt compound per PES (10% of lab)	NA	-	-	

ECC Region I Data Review Worksheet (rv 3) VOCs 5030B/5035/8260B
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
MS/MSD Recovery	1) Attachment A-2 of LTMP 2) 60-140% for all VOCs (if MS > 4X native levels) Qualification of MS sample: <10% J detects, R NDs >10% and <LCL% J detects, UJ -NDs >UCL% J detects 3) *Recalculate the concentrations for one compound in the MS/MSD 5) * Recalculate the %R (within 10% of lab)	MS/MSD were run on the following sample: M59303-7. All MS/MSD recoveries within MPC limits.	X	-	-
MS/MSD RPD	RPD ≤20% (aq/S) (when MS >QL) J – detects in MS sample UJ-non detects * recalculate RPD	MS/MSD were run on the following sample: M59303-7. All MS/MSD RPDs were inside MPC limits. No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 30% aq. ≤ 50 soil for Results > PQL (FD pair only) J-detects (both > PQL) 2) Note: FD RPD not specified in QAPP. 30% will be used as the MPC, to be consistent with other NASB QAPPs. 3) If one >PQL, other ND, J-detections, UJ non-detect 4) Other conditions use judgement 5) Determine RPD for detects only. *Recalculate the concentrations for one compound and the PQL	Field sample Field duplicate 5 6 8 9 The FD pair 5/6; FD pair were both non-detect for VOC's. Acceptable precision. The FD pair 8/9 had RPD's inside MPC limits. Acceptable precision. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.	X	-	
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 6) * performed annually 7) *MDL is at least ½ of PQL 8) *tgt and surrogate 80-120% R *VOA/SV-X11 (recalcuate %RSD and %R for three compounds (10% of them).	NA	-	-	
Internal Stds	1) IS are –50% to 200% of last Ical, or CCV 3) RRT<0.06 (30 sec) 4) IS>100% J-detects 5) IS<20%CCV NDs – R 6) IS>20%CCV <50%CCV NDs – UJ 7) *check for IS transcription errors 8) FBZ = fluroobenzene 9) CBZ = chlorobenzene-d5 10) DCB = 1,4 dichlorobenzene-d4	Internal standards and RT's within MPC limits.	X	-	
Sensitivity	1) MDL study – 7 replicates (40 CFR) 2) Surrogates %in control limits. 3) %R <10 ND- (R) , J- detects 4) 10%> but <LCL% , judgement 5) %R>UCL% J-detects 6) QC, IS, RRT meet criteria,	Sensitivity is acceptable.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
	7) %RSD < 20% 8) MDL< MQL (3x less ideal) 9) Lab fortitied blank (see VOA/SV Part II –section X). 10) *Check and recalculate %RSDs and %R for three compounds (with 10% of lab) <u>Dilution factors for samples – impacts to sensitivity</u>				
Tune check	1) ion abundance with method limits 2) *check for co-elution /proper background subtraction 3) *compare reported data to raw data	All tunes within MPC limits.	X	-	
Initial Cal Multipoint (instrument evaluation)	1) correct calibration stds 2) within 12 hours of the tune check 3) CCCs %RSD: <30% (1,1 DCE, chloroform, 1,2dichloropropane, Toluene, EB, VC (J –detects, R or UJ NDs all samples associated with Ical) 4) SPCCs Average RRF: SPCCs Chloromethane >0.10, 1,1 DCA>0.10, bromoform >0.10, chlorobenzene>0.3, 1122TCA>0.3 (J –detects, R/UJ NDs) 5) RRF>0.05 all compounds 6) RRT < 0.06 units (all stds within 30 sec) 7) %RSD<15% for all non-CCCs or COD>0.99 *8) <u>RRF exclusions: surrogates, acetone, MeCL, chloroethane/methane, CS, 1,/22/03 2-butanone, 1,2 dichloropropane, 2-hexanone (IV-8)./</u>* 9) *verify that instrument parameters met method and that Ical and analysis used the same parameters 10) *recalculate RRF one tgt compound associated with each IS. Recalculated values within 10% of lab values. 11) *recalculate one tgt compound associated with each IS. Recalculated values within 10% 12) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 13) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument; GCMSN 19 Sep 2006 All RRF's within MPC limits for all VOC's of concern. All CCCs are in MPC. All SPCC are in MPC.	X	-	
Initial Cal (Linearity)	%RSD < 15% use average RF for calibration %RSD> 15% use least squares COD (r2) > 0.990 or correlation coefficient r> 0.995 Qualification for compounds with : %RSD>30% and RRF>0.05 – J detects, UJ - NDs %RSD<30% and RRF<0.05; -J detects, R - ND %RSD>30% and RRF<0.05: J detects, R - ND (see VOA/SVIII-4)	Instrument; GCMSN 18 Sep 2006 All %RSD < 30 or were fitted with linear or quadratic curves. These curves were provided by the laboratory for evaluation. No samples qualified.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
2nd Source ICV	QC check nor criteria not specified in QAPP. %D<25% or %R (between ICV and Ical) analytes 80%--120% (+ or -) once per 5 pt cal used to evaluate data sets. Qualification: J detects, R or UJ NDs	Instrument; GCMSN 18 Sep 2006 All %D's within MPC limits for all VOC's of concern.	X	-	
CCV	1) SPCCs Average RRF: SPCCs Chloromethane >0.10, 1,1 DCA>0.10, bromoform >0.10, chlorobenzene>0.3, 1122TCA>0.3 2) RRF all compounds > 0.05 3) CCC: (1,1 DCA, chloroform, 1,2dichloropropane, Toluene, EB, VC) %D<20% (or all analytes if no CCCs reported). 4) Qualification-J detects, R or UJ NDs 5) *verify same instrument and parameters 6) *Recalculate RRF for one tgt cmpd associated with each IS. (within 10%) 7) *Recalculate %D for one tgt cmpd associated with each IS (within 10%) 8) *IS RRT<0.06 units (30 sec) 9) * IS area -50 % to 100 % of last ICAL 10) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 11) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument; GCMSN 25 Sep 2006 bromoform has %D>MPC.	X	Results for bromoform were qualified UJ in samples 2, 4, 5 ,6, 7, 8, 9, 10, & 11.	
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Laboratory precision and accuracy are acceptable. LCS %R's inside MPC limits. All MS/MSD recoveries within MPC limits. Surrogates were inside MPC limits. Aqueous tripblank: BN-EP-29-QT2 Non-detect for all LTMP TCL VOCs with the exception of acetone (7.5 ug/L). Field samples were non-detect for acetone, no samples qualified. Source water blank: BN-EP-29-MW-QS1 QS1 contained chlorobenzene (0.85 ug/L). Field samples were non-detect for chlorobenzene, no samples qualified. J for all samples with estimated results <MRL but >MDL. The reported MRL's and MDL's provide adequate sensitivity to support evaluation	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
		against MEG and MCL's for all compounds except vinyl chloride. Tune checks within MPC limits. ICALs: SPCC was inside MPC limits. ICV: within limits with the exception of chlormethane. CCV: bromoform was outside the limits. Method blank samples were non-detect for all VOCs. Sampling Error Evaluation: Tripblank was non-detect for all VOCs with the exception of ethylbenzene, toluene, total xylene, acetone, benzene, & MeCl. Field sample Field duplicate 5 6 8 9 The FD pair 5/6; FD pair were both non-detect for VOC's. Acceptable precision. The FD pair 8/9 had RPD's inside MPC limits. Acceptable precision. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.			

* Tier III review items only.

Completeness Check: Inventory Check Sheet_____X__. Sample Quantitation Calculations (TIER III only):

Lab Correspondence: None.

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

5030/5035/8260BSIM 1,4 Dioxane
Review Criteria: Region I Tier II Guidance and EIASOP-VOADIOX1(5/21/03)

Data Validation Level	Matrix	Preservation	Temp Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**None**	**Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59303**

Field Identification and Laboratory Number of Samples Evaluated:

Field ID	Lab Sample Number
BN-EP-29-MW212	M59303-1
BN-EP-29-MW212-S	M59303-3
BN-EP-29-QT2	M59303-10A
BN-EP-29-QS1	M59303-11A

Note: Samples are described below in the data worksheets by reference to the last three digits of the Lab Sample Number.

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° 3) Unpreserved 4) No headspace	Cooler temperatures < 6 ^oC. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. No samples qualified.	X	-	
Holding Time	1) 14 Days to analysis, 2) J –detects, UJ or R –nondetects (function of time) 3) *transcription errors	All samples analyzed within holding time. No samples qualified.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made. 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	Not applicable	-	-	
Surrogates	Surrogate; 1,4 dioxane-D8 : 60-140% *check raw data for surrogated (recalculate 10% of them). *Transcription errors Qualification: >UCL J –detects, %R<10% J –detects, R –Nods, %R >10% but <70% J-detects, UJ NDs	All reported surrogate recoveries for field samples within MPC limits.	X	-	
Lab Blanks (method blanks)	1) < 5x (<10x common) contaminants for aq samples- 2) <10X common contaminants – acetone, 2-butanone or Mecl. 1) TGT analytes <Lab QL 2) if linear range is exceeded, verify if a instrument blank was performed 3) *verify accurate transcription of times, Ids, are reported on forms 4) *verify from the raw data if the instrument blank was performed in the same vessel 5) *verify IS, RRT, and surrogate %R 6) *check 10% of raw chromatograms for false +/-, check for transcription errors	Associated method blanks were non-detect for 1,4 Dioxane.	X	-	

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

5030/5035/8260BSIM 1,4 Dioxane
Review Criteria: Region I Tier II Guidance and EIASOP-VOADIOX1(5/21/03)

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
Trip Blank	1) < 5x contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate cross matrix TB (X rules apply to raw data) 4) MeCl & Acetone < 5 5) >RL report sample level U 6) <RL report PQL as U	Aqueous trip blank BN-EP-29-MW-QT2 Non-detect for 1,4-dioxane.	X	-	
Equip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate TB (X rules don't apply) 3) MeCl & Acetone < 5 *Check IS area (10% of them) * recalculate surrogate (%R – 10 % of them)	Source water blank BN-EP-29-MW-QS2 Non-detect for 1,4-dioxane.	-	-	
Results > Cal Range or <Cal Range	7) >Upper Cal Range J-detects - ensure instrument blank performed 8) <PQL but >MDL – J –detects (estimated) listed on data summary sheet.	All sample were non-detect for 1,4-dioxane.	X	-	
LCS Recovery	1) 1,4 Dioxane 60-140% 2) 10% and <LCL% J detects, UJ –Nods 3) >UCL% J detects <10% R NDs, J-detects 7) *Recalculate the concentrations for one compound in the LCS 8) * Recalucate the %R (within 10% of lab) Note: Tier guidance as a zero blind	All LCS %R's are within MPC limits. No samples qualified.	X	-	
LCS/LCSC RPD	RPD ≤20% (aq) (when MS >QL) Not a method specified QC check.	LCS/LCSD RPD <20%. Laboratory accuracy is acceptable	x	-	
MS/MSD Recovery	1) 60-140% for all VOCs (if MS > 4X native levels) Qualification of MS sample: <10% J detects, R NDs >10% and <LCL% J detects, UJ -NDs >UCL% J detects 3) *Recalculate the concentrations for one compound in the MS/MSD 4) * Recalucate the %R (within 10% of lab)	Native sample was sample M59303-1. All MS/MSD recoveries within MPC. No sample qualifications.	-	-	
MS/MSD RPD	RPD ≤20% (aq/S) (when MS >QL) J –detects in MS field sample UJ-non detects * recalculate RPD	Native sample was sample M59303-1. MS/MSD RPD inside MPC. No sample qualifications.	-	.	
Field Dup RPD	1) RPD ≤ 30% aq. soil for Results > PQL (FD pair only) J-detects (both > PQL) 2) Note: FD RPD not specified in QAPP. 30% will be used as the MPC, to be consistent with other NASB QAPPs. 3) If one >PQL, other ND, J-detections, UJ non-detect	Field duplicates were not collected in this SDG.	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
	4) Other conditions use judgement 5) Determine RPD for detects only. 5) *Recalculate the concentrations for one compound and the PQ				
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 6) * performed annually 7) *MDL is at least ½ of PQL 8) *tgt and surrogate 80-120% R 9) *VOA/SV-X11 (recalcuate %RSD and %R for three compounds (10% of them).	NA	-	-	
Internal Stds	1) IS are –50% to 200% of last Ical, or CCV 3) RRT<0.06 (30 sec) 4) IS>100% J-detects 5) IS<20%CCV NDs – R 6) IS>20%CCV <50%CCV NDs – UJ 7) *check for IS transcription errors 8) FBZ = fluroobenzene 9) CBZ = chlorobenzene-d5 10) DCB = 1,4 dichlorobenzene-d4	All IS %R's are within MPC limits for all field samples. No field samples qualified.	X	-	
Sensitivity	1) MDL study – 7 replicates (40 CFR) 2) Surrogates %in control limits. 1) %R <10 ND- (R) , J- detects 2) 10%> but <LCL% , judgement 3) %R>UCL% J-detects 6) QC, IS, RRT meet criteria, 7) %RSD < 20% 8) MDL< MQL (3x less ideal) 9) Lab fortitied blank (see VOA/SV Part II –section X). 10) *Check and recalculate %RSDs and %R for three compounds (with 10% of lab) 11) <u>Dilution factors for samples – impacts to sensitivity</u>	The MRL is 1.00 ppb (ug/L) which is consistent with the EPA Region I method. Sensitivity is acceptable. The site action limit is not in the QAPP, but is ca. 35 ppb. The project sensitivity is acceptable.	X	-	
*Compound Quantitation (completed as part of other steps)	1) Check sensitivy (MDL< 1/3 PQL) 2) *Recalculate one detection and quantitation limit 3) *verify concentrations have been adjusted to account for DW, DF, 4) *verifiy correct IS and RRF were used	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 9) *Matrix effects- MS/MSD, surrogated, PDS. 10) *System chromatography- evaluate RRTs, peaks shapes, system impacts on data, baseline shifts. 11) *overall system contamination-review all	NA	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
	blanks for systemic or sporadic contamination				
*TGT Compound Identification	1) *Within 0.06 (30 sec) of CCV RRT 2) * compare sample Mass spectra to standard spectra; a) all ions in std spectra (with 10% rel intensity) presnent in sample spectra. B) sample ion abundance within 20% of standard spectra. 3) *chromatogram: all peaks greater than 10% of nearest IS identified.	NA	X	-	
Single Blind PE	1) Qualify associated samples in PES batch PES = ND, Detects J – ND PE analytes in samples, NDs – R 12) PES > acceptance criteria – Detects in samples J, 13) PES<acceptance criteria – Detects J, NDs –R 14) VOA/SV-XI14 other criteria 15) *% of PES sample above and below criteria 16) *Recalculate concentrations for one tgt compound per PES (10% of lab)	NA	-	-	
Tune check	1) ion abundance with method limits 2) *check for co-elution /proper background subtraction 3) *compare reported data to raw data	All tunes passed. No samples qualified.	X	-	
Initial Cal Multipoint (instrument evaluation)	1) correct calibration stds 2) within 12 hours of the tune check 3) RRF criteria not part of method. This VOC fall under the *RRF exclusions of Section (IV-8) Tier II guidance.* 4) %RSD<30% Qualification for compounds with : %RSD>30%	Instrument MSM 18 July 2006 Applies to all samples %RSD>30% calibration.	X	-	
2nd Source ICV	QC check nor criteria not specified in QAPP nor analytical SOP. %D<25% or %R (between ICV and Ical) analytes 80%--120% (+ or -) once per 5 pt cal used to evaluate data sets. Qualification: J detects, R or UJ NDs	Instrument MSM 18 July 2006 All %D's within MPC limits for all VOC's of concern.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
CCV	1) %D>30% 2) before analysis and every 12 hours. 3) Qualification-J detects, R or UJ NDs 4) *verify same instrument and parameters 5) *Recalculate RRF for one tgt cmpd associated with each IS. (within 10%) 6) *Recalculate %D for one tgt cmpd associated with each IS (within 10%) 7) *IS RRT<0.06 units (30 sec) 8) * IS area -50 % to 100 % of last ICAL 9) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 10) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument MSM 25 September 2006 All %D's with MPC limits.	X	-	
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Laboratory is accuracy acceptable, as the laboratory LCS/LCSD and MS/MSD are within limits. No matrix bias. Surrogates were inside MPC limits. MS/MSD RPD's were inside MPC limits for 1,4-dioxane. Method blanks were non-detect for 1,4 Dioxane. Aqueous tripblank QT-2 and source water blank QS-1 were non-detect for 1,4-dioxane. Tune check passed. ICAL; within MPC . ICV: within MPC for %drift CCV: samples analyzed within 12-hours of ICal. Post CCV had acceptable %Drift for 1,4 dioxane. CCV Area% inside MPC limits for 1,4-dioxane. Field Precision: Not accessed; field duplicates were not collected in this SDG.	X	-	

* Tier III review items only.

Completeness Check: Inventory Check Sheet_____X__. Sample Quantitation Calculations (TIER III only):

ECC Region I Data Review Worksheet (rv 3) Pesticides 3510C/3545/8081A
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance

Data Validation Level	Matrix	Preservation	Temperature Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**-**	**1 batch – all temps < 6°C**	**Accutest Laboratories Marlborough, MA**	**SDG: M59303**

Field Identification of Samples Evaluated:

Field ID	Lab Sample Number
BN-EP-29-QS1	M59303-11

Note: Samples are described below in the data worksheets by reference to the last few digits of the Lab Sample Number

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects 3) preserved per method (amber bottles, temperature. J, UJ, or R (function of HT and compound)	Cooler temperatures < 6 °C. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. Sample preservation within limits. No samples qualified.	X	-	
Holding Time	1) 7 days to extract (14 days for solids) and 40 days to analysis J –detects, UJ or R – nondetects (function of time)	All samples extracted and analyzed within holding time. No samples qualified.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made (no USACE) 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	%Solids >30%. No samples qualified.	-	-	
Results > Cal Range or <Cal Range	1) >Upper Cal Range J-detects - ensure instrument blank performed 2) <PQL but >MDL – J –detects (estimated)	Attached data summary table. Analytes with results >MDL but <MRL were qualified J. No results exceeding upper calibration range. No samples qualified.	X	-	
Equip Blank	< 5x (<10x common) contaminants for aq samples – for soil indicate EB (X rules don't apply)	Source water blank BN-EP-29-MW-QS1 Non-detect for pesticides.	-	-	
Surrogates	Surrogate acceptance limits not specified in the LTMP. Use laboratory statistical limits. TMX 30-150% DCB 30-150% Qualification: >UCL J –detects, %R<10% J –detects, R –NDs, %R >10% but <60% J-detects, UJ NDs	All surrogate recoveries within MPC limits. No sample qualifications.	X	-	
Lab Blanks (method blanks)	1) < 5x (<10x common) contaminants – U 2) analytes <lab PQL (contract lab)	Method blank was non-detect for pesticides. No sample qualifications.	X	-	

ECC Region I Data Review Worksheet (rv 3) Pesticides 3510C/3545/8081A
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
LCS Recovery	1) QAPP limits 10% and <LCL% J detects, UJ -NDs >UCL% J detects <10% R NDs, J-detects Attachment A-2 LTMP; Gamma-BHC (Lindane) 56-123% Heptachlor 40-131% Aldrin 40-120% Dieldrin 52-126% Endrin 56-121% 4,4'-DDT 38-127%	All LCS recoveries within MPC limits. No sample qualifications.	X	-	-
MS/MSD Recovery	1) QAPP limits (if MS > 4X native levels) Qualification of MS sample: <10% J detects, R NDs >10% and <LCL J detects, UJ -NDs >UCL J detects Attachment A-2 LTMP; Gamma-BHC (Lindane) 56-123% Heptachlor 40-131% Aldrin 40-120% Dieldrin 52-126% Endrin 56-121% 4,4'-DDT 38-127%	Native samples – M59274-6 All MS recoveries within MPC limits. All MSD recoveries were below MPC limits. Laboratory states that "Sample formed emulsion on extraction." " Results were verified by reanalysis." All pesticide results in sample 11 were qualified UJ.	X	All pesticide results in sample 11 were qualified UJ.	-
MS/MSD RPD	MS/MSD RPD per QAPP Attachment A-2 Gamma-BHC (Lindane) <15% Heptachlor <20% Aldrin <22% Dieldrin <18% Endrin <21% 4,4'-DDT <27%% J –detects in MS sample UJ-non detects	Native samples – M59274-6 All MS/MSD RPD's were outside MPC limits. Sample results were qualified due to MSD recoveries below MPC limits.	X	-	
Cleanup Performance Check (if performed)	%R< 10% NDs-R detections J %R>10% <LCL (80%GPC) –detections J, NDs UJ %R>UCL (120%) – detections J Retention Time shift <5%, symmetrical peakshape. GPC check with interferants. Good surrogate recovery, GPC blank check – no carryover.(VOA/SV-IX-I6). Sulfur and High MW compounds removed. SW-846 clean-up not required	NA	-	-	
Retention times	Within 3X standard deviation for each analyte from 72-hour study Exceeds: R qualify data	No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 50% soil and <30% waters for Results >2X PQL (FD pair only) J-detects (both > X PQL) 2) If one >2X PQL, other ND, J-detections, UJ non-detect Other conditions use judgement	Field duplicates were not collected in this SDG.	X		

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
DDT Degradation check	Degradation Breakdown (BD) Check every 12 hours and prior to sample analysis. DDT Breakdown: <15% for all checks associated with samples. Endrin Breakdown: <15% for check prior to sample analysis. If BD>15% J detects Endrin/DDT.	Instrument: GCBB. Endrin breakdown within MPC limits for all applicable samples. DDT breakdown outside MPC limits. No detected results, no samples qualified.	X	-	
Initial Cal (Linearity)	Correct calibration stds %RSD < 20% use average RF for calibration %RSD> 20% use least squares COD (r2) > 0.990 or correlation coefficient r> 0.995 or alternatively mean %RSD <20% for all target analytes, with no analyte %RSD>40%	Instrument: GCBB. Dates: September 29, 2006. RSD<20% or COD >0.99 for both columns. No sample qualifications. Instrument: GCBB. Dates: October 03, 2006. RSD<20% or COD >0.99 for both columns. No sample qualifications.	X	-	
2nd Source ICV	%R (between ICV and Ical) analytes %D ≤ 15%, (+ or -) once per 5 pt cal Qualification: J detects, R or UJ NDs	Instrument: GCBB. Dates: September 30, 2006. All %D's and/or Area%'s within MPC limits for pesticides's of concern with the exception of 4,4'-DDT and methoxychlor on the first column and hexachlorobenzene, gamma-BHC, beta-BHC, aldrin, heptachlor epoxide, gamma-chlordane, alpha-chlordane, endosulfan-I, 4,4'-DDE, dieldrin, 4,4'-DDT, endosulfan sulfate, & DCB on the second column. Instrument: GCBB. Dates: October 04, 2006. All %D's and/or Area%'s within MPC limits for pesticides's of concern with the exception of heptachlor, endrin aldehyde, methoxychlor on column 1 and heptachlor, endrin, 4,4'-DDT, endrin aldehyde, and methoxychlor. All sample results were qualified UJ due to MSD recoveries below MPC limits.	X	-	

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
CCV	1) QAPP: 15% of initial calib. Curve (85%-115%) . J qualify data. 2) Qualification-J detects, R or UJ NDs	Instrument: GCBB. Dates: September 30, 2006. .All %D's were within MPC limits in both columns with the exception of methoxychlor (16.8% Dev) and 4,4'-DDT (119% area) on Signal #2. Instrument: GCBB. Dates: September 30, 2006. .All %D's were within MPC limits with the exception of heptachlor, endosulfan-I, 4,4'-DDD, 4,4'-DDT, endrin aldehyde, endrin ketone, and DCB on column one and heptachlor, 4,4'-DDD, 4,4'-DDT, endrin aldehyde, methoxychlor, and endrin ketone on the second column. Instrument: GCBB. Dates: September 30, 2006. .All %D's were within MPC limits with the exception of alpha-BHC, gamma-BHC, heptachlor, delta-BHC, dieldrin, 4,4'-DDD, 4,4'-DDT, and endrin aldehyde on first column and alpha-BHC, gamma-BHC, beta-BHC, heptachlor, delta-BHC, aldrin, heptachlor epoxide, gamma-chlordane, alpha-chlordane, endosulfan-I, 4,4'-DDE, dieldrin, 4,4'-DDD, endosulfan-II, 4,4'-DDT, endrin aldehyde, endosulfan sulfate, methoxychlor, and endrin ketone on second column. All sample results were qualified UJ due to MSD recoveries below MPC limits.	X	-	
Compound Quantitation	1) Check sensitivy (MDL< 1/3 PQL or per QAPP 2) %D <25% primary and secondary column identification and quantitation 3) Target compounds by 8081 Lindane PQL 0.05 ug/L MCL/MEG 0.2 4,4' DDT PQL 0.02 ug/L MEG/0.83	No compounds detected. No sample qualifications.	X	-	
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	The laboratory results, as qualified, are usable for making project decisions. All surrogate, and LCS were within MPC limits. All sample results were qualified UJ due to MSD recoveries below MPC limits. MS/MSD RPD's were outside MPC limits for all compounds. ICAL and ICV are within MPC limits for all samples. DDT breakdown outside MPC limits. ICAL: COD within limits. ICV: in limits CCV: mulitiple compounds were out, but all sample results were qualified due to	X	-	-

REVIEW ITEMS	MEASUREMENT PERFORMANCE CRITERIA (MPC)	SAMPLES AFFECTED	Inven-tory	QUAL	BIAS
		MS/MSD %R. No method blank detections. Source water blank QS-1 was non-detect for pesticides. No field duplicates were collected in this SDG.			

*(Tier III check items) Completeness Check: Inventory Check Sheet_____X__ Sample Quantitation Calculations (TIER III ONLY):

Lab Correspondence: None.

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

Metals 6010B/7041/7470A/7471A/7740/7841
Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

Data Validation Level	Matrix	Preservation	Temperature Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**Nitric Acid**	**1 cooler – Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59303**

Field Identification of Samples Evaluated:

Field ID	Lab Sample Number
BN-EP-29-QS1	M59303-11

Note: Samples are described below in the data worksheets by reference to the last three digits of the Lab Sample Number

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects 3) preserved per method (amber bottles, temperature. J, UJ, or R (function of HT and compound)	Cooler temperatures <6°C. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. Sample preservation within limits. No samples qualified.	X	-	
Holding Time	1) 180 days (6010), Hg 28 Days to analysis 2) J –detects, UJ or R –nondetects (function of time)	All samples analyzed within holding time. No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 30% water and ≤ 50 soil (no QAPP Criteria) for Results > X PQL (FD pair only) J-detects (both > X PQL) 2) If one >X PQL, other ND, J-detections, UJ non-detect	No field duplicate sample collected for this SDG.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs –R	NA	X	-	
Results > Cal Range or <Cal Range	1) >Upper Cal Range J-detects - ensure instrument blank performed 2) <MRL but >MDL – J –detects (estimated)	Analytes <MRL but >IDL are qualified J	X	Analytes <MRL but >IDL are qualified J	

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

Metals 6010B/7041/7470A/7471A/7740/7841
Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
Lab Blanks (method blank or preparation blank)	1) Once per sample batch 2) Results > QL; sample results <5X ; sample result U (nd) 3) Sample results >5X blank level; no action	Preparation blanks were non-detect for all metals.	X	-	
LCS Recovery	1) once per sample batch 2) 80-120% ICP metals and Hg. 3) <LCL% Reject 4) >UCL% detects J	All LCS %R's were within MPC limits. No samples qualified. Laboratory precision is acceptable.	X	-	
LCS/LCSD RPD	1) RPD<20%	All 6010B/Hg- LCS/LCSD RPDs are within MPC limits.	X		
MS Recovery	1) 75-125% ICP metals and Hg if MS > 4X native levels) Qualification of MS sample: 2) <30% J detects, R NDs 3) 30%--74%, detects J, NDs UJ 4) >125% J detects	Field samples M59274-11 used for MS. MS %R within MPC limits, no qualified samples. Field samples M59274-6 used for MS. MS %R >MPC limits for Hg. No sample qualified since native sample was non-detect.	X	-	
MS/MSD RPD	MS/MSD RPD<20%	All 6010B, 6020, & Hg MS/MSD RPDs within limits. Laboratory precision is acceptable.	X	-	
Laboratory Replicate RPD	RPD < 20% No QAPP criteria provided	Field sample: M59274-11 used for lab replicate. All RPDs within limits with the exception of Hg. Laboratory precision is acceptable.	X	Result for Hg in sample 11 was qualified UJ.	
Sensitivity*	1) MDL study – 7 replicates (40 CFR) 2) check and recalculate %RSDs and %R fir three compounds (with 10% of lab)	All results in calibration range. No dilutions required.	X	-	
Equip Blank	< 5x contaminants for aq samples – for soil indicate EB (X rules don't apply)	Source water blank BN-EP-29-MW-QS1 Low level results for Pb, K, Na, Zn, and Ca were detected in the source water blank.	-	-	
Negative blanks	If negative values are reported for an analyte with absolute value >DL and sample value is <5X the absolute value of the blank or is nondetect Qualify detects as estimated (J) Nondetects as estimated (UJ)	No negative blank detections. No samples qualified.	X	-	

ECC Region I Data Review Worksheet (rv 3) **Metals 6010B/7041/7470A/7471A/7740/7841**
Project: NAS Brunswick ECC Job No. 5700 **Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG**

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
Initial Cal Multipoint	1) Blank and 3 standards covering range of instrument. 2) high standard verification +/- %5 3) Hg 5-point calibration COD>0.99	ICP-AES samples. All COD's > 0.99 in all initial calibration runs for all methods. No sample qualifications. Hg ICaL within limits.	X	-	
Initial Calibration Blanks (ICB)	1) Ical blank after Ical 2) Results > QL; sample results <5X ; sample result U (nd) 3) Blank concentrations < project RLs 4) Sample results >5X blank level; no action 5) ABS >RL then J qualify data	No 6010B/Hg ICB detections – no samples qualified.	X	-	
Continuing Calibration Blanks (CCB)	1) CCB every 10 samples end of run 2) Blank concentrations < project RLs 3) Results > QL; sample results <5X ; sample result U 4) Sample results >5X blank level; no action ABS >RL then J qualify data.	No 6010B/Hg CCB detections – no samples qualified.	X	-	
Serial Dilution	1) once per digestion batch 2) Not required per QAPP- no criteria provided. 3) %D<10% 4) %D not evaluated if element results is <50X IDL 5) J detects, UJ non-detects.	Field sample M59141-6 for SD. %D's within MPC limits with the exception of Co, Cu, Sb, Se, Tl, and K. Native sample results for Co, Cu, Sb, Se, Tl, and K were <50X IDL, no samples qualified.	X	-	
Interelement checks ICS-A, ICS-AB Instrument performance check	1) start of sequence 2) 80-120% target analytes 3) >120% ; detects J (ICS-AB) 4) 50%-79% R ICS-AB; detects J, NDs – UJ 5) <50% R – reject data 6) ICS-A response > DL and samples have <5X ICS-A response: detects J (if DL is <10 ug/l use 2X DL). 7) Absolute value of negative ICS-A response>DL and sample detects <5X ICS-A response: detects J, NDs as UJ 8) If the ICS-A is within limits, the ICS-AB may not be analyzed (USACE Shell)	Both ICS-A and ICS-AB %R's within MPC limits for all runs.	X	-	
2nd Source ICV	1) following calibration 2) 90- 110% Recovery (6010/7000) 3) 75%-89% R – detects J, NDs – UJ 4) 111-125% R – detects J 5) outside 75-125% R – reject data (R) Hg 80-120%	6010B/6020/Hg ICV %R's within MPC limits the initial calibration. No samples qualified.	X	-	
CCV	1) every 10 samples and end of run 2) 90- 110% Recovery (6010) Hg; 80-120% 3) 6010: 75%-89% R Hg, 65-79% R; – detects J, NDs – UJ. 4) 6010: 111-125%, Hg: 121-135% detects J 6010: outside 75-125%, Hg; outside 65-135%; R – reject data (R)	6010B/6020/Hg CCV %R's within MPC limits. No samples qualified.	X	-	
Post Digestion Spike	1) Analyze if MS >MPC (QAPP) 2) 85- 115%R (QAPP Attachment A-1)	M59141-6 used for PDS. All %R within limits No apparent matrix bias. No samples qualified.	X	-	

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

Metals 6010B/7041/7470A/7471A/7740/7841
Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 3) * performed annually 4) *MDL is at least ½ of PQL *tgt and surrogate 80-120% R	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 3) *Matrix effects- MS/MSD, surrogated, PDS. 4) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
Tune Check	Within Method limits.	NA	-		
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Method 6010B; metals except for Hg. The LCS %R;s are within limits. MS/MSD %R and RPDs within limits. The LCS/LCSD RPDs were within limits. All RPDs within limits with the exception of mercury. Laboratory precision is acceptable as determined by the laboratory duplicate. Hg. analytical precision and accuracy within MPC limits. Lab preparation blank; non-detected for all analytes. ICAL: COD within limits. ICV: in limits CCV: in limits Sampling Error Evaluation: No field duplicate collected for this SDG.	X	-	

*TIER III DATA VALIDATION ONLY Completeness Check: Inventory Check Sheet___X_Sample Quantitation Calculations (TIER III DATA VALIDATION ONLY):

FIELD DUPLICATE WORKSHEET

SDG: M59303

Field Sample Id	Analyte	Analytical Method	Result	Units	Qualifier	Field Duplicate Id	Result	Units	Qaulifier	FD RPD (%)
BN-EP-29-MW311-D	Tetrachloroethene	SW8468260B	17.0	ug/l		BN-EP-29-MW-XD2	15.3	ug/l		10.5
BN-EP-29-MW311-D	1,1,1-Trichloroethane	SW8468260B	4.5	ug/l		BN-EP-29-MW-XD2	4.6	ug/l		2.2
BN-EP-29-MW311-D	Trichloroethene	SW8468260B	3.4	ug/l		BN-EP-29-MW-XD2	3.8	ug/l		11.1

NAS BRUNSWICK- EASTERN PLUME – SEPTEMBER 2006
DATA SUMMARY TABLE –SDG M59303

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW212	M59303-1	SW8468260BBYSIM	09/18/06	1	1,4-Dioxane	1.0	ug/l	U	0.22	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	4,4'-DDT	0.021	ug/l	UJ	0.0078	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	Methoxychlor	0.021	ug/l	UJ	0.0078	0.021
BN-EP-29-MW-QS1	M59303-11	SW8466020	09/19/06	2	Lead	1.2	ug/l		0.044	1.0
BN-EP-29-MW-QS1	M59303-11	SW8466020	09/19/06	2	Thallium	1.0	ug/l	U	0.17	1.0
BN-EP-29-MW-QS1	M59303-11	SW8466020	09/19/06	2	Antimony	4.0	ug/l	U	0.24	4.0
BN-EP-29-MW-QS1	M59303-11	SW8466020	09/19/06	2	Arsenic	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW-QS1	M59303-11	SW8466020	09/19/06	2	Selenium	10	ug/l	U	0.61	10
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	Heptachlor epoxide	0.021	ug/l	UJ	0.0094	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	Endosulfan sulfate	0.021	ug/l	UJ	0.0098	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	Aldrin	0.021	ug/l	UJ	0.0073	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	alpha-BHC	0.021	ug/l	UJ	0.0065	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	beta-BHC	0.021	ug/l	UJ	0.0094	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	delta-BHC	0.021	ug/l	UJ	0.013	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	Endosulfan-II	0.021	ug/l	UJ	0.0085	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	alpha-Chlordane	0.021	ug/l	UJ	0.0059	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	gamma-Chlordane	0.021	ug/l	UJ	0.0059	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	gamma-BHC (Lindane)	0.021	ug/l	UJ	0.010	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	Dieldrin	0.021	ug/l	UJ	0.0070	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	Endrin	0.021	ug/l	UJ	0.014	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	4,4'-DDD	0.021	ug/l	UJ	0.010	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	4,4'-DDE	0.021	ug/l	UJ	0.011	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	Endrin aldehyde	0.021	ug/l	UJ	0.0088	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	Heptachlor	0.021	ug/l	UJ	0.0095	0.021
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	Toxaphene	1.1	ug/l	UJ	0.025	1.1
BN-EP-29-MW-QS1	M59303-11	SW8468081	09/19/06	1	Endosulfan-I	0.021	ug/l	UJ	0.0094	0.021
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Aluminum	200	ug/l	U	23.0	200
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Iron	100	ug/l	U	30.0	100
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Magnesium	5000	ug/l	U	6.9	5000
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Manganese	15	ug/l	U	0.38	15

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Nickel	40	ug/l	U	1.3	40
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Potassium	163	ug/l	J	20.0	5000
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Sodium	377	ug/l	J	150	5000
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Barium	200	ug/l	U	1.4	200
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Chromium	10	ug/l	U	1.3	10
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Cobalt	50	ug/l	U	2.2	50
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Copper	25	ug/l	U	0.83	25
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Vanadium	50	ug/l	U	1.0	50
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Zinc	4.4	ug/l	J	1.1	20
BN-EP-29-MW-QS1	M59303-11	SW8466010B	09/19/06	1	Calcium	65.5	ug/l	J	9.8	5000
BN-EP-29-MW-QS1	M59303-11	SW8467470A	09/19/06	1	Mercury	0.20	ug/l	UJ	0.045	0.20
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Chlorobenzene	0.85	ug/l	J	0.40	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Chloroform	1.0	ug/l	U	0.59	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW-QS1	M59303-11	SW8468260B	09/19/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW-QS1	M59303-11A	SW8468260BBYSIM	09/19/06	1	1,4-Dioxane	1.0	ug/l	U	0.22	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	Trichloroethene	7.3	ug/l		0.74	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW212-S	M59303-2	SW8468260B	09/18/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW332	M59303-3	SW8468260BBYSIM	09/18/06	1	1,4-Dioxane	1.0	ug/l	U	0.22	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Tetrachloroethene	25.7	ug/l		0.54	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW319D	M59303-4	SW8468260B	09/18/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW319-M	M59303-5	SW8468260B	09/18/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW-XD4	M59303-6	SW8468260B	09/18/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Tetrachloroethene	14.9	ug/l		0.54	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	1,1,1-Trichloroethane	4.2	ug/l		0.40	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	Trichloroethene	3.6	ug/l		0.74	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW311-M	M59303-7	SW8468260B	09/18/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Tetrachloroethene	17.0	ug/l		0.54	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Benzene	0.50	ug/l	U	0.44	0.50

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	1,1,1-Trichloroethane	4.5	ug/l		0.40	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	Trichloroethene	3.4	ug/l		0.74	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW311-D	M59303-8	SW8468260B	09/18/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Tetrachloroethene	15.3	ug/l		0.54	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	1,1,1-Trichloroethane	4.6	ug/l		0.40	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	Trichloroethene	3.8	ug/l		0.74	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW-XD2	M59303-9	SW8468260B	09/18/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	1,4-Dioxane	25	ug/l	U	9.1	25

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Acetone	7.5	ug/l		1.0	5.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Bromoform	1.0	ug/l	UJ	0.58	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-QT2	M59303-10	SW8468260B	09/19/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-QT2	M59303-10A	SW8468260BBYSIM	09/19/06	1	1,4-Dioxane	1.0	ug/l	U	0.22	1.0

DATA VALIDATION MEMORANDUM
NAS BRUNSWICK SITE EASTERN PLUME
SEPTEMBER 2006 SAMPLING ROUND 29 (SDG M59391)

TO: ENGINEERING FACILITY COMMAND NORTHEAST

FROM: JACKSON KIKER, ECC SENIOR CHEMIST, MARLBOROUGH, MA

SUBJECT: NAS BRUNSWICK SITE EASTERN PLUME MONITORING EVENT 29

DATE: 11/13/2006

Project data were validated using the following Validation Functional Guidelines, as modified for non-CLP methods and project-specific QAPP measurement performance criteria (MPC):

1. Region I, EPA-NE Data Validation Functional Guidelines for Evaluation of Environmental Analyses (Dec, 1996),

2. National Functional Guidelines for Evaluation Inorganic Analysis (1988), and

3. National Functional Guidelines for Evaluation Organic Analysis (October 1999).

The data were assessed against the MPC listed in the approved Site 1& 3 and Eastern Plume LTMP QAPP (May 2000). The QAPP MPC and validation guideline exceedences are assessed and documented on the method/QAPP specific data validation worksheets. On these data validation worksheets the data quality acceptance criteria are presented, analytes requiring qualification based on MPC and/or validation guidance criteria exceedences are listed, assigned qualifiers, qualifying rationale is documented, and any potential bias noted. The overall evaluation of the data generated by a method is presented in the data validation worksheet.

Standard EPA Region I data qualifiers are used to denote the assessment of data quality. The final and ranking assigned data qualifier for an analyte is presented in the data summary table. Ancillary qualifiers are noted on the data validation worksheets.

The USEPA Region I Organic Regional Data Assessment (ORDA) sheet displays the summarized results of the data validation assessment for all analytical methods reported in the SDG.

ACRONYMS AND ABBREVIATIONS

Following is a list of acronyms and abbreviations that may be used in the data validation reports.

Acronym or Abbreviation	Definition
%D	Percent difference
%R	Percent recovery
%M	Percent moisture
%S	Percent solids
Ug/L	Microgram per liter
BD	Breakdown
BEHP	2-bis(ethylhexyl)phthalate
BFB	Bromofluorobenzene
CCB	Continuing calibration Blank
CCC	Continuing Check Compound
CCV	Continuing Calibration Verfication
COC	Chain of custody
CRI	standard at RL for ICP
CVAA	Cold vapor atomic absorption
DFTPP	Decafluorotriphenylphosphine
DQO	Data quality objective
EB	Equipment blank
EPA	Environmental Protection Agency
FD	Field duplicate
GC	Gas Chromatography
GC/MS	Gas chromatography/mass spectrometry
HT	Holding time
ICAL	Initial calibration
ICS-A/AB	Interelement check standard A or AB
ICV	Initial calibration verification
IDL	Instrument detection limit
IS	Internal standards
LCL	Lower control limit
LCS	Laboratory control sample
LTMP	Long term monitoring plan
MeCl	Methylene chloride
MS	Matrix spike

Acronym or Abbreviation	Definition
MSD	Matrix spike duplicate
MPC	Measurement performance criteria
NA	Not applicable
NC	Not calculated.
PAH	Polycyclic aromatic hydrocarbon
PCB	Polychlorinated biphenyls
PQL	Practical quantitation limit
QAPP	Quality Assurance Project Plan
QC	Quality control
RF	Response Factor
RPD	Relative percent difference
RRF	Relative response factor
RSD	Relative standard deviation
RT	Retention time
SDG	Sample Delivery Group
SOP	Standard Operation Procedure
SVOC	Semi-volatile organic compound
SPCC	System performance check compound
SQL	Sample Quantitation Limit
TB	Tripblank
TCX	Tetrachloro-m-xylene
TIC	Tentatively identified compound
UCL	Upper control limit
VOC	Volatile organic compound

DATA QUALIFIER REFERENCE TABLE

Data validation reports will summarize the samples reviewed, elements reviewed, any nonconformances with the established criteria, validation actions (including data qualifiers). Data qualifiers will be consistent with EPA Region I – New England guidelines and will consist of the following:

USEPA Region I – Data Qualifier	USEPA Region I – Qualifier Definition
J	The analyte was positively identified; the associated numerical value is the approximate concentration of the analyte in the sample
UJ	The analyte was not detected above the sample reporting limit; and the reporting limit is approximate
U	The sample was analyzed for, but was not detected above the sample reporting limit.
R	The sample result is rejected due to serious deficiencies. The presence or absence of the analyte cannot be verified

Region I, EPA-NE ORGANIC REGIONAL DATA ASSESSMENT

LAB NAME: Northeast Laboratory/Air Toxics Lab
SDG #:_M59391
EPA-NE DV TIER LEVEL:___II___
SITE NAME: NAS Brunswick – Site Eastern Plume

# of SAMPLES/MATRIX: VOC 9 and 1 FD; Metals 1; 1,4-Dioxane 1, and 1 TB
VALIDATION CONTRACTOR:__ECC/ASW
VALIDATOR'S NAME: Sherri Pullar
DV Completion Date:_14 November 2006
Date Sampled__20 & 21 September 2006.

ANALYTICAL DATA QUALITY SUMMARY

		VOC	1,4-Dioxane	Metals
1	Preservation and HT	O	O	O
2	Instrument Performance Check	O	O	O
3	Initial Calibration:	O	O	O
4	Continuing Calibration:	O	O	O
5	Blanks:	O	O	O
6	Surrogate Compounds:	O	O	-
7	Internal Standards	O	O	-
8	Matrix Spike/Matrix Spike Duplicate:	O	O	O
9	Sensitivity Check:	O	O	O
10	PE Samples- Accuracy Check	M	O	M
11	Target Compound Identification:	O	O	O
12	Compound Quantitation and Reported QLs	O	O	O
13	Tentatively Identified Compounds:	-	-	-
14	Semivolatile/Pesticide/PCB Cleanup:	-	-	-
15	Data Completeness	O	O	O
16	Overall Evaluation of Data:	O	O	O

O = Data had no problems or were qualified due to minor contractual problems; M = Data were qualified due to major/systemic MPC exceedences: Z = Data were rejected as unusable due to major contractual problems.

ACTION ITEMS: (Z items): None.

AREAS OF CONCERN: (M items):

VOC: J for all samples with estimated results <MRL but >MDL. Results for total 1,2-dichloroethene were qualified J in samples 8 and 9 due to RPD >MPC.

Metals: Analytes <MRL but >IDL are qualified J. Result for Hg in sample 1 was qualified UJ due to RPD >MPC.

1,4-Dioxane: None.

ECC Region I Data Review Worksheet (rv 3) VOCs 5030B/5035/8260B
Project: NAS Brunswick Eastern Plume ECC Job No. 5700 Review Criteria: Sites 1, 3 & EP QAPP & USEPA Region I Tier II Guidance

Data Validation Level	Matrix	Preservation	Temp Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**HCl**	**1 cooler – Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59391**

Field Identification and Laboratory Number of Samples Evaluated:

Field ID	Lab Sample Number
BN-EP-29-MW1303A-S	M59391-1
BN-EP-29-MW336-S	M59391-2
BN-EP-29-MW336	M59391-3
BN-EP-29-MW315A-D	M59391-4
BN-EP-29-MW230A-D	M59391-5
BN-EP-29-MW205 D	M59391-6
BN-EP-29-MW224-M	M59391-7
BN-EP-29-MW224	M59391-8
BN-EP-29-MW-XD1	M59391-9 (field duplicate for M59391-8)
BN-EP-29-QT3	M59391-10
BN-EP-29-EW-5	M59391-11

Note: Samples are described below in the data worksheets by reference to the last 2 digits of the Lab Sample Number.

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inventory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects preserved per method (amber bottles, temperature, HCl (aq), MeOH/NAHSO4 (soils) (J, UJ, or R (function of HT and compound)	Cooler temperatures < 6 ^oC. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. No samples qualified.	X	-	
Holding Time	1) 14 Days to analysis, if preserved 2) J –detects, UJ or R –nondetects (function of time) 3) *transcription errors	Analyzed within holding time.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made. 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	NA	-	-	
Lab Blanks (method blanks)	1) < 5x (<10x common) contaminants for aq samples- 2) <10X common contaminants – acetone, 2-butanone or Mecl. 1) TGT analytes <Lab QL 2) if linear range is exceeded, verify if a instrument blank was performed 3) *verify accurate transcription of times, Ids, are reported on forms 4) *verify from the raw data if the instrument blank was performed in the same vessel 5) *verify IS, RRT, and surrogate %R *check 10% of raw chromatograms for false +/-, check for transcription errors	Samples were analyzed in 1 batch: 27 Sep 06: Batch 1 with samples: 1, 2, 3, 4, 5, 6, 7, 9, 10, & 11: No associated detection. All method blank results were non-detect for COCs. No samples qualified.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
Trip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate cross matrix TB (X rules apply to raw data) 4) MeCl & Acetone < 5 5) >RL report sample level U 6) <RL report PQL as U	Aqueous tripblank: BN-EP-29-QT3 Non-detect for all LTMP TCL VOCs with the exception of chlorobenzene (0.71 ug/L). Field samples were non-detect for chlorobenzene, no samples qualified.	X	-	
Equip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate TB (X rules don't apply) 3) MeCl & Acetone < 5 *Check IS area (10% of them) * recalculate surrogate (%R – 10 % of them)	Not collected/analyzed with this SDG as all the equipment were dedicated.	-	-	
Results > Cal Range or <Cal Range	6) >Upper Cal Range J-detects - ensure instrument blank performed 7) <PQL but >MDL – J –detects (estimated) listed on data summary sheet.	Attached data summary table. Analytes with results >MDL but <MRL: were qualified J.	X	J for all samples with estimated results <MRL but >MDL.	
*TICs (if reported)	1) *verify library search for samples and blanks 2) verify TICs were not misreported compounds (different fraction or miss in search) 3) All TICs – J estimated 4) * verify blanks do not contain TIC peaks 5) * check TIC assignment spectra to STD spectra 6) *review blank and Samples for common lab contaminants	None Reported/not evaluated	-	-	
Surrogates	1,2-Dichloroethane-d4 76-114% Dibromofluoromethane 86-118% Toluene-d8 88%-110% 4-BFB 86%-115% *check raw data for surrogated (recalculate 10% of them). *Transcription errors Qualification: >UCL J –detects, %R<10% J –detects, R –Nods, %R >10% but <70% J-detects, UJ NDs	All surrogate recoveries were within QAPP MPC limits. No samples qualified.	X	-	
LCS Recovery	1) Attachment A-2 of LTMP 2) All VOCs 60-140% 3) 10% and <LCL% J detects, UJ –Nods 4) >UCL% J detects <10% R NDs, J-detects 7) *Recalculate the concentrations for one compound in the LCS 8) * Recalucate the %R (within 10% of lab) Note: Tier guidance as a zero blind	All LCS recoveries were within MPC limits.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
LCSD RPD	RPD ≤20% (aq) not a QAPP required QC check. Evaluated using MS/MSD RPD criteria. J- detects	All LCS/LCSD RPDs were within MPC limits.	X	-	
*MS/MSD/unspike sample RSD	1)For unspiked compounds if reported, Non- MS spike compounds <50% RSD calculated from MS/MSD/Unspiked Qualification: >50% RSD J-detects 2)*recalculate the RPD (within 10% of lab)	NA	-	-	
*Compound Quantitation (completed as part of other steps)	1) Check sensitivy (MDL< 1/3 PQL) 2) *Recalculate one detection and quantitation limit 3) *verify concentrations have been adjusted to account for DW, DF, 4) *verifiy correct IS and RRF were used	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 8) *Matrix effects- MS/MSD, surrogated, PDS. 9) *System chromatography- evaluate RRTs, peaks shapes, system impacts on data, baseline shifts. 10) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
*TGT Compound Identification	1) *Within 0.06 (30 sec) of CCV RRT 2) * compare sample Mass spectra to standard spectra; a) all ions in std spectra (with 10% rel intensity) presnent in sample spectra. B) sample ion abundance within 20% of standard spectra. 3) *chromatogram: all peaks greater than 10% of nearest IS identified.	All detections are acceptable. No samples qualified.	X	-	
Single Blind PE	1) Qualify associated samples in PES batch PES = ND, Detects J – ND PE analytes in samples, NDs – R 11) PES > acceptance criteria – Detects in samples J, 12) PES<acceptance criteria – Detects J, NDs –R 13) VOA/SV-XI14 other criteria 14) *% of PES sample above and below criteria *Recalculate concentrations for one tgt compound per PES (10% of lab)	NA	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
MS/MSD Recovery	1) Attachment A-2 of LTMP 2) 60-140% for all VOCs (if MS > 4X native levels) Qualification of MS sample: <10% J detects, R NDs >10% and <LCL% J detects, UJ -NDs >UCL% J detects 3) *Recalculate the concentrations for one compound in the MS/MSD 5) * Recalculate the %R (within 10% of lab)	MS/MSD were run on the following sample: M59391-8. All MS/MSD recoveries within MPC limits with the exception of carbon tetrachloride. Native sample result was non-detect, no samples results qualified.	X	-	-
MS/MSD RPD	RPD ≤20% (aq/S) (when MS >QL) J – detects in MS sample UJ-non detects * recalculate RPD	MS/MSD were run on the following sample: M59391-8. All MS/MSD RPDs were inside MPC limits. No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 30% aq. ≤ 50 soil for Results > PQL (FD pair only) J-detects (both > PQL) 2) Note: FD RPD not specified in QAPP. 30% will be used as the MPC, to be consistent with other NASB QAPPs. 3) If one >PQL, other ND, J-detections, UJ non-detect 4) Other conditions use judgement 5) Determine RPD for detects only. *Recalculate the concentrations for one compound and the PQL	Field sample Field duplicate 8 9 The FD pair 8/9 had RPD's inside MPC limits with the exception of total 1,2-dichloroethene. Acceptable precision. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.	X	Results for total 1,2-dichloroethene were qualified J in samples 8 and 9.	
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 6) * performed annually 7) *MDL is at least ½ of PQL 8) *tgt and surrogate 80-120% R *VOA/SV-X11 (recalcuate %RSD and %R for three compounds (10% of them).	NA	-	-	
Internal Stds	1) IS are –50% to 200% of last Ical, or CCV 3) RRT<0.06 (30 sec) 4) IS>100% J-detects 5) IS<20%CCV NDs – R 6) IS>20%CCV <50%CCV NDs – UJ 7) *check for IS transcription errors 8) FBZ = fluroobenzene 9) CBZ = chlorobenzene-d5 10) DCB = 1,4 dichlorobenzene-d4	Internal standards and RT's within MPC limits.	X	-	
Sensitivity	1) MDL study – 7 replicates (40 CFR) 2) Surrogates %in control limits. 3) %R <10 ND- (R) , J- detects 4) 10%> but <LCL% , judgement 5) %R>UCL% J-detects 6) QC, IS, RRT meet criteria, 7) %RSD < 20% 8) MDL< MQL (3x less ideal) 9) Lab fortitied blank (see VOA/SV Part II	Sensitivity is acceptable.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
	–section X). 10) *Check and recalculate %RSDs and %R for three compounds (with 10% of lab) Dilution factors for samples – impacts to sensitivity				
Tune check	1) ion abundance with method limits 2) *check for co-elution /proper background subtraction 3) *compare reported data to raw data	All tunes within MPC limits.	X	-	
Initial Cal Multipoint (instrument evaluation)	1) correct calibration stds 2) within 12 hours of the tune check 3) CCCs %RSD: <30% (1,1 DCE, chloroform, 1,2dichloropropane, Toluene, EB, VC (J –detects, R or UJ NDs all samples associated with Ical) 4) SPCCs Average RRF: SPCCs Chloromethane >0.10, 1,1 DCA>0.10, bromoform >0.10, chlorobenzene>0.3, 1122TCA>0.3 (J –detects, R/UJ NDs) 5) RRF>0.05 all compounds 6) RRT < 0.06 units (all stds within 30 sec) 7) %RSD<15% for all non-CCCs or COD>0.99 *8) RRF exclusions: surrogates, acetone, MeCL, chloroethane/methane, CS, 1,/22/03 2-butanone, 1,2 dichloropropane, 2-hexanone (IV-8)./* 9) *verify that instrument parameters met method and that Ical and analysis used the same parameters 10) *recalculate RRF one tgt compound associated with each IS. Recalculated values within 10% of lab values. 11) *recalculate one tgt compound associated with each IS. Recalculated values within 10% 12) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 13) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument; GCMSN 18 Sep 2006 All RRF's within MPC limits for all VOC's of concern. All CCCs are in MPC. All SPCC are in MPC.	X	-	
Initial Cal (Linearity)	%RSD < 15% use average RF for calibration %RSD> 15% use least squares COD (r2) > 0.990 or correlation coefficient r> 0.995 Qualification for compounds with : %RSD>30% and RRF>0.05 – J detects, UJ - NDs %RSD<30% and RRF<0.05; -J detects, R - ND %RSD>30% and RRF<0.05: J detects, R - ND (see VOA/SVIII-4)	Instrument; GCMSN 18 Sep 2006 All %RSD < 30 or were fitted with linear or quadratic curves. These curves were provided by the laboratory for evaluation. No samples qualified.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
2nd Source ICV	QC check nor criteria not specified in QAPP. %D<25% or %R (between ICV and Ical) analytes 80%--120% (+ or -) once per 5 pt cal used to evaluate data sets. Qualification: J detects, R or UJ NDs	Instrument; GCMSN 18 Sep 2006 All %D's within MPC limits for all VOC's of concern.	X	-	
CCV	1) SPCCs Average RRF: SPCCs Chloromethane >0.10, 1,1 DCA>0.10, bromoform >0.10, chlorobenzene>0.3, 1122TCA>0.3 2) RRF all compounds > 0.05 3) CCC: (1,1 DCA, chloroform, 1,2dichloropropane, Toluene, EB, VC) %D<20% (or all analytes if no CCCs reported). 4) Qualification-J detects, R or UJ NDs 5) *verify same instrument and parameters 6) *Recalculate RRF for one tgt cmpd associated with each IS. (within 10%) 7) *Recalculate %D for one tgt cmpd associated with each IS (within 10%) 8) *IS RRT<0.06 units (30 sec) 9) * IS area -50 % to 100 % of last ICAL 10) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 11) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument; GCMSN 27 Sep 2006 %D's were within MPC limits.	X	-	
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Laboratory precision and accuracy are acceptable. LCS %R's inside MPC limits. All MS/MSD recoveries within MPC limits. Surrogates were inside MPC limits. Aqueous tripblank: BN-EP-29-QT3 Non-detect for all LTMP TCL VOCs with the exception of chlorobenzene (0.71 ug/L). Field samples were non-detect for chlorobenzene, no samples qualified. J for all samples with estimated results <MRL but >MDL. The reported MRL's and MDL's provide adequate sensitivity to support evaluation against MEG and MCL's for all compounds except vinyl chloride. Tune checks within MPC limits. ICALs: SPCC was inside MPC limits. ICV: within limits.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inv en-tory	QUAL	BIAS
		CCV: within limits. Method blank samples were non-detect for all VOCs. Sampling Error Evaluation: Tripblank was non-detect for all VOCs with the exception of chlorobenzene. Field sample Field duplicate 8 9 The FD pair 8/9 had RPD's inside MPC limits with the exception of total 1,2-dichlorothene. Acceptable precision. For individual RPD values for detected results please see attached field duplicate worksheet. Overall precision is acceptable.			

* Tier III review items only.

Completeness Check: Inventory Check Sheet_____X__. Sample Quantitation Calculations (TIER III only):

Lab Correspondence: None.

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

5030/5035/8260BSIM 1,4 Dioxane
Review Criteria: Region I Tier II Guidance and EIASOP-VOADIOX1(5/21/03)

Data Validation Level	Matrix	Preservation	Temp Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**None**	**Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59391**

Field Identification and Laboratory Number of Samples Evaluated:

Field ID	Lab Sample Number
BN-EP-29-MW224	M59391-8A
BN-EP-29-QT3	M59391-10A
Note: Samples are described below in the data worksheets by reference to the last three digits of the Lab Sample Number.	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R)	Cooler temperatures < 6 ^oC. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. No samples qualified.	X	-	
Holding Time	2) Temp≤6° 3) Unpreserved 4) No headspace 1) 14 Days to analysis, 2) J –detects, UJ or R –nondetects (function of time) 3) *transcription errors	All samples analyzed within holding time. No samples qualified.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made. 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs -R	Not applicable	-	-	
Surrogates	Surrogate: 1,4 dioxane-D8 : 60-140% *check raw data for surrogated (recalculate 10% of them). *Transcription errors Qualification: >UCL J –detects, %R<10% J –detects, R –Nods, %R >10% but <70% J-detects, UJ NDs	All reported surrogate recoveries for field samples within MPC limits.	X	-	
Lab Blanks (method blanks)	1) < 5x (<10x common) contaminants for aq samples- 2) <10X common contaminants – acetone, 2-butanone or Mecl. 1) TGT analytes <Lab QL 2) if linear range is exceeded, verify if a instrument blank was performed 3) *verify accurate transcription of times, Ids, are reported on forms 4) *verify from the raw data if the instrument blank was performed in the same vessel 5) *verify IS, RRT, and surrogate %R 6) *check 10% of raw chromatograms for false +/-, check for transcription errors	Associated method blanks were non-detect for 1,4 Dioxane.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
Trip Blank	1) < 5x contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate cross matrix TB (X rules apply to raw data) 4) MeCl & Acetone < 5 5) >RL report sample level U 6) <RL report PQL as U	Aqueous trip blank BN-EP-29-MW-QT3 Non-detect for 1,4-dioxane.	X	-	
Equip Blank	1) < 5x (<10x common) contaminants for aq samples- 2) TGT analytes <Lab QL (contact lab) -for soils indicate TB (X rules don't apply) 3) MeCl & Acetone < 5 *Check IS area (10% of them) * recalculate surrogate (%R – 10 % of them)	Not collected/analyzed with this SDG as all the equipment were dedicated.	-	-	
Results > Cal Range or <Cal Range	7) >Upper Cal Range J-detects - ensure instrument blank performed 8) <PQL but >MDL – J –detects (estimated) listed on data summary sheet.	All sample were non-detect for 1,4-dioxane.	X	-	
LCS Recovery	1) 1,4 Dioxane 60-140% 2) 10% and <LCL% J detects, UJ –Nods 3) >UCL% J detects <10% R NDs, J-detects 7) *Recalculate the concentrations for one compound in the LCS 8) * Recalucate the %R (within 10% of lab) Note: Tier guidance as a zero blind	All LCS %R's are within MPC limits. No samples qualified.	X	-	
LCS/LCSC RPD	RPD ≤20% (aq) (when MS >QL) Not a method specified QC check.	LCS/LCSD RPD <20%. Laboratory accuracy is acceptable	x	-	
MS/MSD Recovery	1) 60-140% for all VOCs (if MS > 4X native levels) Qualification of MS sample: <10% J detects, R NDs >10% and <LCL% J detects, UJ -NDs >UCL% J detects 3) *Recalculate the concentrations for one compound in the MS/MSD 4) * Recalucate the %R (within 10% of lab)	Native sample was sample M59303-1. All MS/MSD recoveries within MPC. No sample qualifications.	-	-	
MS/MSD RPD	RPD ≤20% (aq/S) (when MS >QL) J –detects in MS field sample UJ-non detects * recalculate RPD	Native sample was sample M59303-1. MS/MSD RPD inside MPC. No sample qualifications.	-	.	
Field Dup RPD	1) RPD ≤ 30% aq. soil for Results > PQL (FD pair only) J-detects (both > PQL) 2) Note: FD RPD not specified in QAPP. 30% will be used as the MPC, to be consistent with other NASB QAPPs. 3) If one >PQL, other ND, J-detections, UJ non-detect 4) Other conditions use judgement 5) Determine RPD for detects only.	Field duplicates were not collected in this SDG.	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
	5) *Recalculate the concentrations for one compound and the PQ				
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 6) * performed annually 7) *MDL is at least ½ of PQL 8) *tgt and surrogate 80-120% R 9) *VOA/SV-X11 (recalcuate %RSD and %R for three compounds (10% of them).	NA	-	-	
Internal Stds	1) IS are –50% to 200% of last Ical, or CCV 3) RRT<0.06 (30 sec) 4) IS>100% J-detects 5) IS<20%CCV NDs – R 6) IS>20%CCV <50%CCV NDs – UJ 7) *check for IS transcription errors 8) FBZ = fluroobenzene 9) CBZ = chlorobenzene-d5 10) DCB = 1,4 dichlorobenzene-d4	All IS %R's are within MPC limits for all field samples. No field samples qualified.	X	-	
Sensitivity	1) MDL study – 7 replicates (40 CFR) 2) Surrogates %in control limits. 1) %R <10 ND- (R) , J- detects 2) 10%> but <LCL% , judgement 3) %R>UCL% J-detects 6) QC, IS, RRT meet criteria, 7) %RSD < 20% 8) MDL< MQL (3x less ideal) 9) Lab fortitied blank (see VOA/SV Part II –section X). 10) *Check and recalculate %RSDs and %R for three compounds (with 10% of lab) 11) <u>Dilution factors for samples – impacts to sensitivity</u>	The MRL is 1.00 ppb (ug/L) which is consistent with the EPA Region I method. Sensitivity is acceptable. The site action limit is not in the QAPP, but is ca. 35 ppb. The project sensitivity is acceptable.	X	-	
*Compound Quantitation (completed as part of other steps)	1) Check sensitivy (MDL< 1/3 PQL) 2) *Recalculate one detection and quantitation limit 3) *verify concentrations have been adjusted to account for DW, DF, 4) *verifiy correct IS and RRF were used	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 9) *Matrix effects- MS/MSD, surrogated, PDS. 10) *System chromatography- evaluate RRTs, peaks shapes, system impacts on data, baseline shifts. 11) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
*TGT Compound Identification	1) *Within 0.06 (30 sec) of CCV RRT 2) * compare sample Mass spectra to standard spectra; a) all ions in std spectra (with 10% rel intensity) presnent in sample spectra. B) sample ion abundance within 20% of standard spectra. 3) *chromatogram: all peaks greater than 10% of nearest IS identified.	NA	X	-	
Single Blind PE	1) Qualify associated samples in PES batch PES = ND, Detects J – ND PE analytes in samples, NDs – R 12) PES > acceptance criteria – Detects in samples J, 13) PES<acceptance criteria – Detects J, NDs –R 14) VOA/SV-XI14 other criteria 15) *% of PES sample above and below criteria 16) *Recalculate concentrations for one tgt compound per PES (10% of lab)	NA	-	-	
Tune check	1) ion abundance with method limits 2) *check for co-elution /proper background subtraction 3) *compare reported data to raw data	All tunes passed. No samples qualified.	X	-	
Initial Cal Multipoint (instrument evaluation)	1) correct calibration stds 2) within 12 hours of the tune check 3) RRF criteria not part of method. This VOC fall under the *RRF exclusions of Section (IV-8) Tier II guidance.* 4) %RSD<30% Qualification for compounds with : %RSD>30%	Instrument MSM 18 July 2006 Applies to all samples %RSD>30% calibration.	X	-	
2nd Source ICV	QC check nor criteria not specified in QAPP nor analytical SOP. %D<25% or %R (between ICV and Ical) analytes 80%--120% (+ or -) once per 5 pt cal used to evaluate data sets. Qualification: J detects, R or UJ NDs	Instrument MSM 18 July 2006 All %D's within MPC limits for all VOC's of concern.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED/Rationale	Inven-tory	QUAL	BIAS
CCV	1) %D>30% 2) before analysis and every 12 hours. 3) Qualification-J detects, R or UJ NDs 4) *verify same instrument and parameters 5) *Recalculate RRF for one tgt cmpd associated with each IS. (within 10%) 6) *Recalculate %D for one tgt cmpd associated with each IS (within 10%) 7) *IS RRT<0.06 units (30 sec) 8) * IS area -50 % to 100 % of last ICAL 9) *option-review preparation logs to ensure cal stds are traceable to NIST stds. 10) *option-recalculate cal std concentration of one std. Must agree within 10% of lab (option if information is in data package)	Instrument MSM 25 September 2006 All %D's with MPC limits.	X	-	
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Laboratory is accuracy acceptable, as the laboratory LCS/LCSD and MS/MSD are within limits. No matrix bias. Surrogates were inside MPC limits. MS/MSD RPD's were inside MPC limits for 1,4-dioxane. Method blanks were non-detect for 1,4 Dioxane. Aqueous tripblank QT-3 was non-detect for 1,4-dioxane. Tune check passed. ICAL; within MPC . ICV: within MPC for %drift CCV: samples analyzed within 12-hours of ICal. Post CCV had acceptable %Drift for 1,4 dioxane. CCV Area% inside MPC limits for 1,4-dioxane. Field Precision: Not accessed; field duplicates were not collected in this SDG.	X	-	

* Tier III review items only.

Completeness Check: Inventory Check Sheet_____X__. Sample Quantitation Calculations (TIER III only):

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

Metals 6010B/7041/7470A/7471A/7740/7841
Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

Data Validation Level	Matrix	Preservation	Temperature Sample Receipt	Laboratory	SDG Number
Tier II	**Aqueous**	**Nitric Acid**	**1 cooler – Temp (^oC): <6 ^oC**	**Accutest Laboratories Marlborough, MA**	**SDG: M59391**

Field Identification of Samples Evaluated:

Field ID	Lab Sample Number
BN-EP-29-MW1303A-S	M59391-1

Note: Samples are described below in the data worksheets by reference to the last three digits of the Lab Sample Number

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
COC	1)Unbroken custody (accept or if broken R) 2) Temp≤6° (Soil-J detects, R -nondetects 3) preserved per method (amber bottles, temperature. J, UJ, or R (function of HT and compound)	Cooler temperatures <6°C. Sample preservation adequate. Sample custody transferred from Field Team Leader to lab sample courier. Unbroken Chain of Custody. Sample preservation within limits. No samples qualified.	X	-	
Holding Time	1) 180 days (6010), Hg 28 Days to analysis 2) J –detects, UJ or R –nondetects (function of time)	All samples analyzed within holding time. No samples qualified.	X	-	
Field Dup RPD	1) RPD ≤ 30% water and ≤ 50 soil (no QAPP Criteria) for Results > X PQL (FD pair only) J-detects (both > X PQL) 2) If one >X PQL, other ND, J-detections, UJ non-detect	No field duplicate sample collected for this SDG.	X	-	
% Solids Check (SOLIDS)	30%<Solids: if no sample weight adjustment made 1) <10% R entire sample 2) 10%.> and <30%; J-detects, NDs –R	NA	X	-	
Results > Cal Range or <Cal Range	1) >Upper Cal Range J-detects - ensure instrument blank performed 2) <MRL but >MDL – J –detects (estimated)	Analytes <MRL but >IDL are qualified J	X	Analytes <MRL but >IDL are qualified J	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
Lab Blanks (method blank or preparation blank)	1) Once per sample batch 2) Results > QL; sample results <5X ; sample result U (nd) 3) Sample results >5X blank level; no action	Preparation blanks were non-detect for all metals.	X	-	
LCS Recovery	1) once per sample batch 2) 80-120% ICP metals and Hg. 3) <LCL% Reject 4) >UCL% detects J	All LCS %R's were within MPC limits. No samples qualified. Laboratory precision is acceptable.	X	-	
LCS/LCSD RPD	1) RPD<20%	All 6010B/Hg- LCS/LCSD RPDs are within MPC limits.	X		
MS Recovery	1) 75-125% ICP metals and Hg if MS > 4X native levels) Qualification of MS sample: 2) <30% J detects, R NDs 3) 30%--74%, detects J, NDs UJ 4) >125% J detects	Field samples M59274-11 used for MS. MS %R within MPC limits, no qualified samples.	X	-	
MS/MSD RPD	MS/MSD RPD<20%	All 6010B, 6020, & Hg MS/MSD RPDs within limits. Laboratory precision is acceptable.	X	-	
Laboratory Replicate RPD	RPD < 20% No QAPP criteria provided	Field sample: M59274-11 used for lab replicate. All RPDs within limits with the exception of Hg. Laboratory precision is acceptable.	X	Result for Hg in sample 1 was qualified UJ.	
Sensitivity*	1) MDL study – 7 replicates (40 CFR) 2) check and recalculate %RSDs and %R fir three compounds (with 10% of lab)	All results in calibration range. No dilutions required.	X	-	
Equip Blank	< 5x contaminants for aq samples – for soil indicate EB (X rules don't apply)	Not collected/analyzed with this SDG as all the equipment were dedicated.	-	-	
Negative blanks	If negative values are reported for an analyte with absolute value >DL and sample value is <5X the absolute value of the blank or is nondetect Qualify detects as estimated (J) Nondetects as estimated (UJ)	No negative blank detections. No samples qualified.	X	-	

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
Initial Cal Multipoint	1) Blank and 3 standards covering range of instrument. 2) high standard verification +/- %5 3) Hg 5-point calibration COD>0.99	ICP-AES samples. All COD's > 0.99 in all initial calibration runs for all methods. No sample qualifications. Hg ICaL within limits.	X	-	
Initial Calibration Blanks (ICB)	1) Ical blank after Ical 2) Results > QL; sample results <5X ; sample result U (nd) 3) Blank concentrations < project RLs 4) Sample results >5X blank level; no action 5) ABS >RL then J qualify data	No 6010B/Hg/6020 ICB detections – no samples qualified.	X	-	
Continuing Calibration Blanks (CCB)	1) CCB every 10 samples end of run 2) Blank concentrations < project RLs 3) Results > QL; sample results <5X; sample result U 4) Sample results >5X blank level; no action ABS >RL then J qualify data.	No 6010B/Hg/6020 CCB detections – no samples qualified.	X	-	
Serial Dilution	1) once per digestion batch 2) Not required per QAPP- no criteria provided. 3) %D<10% 4) %D not evaluated if element results is <50X IDL 5) J detects, UJ non-detects.	Field sample M59141-6 for SD. %D's within MPC limits with the exception of Co, Cu, Sb, Se, Tl, and K. Native sample results for Co, Cu, Sb, Se, Tl, and K were <50X IDL, no samples qualified.	X	-	
Interelement checks ICS-A, ICS-AB Instrument performance check	1) start of sequence 2) 80-120% target analytes 3) >120% ; detects J (ICS-AB) 4) 50%-79% R ICS-AB; detects J, NDs – UJ 5) <50% R – reject data 6) ICS-A response > DL and samples have <5X ICS-A response: detects J (if DL is <10 ug/l use 2X DL). 7) Absolute value of negative ICS-A response>DL and sample detects <5X ICS-A response: detects J, NDs as UJ 8) If the ICS-A is within limits, the ICS-AB may not be analyzed (USACE Shell)	Both ICS-A and ICS-AB %R's within MPC limits for all runs.	X	-	
2nd Source ICV	1) following calibration 2) 90- 110% Recovery (6010/7000) 3) 75%-89% R – detects J, NDs – UJ 4) 111-125% R – detects J 5) outside 75-125% R – reject data (R) Hg 80-120%	6010B/6020/Hg ICV %R's within MPC limits the initial calibration. No samples qualified.	X	-	
CCV	1) every 10 samples and end of run 2) 90- 110% Recovery (6010) Hg; 80-120% 3) 6010: 75%-89% R Hg, 65-79% R; – detects J, NDs – UJ. 4) 6010: 111-125%, Hg: 121-135% detects J 6010: outside 75-125%, Hg; outside 65-135%; R – reject data (R)	6010B/6020/Hg CCV %R's within MPC limits. No samples qualified.	X	-	
Post Digestion Spike	1) Analyze if MS >MPC (QAPP) 2) 85- 115%R (QAPP Attachment A-1)	M59141-6 used for PDS. All %R within limits No apparent matrix bias. No samples qualified.	X	-	

ECC Region I Data Review Worksheet (rv 3)
Project: NAS Brunswick ECC Job No. 5700

Metals 6010B/7041/7470A/7471A/7740/7841
Review Criteria: Site 1&3/Eastern Plume QAPP & Region I Tier II Guidance/NFG

REVIEW ITEMS	ACCEPTANCE CRITERIA	SAMPLES AFFECTED Narrative	Inven-tory	QUAL	BIAS
*MDL Study	1) *In accordance with 40CFR – seven replicates %RSD < 20% 2) * IS and retention times within method requirements 3) * performed annually 4) *MDL is at least ½ of PQL *tgt and surrogate 80-120% R	NA	-	-	
*System Performance	1)* evaluate PES, MS//MSD, cal STDs, MDS study, and surrogates for systemic bias – high or low and access system accuracy 3) *Matrix effects- MS/MSD, surrogated, PDS. 4) *overall system contamination-review all blanks for systemic or sporadic contamination	NA	-	-	
Tune Check	Within Method limits.	NA	-		
Overall Evaluation of Data	1) Appropriate method 2) Evaluate any analytical problems 3) Evaluate sampling errors – field contamination, sample hold times	Analytical Error Evaluation: Method 6010B; metals except for Hg. The LCS %R;s are within limits. MS/MSD %R and RPDs within limits. The LCS/LCSD RPDs were within limits. All RPDs within limits with the exception of mercury. Laboratory precision is acceptable as determined by the laboratory duplicate. Hg. analytical precision and accuracy within MPC limits. Lab preparation blank; non-detected for all analytes. ICAL: COD within limits. ICV: in limits CCV: in limits Sampling Error Evaluation: No field duplicate collected for this SDG.	X	-	

*TIER III DATA VALIDATION ONLY Completeness Check: Inventory Check Sheet___X_Sample Quantitation Calculations (TIER III DATA VALIDATION ONLY):

FIELD DUPLICATE WORKSHEET

SDG: M59391

Field Sample Id	Analyte	Analytical Method	Result	Units	Qualifier	Field Duplicate Id	Result	Units	Qaulifier	FD RPD (%)
BN-EP-29-MW224	Total 1,2-dichloroethene	SW8468260B	2.6	ug/l	J	BN-EP-29-MW-XD1	1.0	ug/l	J	88.9

NAS BRUNSWICK- EASTERN PLUME – SEPTEMBER 2006
DATA SUMMARY TABLE –SDG M59391

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	1,4-Dichlorobenzene	2.2	ug/l		0.44	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8466020	09/20/06	2	Lead	0.79	ug/l	J	0.044	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8466020	09/20/06	2	Thallium	0.60	ug/l	J	0.17	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8466020	09/20/06	2	Antimony	4.0	ug/l	U	0.24	4.0
BN-1&3-29-MW1303A-S	M59391-1	SW8466020	09/20/06	2	Arsenic	2.0	ug/l	U	1.6	2.0
BN-1&3-29-MW1303A-S	M59391-1	SW8466020	09/20/06	2	Selenium	10	ug/l	U	0.61	10
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Aluminum	98.8	ug/l	J	23.0	200
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Iron	612	ug/l		30.0	100
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Magnesium	4640	ug/l	J	6.9	5000
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Manganese	1890	ug/l		0.38	15
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Nickel	10.2	ug/l	J	1.3	40
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Potassium	5070	ug/l		20.0	5000
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Silver	5.0	ug/l	U	0.59	5.0
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Sodium	16700	ug/l		150	5000
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Barium	14.8	ug/l	J	1.4	200
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Beryllium	4.0	ug/l	U	1.3	4.0
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Cadmium	4.0	ug/l	U	0.31	4.0
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Chromium	1.8	ug/l	J	1.3	10
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Cobalt	3.2	ug/l	J	2.2	50

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Copper	1.2	ug/l	J	0.83	25
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Vanadium	50	ug/l	U	1.0	50
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Zinc	9.3	ug/l	J	1.1	20
BN-1&3-29-MW1303A-S	M59391-1	SW8466010B	09/20/06	1	Calcium	32900	ug/l		9.8	5000
BN-1&3-29-MW1303A-S	M59391-1	SW8467470A	09/20/06	1	Mercury	0.20	ug/l	UJ	0.045	0.20
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Ethylbenzene	0.46	ug/l	J	0.20	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-1&3-29-MW1303A-S	M59391-1	SW8468260B	09/20/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Styrene	5.0	ug/l	U	0.60	5.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Chlorobenzene	0.71	ug/l	J	0.40	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-QT3	M59391-10	SW8468260B	09/21/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-QT3	M59391-10A	SW8468260BBYSIM	09/21/06	1	1,4-Dioxane	1.0	ug/l	U	0.22	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	1,2-Dichloroethene (total)	1.9	ug/l		1.0	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Chloroform	1.2	ug/l		0.59	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	1,1,1-Trichloroethane	7.1	ug/l		0.40	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	1,1-Dichloroethane	2.9	ug/l		0.67	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	1,1-Dichloroethene	2.7	ug/l		1.0	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	Trichloroethene	8.6	ug/l		0.74	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-EW-5A	M59391-11	SW8468260B	09/20/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW336-S	M59391-2	SW8468260B	09/20/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW336	M59391-3	SW8468260B	09/20/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW315A-D	M59391-4	SW8468260B	09/20/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW230A-D	M59391-5	SW8468260B	09/20/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Tetrachloroethene	2.2	ug/l		0.54	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	1,2-Dichloroethene (total)	6.9	ug/l		1.0	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Benzene	1.5	ug/l		0.44	0.50
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	1,1,1-Trichloroethane	9.2	ug/l		0.40	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	Trichloroethene	15.7	ug/l		0.74	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW205-D	M59391-6	SW8468260B	09/20/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	1,2-Dichloroethene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW224-M	M59391-7	SW8468260B	09/20/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	1,2-Dichloroethene (total)	2.6	ug/l	J	1.0	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW224	M59391-8	SW8468260B	09/20/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW224	M59391-8A	SW8468260BBYSIM	09/20/06	1	1,4-Dioxane	1.0	ug/l	U	0.22	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Ethylbenzene	1.0	ug/l	U	0.20	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Styrene	5.0	ug/l	U	0.60	5.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	cis-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	trans-1,3-Dichloropropene	0.50	ug/l	U	0.50	0.50
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	1,4-Dichlorobenzene	1.0	ug/l	U	0.44	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	1,2-Dichloroethane	1.0	ug/l	U	0.63	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	4-Methyl-2-pentanone (MIBK)	5.0	ug/l	U	0.69	5.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Toluene	1.0	ug/l	U	0.34	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Chlorobenzene	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	1,4-Dioxane	25	ug/l	U	9.1	25
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Dibromochloromethane	1.0	ug/l	U	0.65	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Tetrachloroethene	1.0	ug/l	U	0.54	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Xylene (total)	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	1,2-Dichloroethene (total)	2.6	ug/l	J	1.0	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	1,3-Dichlorobenzene	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Carbon tetrachloride	1.0	ug/l	U	0.81	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	2-Hexanone	5.0	ug/l	U	5.0	5.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Acetone	5.0	ug/l	U	1.0	5.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Chloroform	1.0	ug/l	U	0.59	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Benzene	0.50	ug/l	U	0.44	0.50
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	1,1,1-Trichloroethane	1.0	ug/l	U	0.40	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Bromomethane	2.0	ug/l	U	1.1	2.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Chloromethane	2.0	ug/l	U	1.6	2.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Chloroethane	2.0	ug/l	U	1.3	2.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Vinyl chloride	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Methylene chloride	2.0	ug/l	U	0.65	2.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Carbon disulfide	5.0	ug/l	U	0.79	5.0

Sample Name	Lab Id	Analytical Method	Sample Date	Dilution Factor	Analyte	Result	Unit	Qualifier	MDL	RL
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Bromoform	1.0	ug/l	U	0.58	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Bromodichloromethane	1.0	ug/l	U	0.47	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	1,1-Dichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	1,1-Dichloroethene	1.0	ug/l	U	1.0	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	1,2-Dichloropropane	2.0	ug/l	U	0.62	2.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	2-Butanone (MEK)	5.0	ug/l	U	3.3	5.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	1,1,2-Trichloroethane	1.0	ug/l	U	0.67	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	Trichloroethene	1.0	ug/l	U	0.74	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	1,1,2,2-Tetrachloroethane	1.0	ug/l	U	0.69	1.0
BN-EP-29-MW-XD1	M59391-9	SW8468260B	09/20/06	1	1,2-Dichlorobenzene	1.0	ug/l	U	0.65	1.0

APPENDIX H

1,4-Dioxane Results

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Sample Location	Sample Date	Analyte	Results	Data Qualifer	Units
Eastern Plume Combined Effluent	10-Apr-04	1,4-Dioxane	10.5		ug/l
Eastern Plume Combined Effluent	10-Sep-04	1,4-Dioxane	10.5		ug/l
Eastern Plume Combined Effluent	16-Sep-05	1,4-Dioxane	11		ug/l
Eastern Plume Combined Effluent	16-Sep-05	1,4-Dioxane	12		ug/l
Eastern Plume Combined Effluent	18-Apr-06	1,4-Dioxane	8.9		ug/l
Eastern Plume Combined Effluent	18-Apr-06	1,4-Dioxane	8.1	J	ug/l
Eastern Plume Combined Effluent	9-Sep-06	1,4-Dioxane	6.6		ug/l
Eastern Plume Combined Effluent	9-Sep-06	1,4-Dioxane	5.8		ug/l
MW-313	10-Apr-04	1,4-Dioxane	84		ug/l
MW-313	10-Sep-04	1,4-Dioxane	93.8		ug/l
MW-313	05-Apr-05	1,4-Dioxane	180		ug/l
MW-313	05-Apr-05	1,4-Dioxane	160		ug/l
MW-313	15-Sep-05	1,4-Dioxane	99		ug/l
MW-313	15-Sep-05	1,4-Dioxane	94		ug/l
MW-313	19-Apr-06	1,4-Dioxane	78		ug/l
MW-313	19-Apr-06	1,4-Dioxane	120	J	ug/l
MW-313	9-Sep-06	1,4-Dioxane	69	J	ug/l
MW-313	9-Sep-06	1,4-Dioxane	70.6		ug/l
MW-331	10-Apr-04	1,4-Dioxane	7.2	U	ug/l
MW-331	10-Sep-04	1,4-Dioxane	23.8		ug/l
MW-331	10-Sep-04	1,4-Dioxane	87.6		ug/l
MW-331	05-Apr-05	1,4-Dioxane	28	J	ug/l
MW-331	05-Apr-05	1,4-Dioxane	50		ug/l
MW-331	16-Sep-05	1,4-Dioxane	22		ug/l
MW-331	20-Apr-06	1,4-Dioxane	26		ug/l
MW-331	9-Sep-06	1,4-Dioxane	45.5	J	ug/l
MW-333	10-Apr-04	1,4-Dioxane	47.6		ug/l
MW-333	10-Sep-04	1,4-Dioxane	49.9		ug/l
MW-333	05-Apr-05	1,4-Dioxane	55		ug/l
MW-333	15-Sep-05	1,4-Dioxane	60		ug/l
MW-333	19-Apr-06	1,4-Dioxane	54		ug/l
MW-333	9-Sep-06	1,4-Dioxane	56.8		ug/l
MW-338A	10-Apr-04	1,4-Dioxane	1.5	U	ug/l
MW-338A	10-Sep-04	1,4-Dioxane	1	U	ug/l
MW-338A	05-Apr-05	1,4-Dioxane	1	U	ug/l
MW-338A	13-Sep-05	1,4-Dioxane	1	U	ug/l
MW-338A	18-Apr-06	1,4-Dioxane	1	U	ug/l
MW-338A	9-Sep-06	1,4-Dioxane	1	U	ug/l
P-106	10-Apr-04	1,4-Dioxane	42.7		ug/l
P-106	10-Sep-04	1,4-Dioxane	68.7		ug/l
P-106	05-Apr-05	1,4-Dioxane	35		ug/l
P-106	15-Sep-05	1,4-Dioxane	30	J	ug/l
P-106	20-Apr-06	1,4-Dioxane	31	J	ug/l
P-106	9-Sep-06	1,4-Dioxane	16.1	J	ug/l
P-106	9-Sep-06	1,4-Dioxane	19	J	ug/l